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Formed in 1972, the Council of Outdoor Educators of Ontario (COEO) is a non-profit, volunteer-based organization that promotes safe, quality outdoor education experiences for people of all ages. We achieve this by publishing the *Pathways* journal, running an annual conference and regional workshops, maintaining a website, and working with kindred organizations as well as government agencies. Members of COEO receive a subscription to *Pathways*, as well as admittance to workshops, courses and conferences. A membership application form is included on the inside back cover of this issue of *Pathways*.

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*Pathways*

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Engaging Our Inner Scientist to Foster Connections and Broaden Our Understanding of This Land
Greg Lester and Zabe MacEachren
This issue of *Pathways* is based on the 2010 COEO conference theme, *Learning to Live Well on this Land: Acknowledging Traditional Territories, Engaging Intercultural Dialogues, and Fostering Nature Interconnections*. This theme grew out of a graduate student forum at the 2008 COEO conference where concern was raised about the lack of cultural diversity, and a particular lack of attention to Aboriginal perspectives, in outdoor/environmental education in Ontario. As friends and colleagues we considered what role COEO might play in addressing this issue. The discussion continued at the Ministry of Education’s launch of the environmental education policy framework in early 2009 and the 5th World Environmental Education Congress in May 2009.

Momentum grew, a collaborative conference committee formed, and the theme was expanded as follows:

As outdoor and environmental educators in Ontario we are living and teaching on Aboriginal traditional territory. This is respectful and appropriate for us to acknowledge… Intercultural dialogue is critical to learning how to live well together on this land. In order to reconnect our selves, experiences, technologies, and teachings with the natural world, we must re-imagine how to live well in place. In what ways can we engage creatively with the natural world? How might we honour calls from Aboriginal communities to respectfully foreground Indigenous ways of knowing? How can we come to know place-appropriate ways of living, learning, and teaching on traditional territories?

The goal of the conference was to create an environment where knowledge and stories could be shared respectfully, where participants could engage in intercultural dialogues, acknowledge traditional territories, and build respectful relationships between all beings—in the common goal of learning to live well on the land. The participants, presenters and volunteers endowed the conference with positive energy, knowledge and respect, thus enabling a powerful learning process to take place. Of particular note, Greg Lowan’s opening keynote address on “Ecological Métissage as an Emerging Vision for Outdoor and Environmental Education,” Anthony Templar’s “Talking Drum” session, the Makita Hack and the Logrollers’ show, and Lee Maracle’s closing keynote address contributed significantly to the overall success.

We envision the conference as the planting of a seed that we hope will continue to grow in COEO’s future, and this issue of *Pathways* continues to contribute to the journey of *Learning to Live Well on This Land*. Some of the articles we have chosen directly revisit and draw upon specific presentations from the conference while others bring fresh perspectives to the conference theme. All represent the spirit of the 2010 conference.

It has been a rich learning experience organizing the conference and editing this issue of Pathways. We would like to thank all those who have been involved along the way. We hope that you enjoy the issue and that you spend some quality time out on the land this season.

*Scott McCormack, Kim Sedore and Emily Root*
Winter is here and, with it, most parts of Ontario have been served up a generous helping of snow. Lake effect snow, which originated from Lake Huron and Georgian Bay, has contributed to record amounts of the white stuff and many people have taken to the outdoors to enjoy their favourite winter pastimes (e.g., skiing, snowshoeing, pond hockey, and SHOVELING SNOW!). I know that for many COEO members (myself included) winter is an exciting time to be working outside with students and clients, but it is also a time to head out on personal adventures with family and friends or simply on your own. Whether it is to enjoy a quiet Saturday morning of cross-country skiing at a local conservation area or a ten-day winter camping trip in Algonquin Park, many of us find our own individual way of rejuvenating our spirits and communing with nature at this time of the year.

Not so long ago, COEO offered its members an all-inclusive wintertime experience to help shake off those winter blahs. Now, by “all-inclusive” I don’t mean some sort of discounted group rate on a southern destination holiday. Rather, I’m referring to COEO’s once-annual retreat: Make Peace with Winter, or MPWW for short. During the ‘80s and early ‘90s MPWW was a hugely popular event and took place each year during a weekend in late January or early February. This two-day conference featured dynamic, entertaining and professional programs with a focus on winter learning and fun! MPWW was frequently hosted at the Leslie Frost Centre and Bark Lake and offered a range of sessions including winter ecology, snow science, snowshoeing, cross country skiing, dog sledding, bush craft, winter games, animal tracking, winter wildlife, CWF workshops, quinzhee construction, wine tasting, winter camping, broomball, hot chocolate and the list goes on.

As President, I receive many suggestions from the COEO membership, but there is one comment in particular that I hear more frequently than most: Whatever happened to MPWW? I don’t have a definite answer to this question and can only surmise to guess that with a drop in membership during the late 1990s, we had a similar decrease in volunteer organizers for such events. Volunteer efforts at that time were most likely concentrated on our annual fall conference, and as a result events like MPWW ceased to exist. However, the same is not true today and with our membership having increased steadily over the past several years and obvious renewed interest, I would like to encourage any interested members to revive this classic COEO experience, which would be of particular relevance in 2012, our 40th anniversary year. So the call goes out to COEO members, young and old alike: Please consider taking on a leadership role in reestablishing this once regular COEO event.

Kyle Clarke
For seven years I have worked as a community organizer and ecological educator, trying to integrate an analysis of colonialism into my life and work. Recently I have worked with others in Guelph, Ontario, trying to prevent a 675-acre industrial development from surrounding an old growth forest. Our educational material consistently features an understanding of Indigenous territory, and we have built relationships with people in the nearby Six Nations reserve who also work to stop developments in their territory. This union has empowered our efforts and made the work more transformative for all involved. I write in this spirit of personal transformation and Earth’s protection. Through this kind of work I have learned how colonialism permeates our reality, especially regarding environmental issues. And although Native people are affected disproportionately, I believe colonization impoverishes all of our lives.

The ecological impact of colonialism is inextricable from empire building, industrialism, large-scale deforestation and agriculture. Not long ago we could safely drink from nearly every lake, river, stream and spring, and we could hunt animals as a part of intact ecosystems. Today’s world is very different. A quotation from the French Catholic missionary Joseph De La Roche D’Allion, written in 1627, describes a quality of life in what is now known as southwestern Ontario:

There is an incredible number of stags, great abundance of moose or elk, beaver, wild cats and black squirrels larger than the French; a great quantity of wild geese, turkeys, cranes and other animals which are there all winter. A stay there is quite recreating and convenient; the rivers furnish much excellent fish; the earth gives good grain, more than is needed. They have squashes, beans, and other vegetables in abundance.

Today this same land contains less than one per cent original forest and is dominated by industrial agriculture. Fish can be safely eaten only in small amounts, and fruit and nut trees are scarce. An autonomous existence has been stolen from us, and this ecological loss virtually guarantees our participation in the industrial economy.

Our lives are also socially impoverished due to colonialism. Consider this quotation, from another French Catholic missionary who spent time with the Hurons in the mid-1620s:

All the forests, meadows, and uncleared land are common property, and anyone is allowed to clear and sow as much as he/she will and can, and according to their needs, and this cleared land remains in their possession for as many years as they continue to cultivate and make use of it.

Contrast that with our current system, where we spend most of our waking hours working to pay for our mortgage, rent and taxes. Consider this: If you lived in a society like that quoted above, what would you do with your life?

The Power of Names

Colonization alters our reality through our language and sense of place. For example, the Bruce Peninsula’s original name is the Saugeen Peninsula and is the traditional territory of the Saugeen Ojibway. The Saugeen Ojibway lived throughout the peninsula and as far south as Mount Forest before a series of coercive pressure tactics, primarily led by Sir Francis Bond Head, forced them to sign away more than 1.5 million acres. Now isolated on two reserves, the Chippewas of Nawash and Saugeen First Nation have an active land claim seeking the return of Crown land in the peninsula and financial compensation for treaty violations.

Nine million acres of the area that includes Algonquin Park, the Petawawa military
base, and downtown Ottawa is under an active land claim. This land is unsurrendered territory. Since the Algonquin nation did not sign a treaty with the British or Canadian government for this area, settlement and resource use is classified under international law as illegal.1

Learning the history of the Saugeen Ojibway or the Algonquins, referring to the area as the Saugeen rather than the Bruce Peninsula, and learning how we can assist these nations’ reparations is one way of decolonizing our language and sense of place. It is incumbent upon us to consider our responsibilities when we go to places like the Saugeen Peninsula and Algonquin Park, knowing that Indigenous people are fighting for the land.

**Decolonizing our minds and our lives**

Decolonizing our minds has a lot to do with outdoor education work, which has deep roots in ecology and bioregionalism. Some notable scientific and philosophical contributors to these movements include Arne Naess, Rachel Carson, Aldo Leopold, Henry David Thoreau, John Muir, Tom Brown, John Seed, Richard Louv and many more, all of whom advocate a land- or place-based identity. Shared among these philosophical roots is a de-identification with colonial mindsets and civilization, and a re-identification with the Earth—with the ecosystems that feed us and inspire us, with the land and watershed we call home. When someone asks us where we live, the simple act of describing the land or watershed rather than the name of the town can begin to transform our relationships.

Another way we can decolonize is to research our relationship with colonialism, both on this land and our ancestral homelands: Where do our ancestors come from, and how did they live? When, and how, were they colonized? If our ancestors came to this continent from elsewhere, how did they end up here?

Lastly, the larger process of social decolonization is a grand and increasingly urgent task. The Canadian government’s land claim process is much too slow. The very land to be reclaimed is being destroyed by new residential and commercial development, mining operations, and industrial agriculture. The slow pace of the Canadian government’s land claims bureaucracy and the ever-rapid pace of capitalism leave many to wonder, what will be left?

It is this frustration that leads many to try and stop things before they get worse. In recent years Ontario has seen dozens of actions stop contentious projects—Caledonia in 2006; a quarry, police station, and residential development by Tyendinaga Mohawks; a uranium mine by Ardoch Algonquins; Dump Site 41 by Anishinabe and non-Natives; more than $2 billion worth of developments by the Six Nations of the Grand River; a border crossing at Akwesasne; and many more.

All of these actions saw non-Natives engage in solidarity in some way, either by organizing understanding and support in their own communities, fundraising, legal support, media exposure, pressuring the government, standing on the front lines or organizing solidarity actions. Beyond those pertinent actions, all of us can contribute to social and cultural decolonization. When done right, this can build the relationships we need to rebuild trust between peoples. We need to protect this Earth, and we are better able to do so from an honourable place of mutual support, solidarity, and willingness to stand together.

1 International documents recognizing the rights of Indigenous people to self-determination and control of their lands include sections of the Universal Declaration of Human Rights, the United Nations Declaration on the Rights of Indigenous Peoples, the Charter of the United Nations, the UN International Covenant on Civil and Political Rights, the UN International Covenant on Economic, Social and Cultural Rights and the UN Resolution on Permanent Sovereignty over Natural Resources.

Matt Soltys is an ecological educator and community organizer who for five years hosted Healing the Earth Radio (www.resistanceisfertile.ca).
Transitioning Traditions: Rectifying an Ontario Camp’s Indian Council Ring

By Taylor Wilkes

Shh, no talking. No giggling. Just stay quiet and keep walking forwards in the long line of pairs crossing the bridge and heading up the hill towards the ring. It feels weird to be on your best behaviour after being a wild-child all month at camp; when you’re young, formality makes it seem like a very long walk. The path narrows near the entrance and the line becomes single file as you pass by painted horses with barefoot riders under a fern archway held up by fire-dancers patiently anticipating the start of their performance.

Set back in the forest, this gathering space is encircled by vertical logs with horizontal ones surrounding the central fire. The space is strangely commanding—it instantly grabs your attention and triggers your curiosity. You’ve never been in a place quite like this before.

Chatter arises as 400 campers settle into their seats, but an immediate hush signals the Chief’s presence at the entrance and the beginning of this month’s Council Ring. Everyone rises.

The Council surges with enthusiastic sounds as campers participate in the challenges, games and performances, showing off newfound bravery and skills. Your adrenaline rises and falls throughout the event, influenced by the energy in the crowd until, at last, the Chief’s hands rise and the crowd quiets down. The evening culminates in a theatrical telling of Hiawatha’s Departure—an age-old story told for decades for the moral it reveals. You sit with your friends, quietly enraptured by the performance.

Council Ring has always been a very special event, remembered fondly by generations of campers. Taylor Statten Camps (TSC) are not the only camps to cherish such an activity. Across Canada there are dozens of camps that have supported “Indian” assemblies in the past, but a select few still do. Most organizations abandoned them during the 1960s or changed focus to themes that do not risk racist interpretation (Wall, 2005). This trend outlines the struggle camps have faced to appropriately represent the culture of the First Nations at events—a struggle or, better yet, a challenge we at TSC have just begun to accept. As a long-term camper and senior staff member last summer, I had the wonderful opportunity to participate in reviving the program and observe the progress and obstacles that evolved.

The founder of TSC, Taylor Statten I, was a highly respected man who valued the role outdoor education plays in child development. Nicknamed “Chief” by Ernest Thomas Seton in 1922, he wove his deep respect for First Nations philosophies into the foundation of his camp program with Native-led workshops, excursions and artwork. He saw capacity within Indigenous culture to captivate campers’ attentions and promote confidence and good character. The ultimate representation of this idea is the Indian Lore Program currently known as Council Ring (Eastaugh).

Over 90 years, the small, weekly, age-targeted gatherings amalgamated into a more formal, monthly ceremony. As First Nations participation at camp decreased, heightened expectations were placed upon the director to conduct the “Indian” event. In the late 1970s there was a brief attempt to reform the program by eliminating some of the “Indian” costumes. It was a response to a First Nations staff member who criticized Council Ring, stating it made her sick “having to watch you people make fun of my people.” After receiving pressure from other campers and many alumni to uphold a long-standing TSC tradition, the event quickly returned to its original form. Regardless of how harmless the founding intentions were, this cultural polarization and the depiction of Indigenous culture as the “other” is one of the reasons why the traditional Council Ring is simply unacceptable.

Recently there have been very positive signs of change. In the past three years, new directors have respected the resurgence of Indigenous culture Canada is currently experiencing and have recognized the need
for improvement. They have reintroduced First Nations influence at camp, inviting different people to lead storytelling and campcraft workshops. A director, Jay Kennedy, has taken initiative to become better educated for his role as Chief during Council Ring. And most importantly, fully supported by Jackie Pye and Andrew Reesor, the directing team has admitted their need for help and asked Jim Adams, a First Nations educator from Toronto, to help make the ritual more culturally appropriate. In two years, the camp has made a lot of progress.

During the first meeting, Jay described the difference between the old and new councils, highlighting the questionable or offensive elements that had been removed. Jim’s response was one of surprising recognition and support for the advances that had been made in such a short time frame. His positive feedback was encouraging.

Jim’s influence has also improved the director’s ability and willingness to acknowledge difficult questions. Why is it bad to use a pipe as a prop? How can it be offensive that we honour the culture? Why shouldn’t we wear headdresses? Jim very clearly explained that items such as headdresses, pipes and drums have traditionally been deeply sacred components of Indigenous ceremonies, so their use as props by people unaware of their purpose is very disrespectful. Understanding this and being able to explain it to the TSC community should enable the directors to overcome the pressures that instigated the 1970s reform and stand by their position.

The most prominent and exciting success so far was this year’s ceremony for retiring the headdresses. Made by Taylor Statten II and worn only by senior staff and directors, the headdresses are of historical significance. Eliminating their use has been repeatedly rejected until this year when Jim helped develop an appropriate method for retirement.

It was exciting to observe the process Jim went through to identify the correct ceremony. He primarily listened—listened in ways most people are not aware of.

After visiting the ring, he reiterated the overwhelming positive energy he felt and support he heard from spirits excited about the changes being made. He listened to what Jay and I had to say and processed our intentions, listening for advice. Three weeks later he returned to explain the ceremony that had been revealed to him and prepared the staff to conduct it.

On the day of the ceremony, Jim explained to the campers what would happen that night at Council Ring and why it was important. Tobacco bundles lined the perimeter of the ring, and smudging was available for those who wished it. The feeling of acceptance within the ring transformed into curiosity when Jim began the ceremony in song. He acknowledged the role the headdresses had played in our camp’s history and the fact that despite being created with good intention, we were recognizing their use was no longer appropriate. To honour this, the senior staff wore the headdresses for the last time, walking around the fire to the sound of Jim’s drum.

The ceremony was honoured by the spirits too. Almost immediately as Jim began speaking, it started to rain. Water, the most fundamental, sacred element in life, is known for its power to cleanse and rejuvenate. While we encircled the fire, it poured down from the sky, cleansing the headdresses, Council Ring and all its participants.

Interesting questions evolved during the process that challenged the very premise of the project.

What is appropriate and how do we incorporate it? By watching Jackie and Jay struggle to balance appropriateness with excitement, I realized how hard it is to control the pendulum that swings between education and entertainment. A certain level of entertainment is needed to captivate a youthful audience, while educational explanations make the event more appropriate. In lengthening the program and expanding on topics, many people reported decreased attention and intrigue.
How can we keep the activity exciting and fun, yet still culturally appropriate? The event could grow to emphasize outdoor skills or voyageur history over its First Nations theme, but the camp is still undecided as to what direction it will take.

How do we collaborate? It was very interesting to observe Jim and Jay’s conversations as they tried to communicate from different world views. Jay asked questions hoping for advice and direction from Jim. In response, Jim shared experiences, traditions and stories that combined into a holistic idea for Jay to interpret however he saw fit. Brief silence always followed these cross-cultural responses, as Jim wondered whether his explanation was sufficient, and Jay wondered where to find his answers within it. Collaboration for Jay meant learning to bend his linear, westernized framework of thinking to include the Indigenous cyclical nature and holistic thought.

Regardless of their differing perspectives, there was a constant and obvious respect between these men. I think they are wise. If Canada is in the process of decolonizing and “decolonization” means working towards a more integrated, respectful relationship, then learning how to collaborate and maintain a relationship makes them progressive and resilient.

What if we don’t want it to change? These efforts did not escape criticism or opposition. The social pressure from alumni and returning staff is just as strong as it was in the 1970s, perhaps even stronger with an added forty years of appeasement. Their power manifested this year with the decision to exclude four headdresses from retirement so they could be worn in Council Rings during September alumni camp.

This is to be expected. Change is never well received. I have been told staff presented mutinous acts and obscene gestures the year smoking was banned. They wanted to preserve their favorite hangouts—including the “butt-hut”—that had created so many of their memories. However, just as discontinuing smoking privileges keeps the camp up to date with evolving health standards, discontinuing culturally inappropriate props keeps the camp up to date with evolving cultural standards.

The directors understand something is lost when traditions change and that this tradition has been perpetuated by generations of returning campers with high expectations. That is why the headdress retirement was recognized with such a well-prepared ceremony. The camp also realizes older generations have perspectives based on older beliefs. However, the directors are not trying to eradicate Council Ring’s respect for “Indian Lore”; they are ensuring it is respected in a manner appropriate for today.

As with any paradigm shift, there will always be the last individuals to accept the reasons behind change. However, with time and clear communication, the myths and fallacies of our old-time traditions are transforming into an improved, New Age program.

Does any of this really make a difference for decolonization?

The big question is, can we keep the event appropriate and inoffensive to Indigenous culture while maintaining such a powerful forum for outdoor education? One could argue that it is almost more powerful than other forums because of its placement within the camp setting.

Anyone that has ever been to camp can understand that camp is a magical place, and special events at magical places leave big impressions on children. I, for one, was a child so intrigued by Council Ring’s expression of Indigenous culture that it sparked my curiosity to study Indigenous Environmental Studies at Trent University as an adult. Outside my experiences at camp, I had no other opportunity to get a similar exposure to Indigenous spirituality. Therefore, I am grateful for the opportunity to have witnessed the old tradition, however inappropriate it may have been.
As a staff member with this point of view, I value the role Council Ring plays in educating our campers about another culture, and hope the camp continues working hard to reform the ceremony so that it can maintain its cultural component. There must be a way to balance Taylor Statten’s original objectives for displaying his awe and respect for First Nations culture with a modern context of their role as part of Canadian society.

Being aware of Indigenous culture is key to understanding what it means to be Canadian and why we need to work towards a more integrated, respectful relationship. If Council Rings at camps across the country can express this message in an appropriate, memorable and exciting fashion, then the answer is yes. It does make a difference. Cumulatively, they could become a useful tool for decolonizing Canada’s next generation.

References


Taylor Wilkes graduated from Trent University in Environmental Science with a specialization in Indigenous Studies. Her love for outdoor education was cultivated by fifteen exciting summers at TSC. She will attend graduate school next year to study hydroecology and Canadian freshwater governance.
Ecological Métissage: Exploring the Third Space in Outdoor and Environmental Education

By Greg Lowan

An increasing number of scholars, both Indigenous and non-Indigenous, are asking, “Is it possible to blend Western and Indigenous North American ecological philosophies and knowledge?” Indeed, many scholars and educators, such as the late Nakoda Chief John Snow (1977–2005), suggest that the future success of our society will require the combined wisdom of Aboriginal and non-Aboriginal cultures.

Eminent Tewa scholar and educator Gregory Cajete (2001) relates the story of one of his family members who has a “split head”. This family member is of mixed Euro-American and Indigenous Tewa ancestry and often feels split between the two cultures. Cajete suggests that many people in our predominantly Western society built on the Indigenous territories of Turtle Island (North America) also have a split head; our sociocultural and geographical identities are often disjointed. John Ralston Saul (2008) provides a related view when he suggests that Canadians have forgotten (or been led to forget) the foundational Aboriginal aspects of our culture and languages, resulting in an incomplete national sense of self. Cajete proposes that the ultimate task at hand is to recognize this and find ways to heal the split head of our collective society, blending the best of Western (and other) and Indigenous cultures to create a unified whole.

In response to these kinds of concerns, Métis scholar Catherine Richardson (2004, p. 16) introduces the concept of the “Third Space” as the existentially blended territory of a Métis mentality. She compares this to the “First Space” of the dominant Euro-Canadian society and the “Second Space” of colonially subjugated Aboriginal peoples. However, during a recent conference presentation, one audience member astutely pointed out to me that the First Space here on Turtle Island was, in fact, Aboriginal, followed by the European Second Space, which resulted in the Third Space of the Métis (see Figure 1, below). The Third Space is a place where Western, Aboriginal and other cultural beliefs, philosophies, values and knowledge intersect, cohabit and intermingle (Richardson, 2004).

Figure 1. The Third Space.

The Third Space makes some people uncomfortable because “hybridity problematizes boundaries” (Pieterse, 2001, p. 220). Zembylas and Avraamidou (2008) propose that challenging this further opens up the Third Space. Pieterse suggests that hybridity involves recognizing the “in-betweens” and “interstices” (p. 238) and pushes us beyond false dualistic conceptions of culture and race. According to Pieterse, the Third Space requires “collective liminality, collective awareness” (p. 239) similar to the Trickster knowledge celebrated in many Indigenous cultures. Finding the Third Space involves collectively embracing a hybrid or Trickster consciousness.

Alaskan scholars Ray Barnhardt and Oscar Kawagley (2005) provide the illuminating Venn diagram below to compare and contrast Western and Indigenous approaches in search of common ground. From their diagram we can see that there are indeed many similarities between Western science and Indigenous knowledge of nature. Concepts such as a unified universe; personal qualities such as perseverance, curiosity and honesty; empirical observation of nature; and a desire to understand the behaviour and patterns of plants, animals and other natural phenomena are common to both traditions.
Figure 2. Finding common ground between Western science and Indigenous knowledge (Barnhardt and Kawagley, 2005).

Aikenhead (2008) uses the Ancient Greek terms “episteme” and “phronesis” respectively to describe Western science and Indigenous knowledge. He defines episteme as thinking focused on how the world works and phronesis as practical wisdom-in-action. Baumard (1994) defines phronesis as a blend between “techne”, which is practical knowledge, and episteme. However, he also suggests that the Greeks actually recognized four dominant forms of knowledge: episteme (theoretical or philosophical knowledge), techne (practical knowledge), phronesis (theoretically informed practice) and “metis” (oblique or intuitive knowledge), a term etymologically related to the Latin “mixtus”, meaning mixed, which is the root of modern terms such as “métissage” (Dolmage, 2009). Baumard suggests that while episteme, techne and phronesis have been widely recognized and preserved in Western history, metis (pronounced “meh-tiss”) was suppressed and ignored until Détienne and Vernant’s (1974, 1991) seminal efforts in its recovery. As a Métis person, I find the etymological, epistemological and ontological implications of metis as a way of understanding and being in the world deeply intriguing.

Metis as a form of knowledge was suppressed in Western history for various reasons. Dolmage (2009) suggests that metis wasn’t widely recognized for the past two thousand years because of its associations with femininity embodied in the form of the goddess Metis, one of Zeus’s wives and the mother of Athena. Détienne and Vernant (1974, 1991) also propose that metis has been suppressed throughout Western history because of its association with animals and nature. Examples of metis in Greek mythology and philosophy often involve the dolos (tricks or ruses) of animals like the fox, the octopus or the squid, which is able to turn itself inside out. In their concluding chapter, Détienne and Vernant (1974, 1991) suggest that in studies of the Greeks pursued by scholars who claim to be their heirs, there has been a prolonged silence on the subject of the intelligence of cunning [metis]. The fundamental reasons for this have been two-fold. The first is perhaps that, from
a Christian point of view, it was inevitable that the gulf separating men from animals should be increasingly emphasized and that human reason should appear even more clearly separated from animal behaviour than it was for the ancient Greeks. The second and even more powerful reason is surely that the concept of Platonic Truth, which has overshadowed a whole area of intelligence with its own kinds of understanding, has never really ceased to haunt Western metaphysical thought. (pp. 318–319)

The oblique, intuitive and subtle boundary-crossing characteristics of metis as a way of knowing and being in the world could be considered as a more flexible alternative to the absolutist legacy of Platonic thought that is reflected in the single-culture nationalism of, for example, many European nations and the United States (Saul, 2008). This idea might prove illuminating in our search for the Third Space between Western and Indigenous knowledge and wisdom.

Two-Eyed Seeing—viewing the world simultaneously through both Western scientific and Aboriginal lenses to form a focused and unified vision—is another theory developed by Mi’kmaq Elder Albert Marshall (Lefort and Marshall, 2009). A recent issue of Green Teacher (Fall, 2009) focused on the concept of Two-Eyed Seeing. Several educational programs that strive to embody Two-Eyed Seeing were profiled and will be discussed later in this article.

Concepts such as the Third Space, healing the split head, Two-Eyed Seeing and metis provide a compelling theoretical basis for exploring intercultural environmental ethics and education. I use the term “ecological métissage” to collectively describe these concepts. The concept of ecological métissage arises from Thomashow’s (1996) description of “ecological identity” as the way that we understand ourselves in relation to the natural world and an understanding of “métissage” as a mixing or blending often associated with culture or ethnicity (Pieterse, 2001). Therefore, ecological métissage denotes a blending of two or more ecological
world views in personal identity, philosophy and practice. The following explores examples of ecological métissage in practice.

**Ecological Métissage in Practice: Intercultural Outdoor and Environmental Education in Canada**

Intercultural outdoor and environmental education is a growing field of practice with a limited but growing body of literature. Many organizations across Canada and around the world are currently delivering programs designed to bridge cultures. While some programs aim to share Indigenous knowledge with Indigenous students only, others are open to both Indigenous and non-Indigenous students. Other programs also attempt to blend Indigenous knowledge with modern scientific approaches, seeking the previously discussed Third Space. The following is a brief review of a selection of programs and key scholars in these areas.

One study that I first encountered during my master’s research (Lowan, 2008, 2009) was Takano’s (2005) description of a community-developed land-based cultural education program based in Igloolik, Nunavut. Takano, a researcher of Japanese descent, participated in Paariaqtuqtut, a 400 kilometre journey through the community’s ancestral territory in May 2002. Paariaqtuqtut means “meeting on the trail” in Inuktitut and was developed by a group of community members and Elders. Paariaqtuqtut aims to connect young people with cultural skills and teachings in a land-based context. Takano (2005) found that community members in Igloolik were concerned that many youth were losing connections with their land and culture. Those interviewed observed that this leads to youth feeling lost between two worlds, disconnected from their community and culture, yet unprepared to live in the Western world. Takano also recorded the experiences of several participants who felt that Paariaqtuqtut had helped them to reconnect with their land and culture.

David Lertzman (2002) and Thom Henley (1989) provide descriptions of the Rediscovery program. Rediscovery programs have been founded across North America and around the world in various forms. Some are very small and focused on one particular Aboriginal community while others, such as Ghost River Rediscovery (Lertzman, 2002) in Calgary, are large, year-round programs. Ghost River Rediscovery is based on local Indigenous traditions and welcomes students of all ages from all cultural backgrounds. I have had the wonderful opportunity to volunteer with them on several occasions. Henley (1989), one the program’s original founders, states, “Rediscovery brings together people from many different racial backgrounds . . . . When people from different races have the opportunity to talk to one another, to work and play together, then inevitably they begin to learn about each other’s lives and cultures” (p. 35).

As previously mentioned, a recent issue of *Green Teacher* (Fall, 2009) focused on Mik’maq Elder Albert Marshall’s concept of Two-Eyed Seeing. Several programs embodying Two-Eyed Seeing were profiled. For example, Hatcher and Bartlett from Cape Breton University’s Integrative Science program (2009a, 2009b; Bartlett, 2009) describe units that they developed on various subjects, such as birds, traditional medicine and astronomy, for high school students. In their units they attempt to integrate Western science with Mi’kmaq knowledge and philosophies of nature. They recognize that truly blending Western and Indigenous approaches is a challenging task for educators.

Further examples of inspiring Two-Eyed Seeing programs are provided in the same issue of *Green Teacher*. Métis educators Deanna Kazina and Natalie Swayze (2009) relate their experiences with “Bridging the Gap”, an inner-city program in Winnipeg that works with both Aboriginal and non-Aboriginal youth. Bridging the Gap strives to integrate Western and Aboriginal approaches to learning about the natural world. Based on their description and another article by Swayze (2009) in the *Canadian Journal of Environmental Education*, it appears that they are experiencing success. Kazina and Swayze instill genuine cultural awareness in their students through lessons such as
how to offer tobacco and how to respectfully approach the Elders who are a strong part of their program.

Gloria Snively (2009) also relates her experiences as a long-time teacher-educator at the University of Victoria interested in what she calls “cross-cultural science”. She uses a lesson on dentalium, a shell traditionally used as money by Indigenous people across North America, as a vehicle for discussing Two-Eyed Seeing. Snively observes:

Cross-cultural science education is not merely throwing in an Aboriginal story, putting together a diorama of Aboriginal fishing methods, or even acknowledging the contributions Aboriginal peoples have made to medicine. Most importantly, cross-cultural science education is not anti-Western science. Its purpose is not to silence voices, but to give voice to cultures not usually heard and to recognize and celebrate all ideas and contributions. It is as concerned with how we teach as with what we teach. (p. 38)

While there is a growing body of literature on intercultural outdoor and environmental education in Canada, no comprehensive studies to date have focused on the experiences and competencies of intercultural outdoor and environmental educators and the deeper societal implications of their work. Who are these “border crossers” (Hones, 1999; Nguyen, 2005; Pieterse, 2001)? What led them to their chosen vocation? What makes them effective? And how might they be reshaping Canadian ecological identity? Why is this important? These are the kinds of questions that I am currently addressing in interviews with contemporary intercultural outdoor and environmental educators as part of my doctoral research.

References


1 Cultural terms, such as Indigenous, Aboriginal, Western, and Elder, have been intentionally capitalized as a sign of respect.


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Living Divided No More: A Journey into Health in the Twenty-First Century

By Erin Carter

Most of us acknowledge that being healthy is a desirable goal. But what does it mean to be healthy in the 21st century? This article begins to explore the idea of health. It begins to ask questions about where the idea of health comes from, what it means to different people in different places and why it should matter. As society has been increasingly confronted with the realities of a more economically and technologically driven global society, health has evolved from the human sciences into new spheres, such as politics, economics, popular culture, commerce and religion, where it has arguably taken on new meanings.

Health is not simply an optimum “number,” “percentage” or “determinant,” nor is it a problem with a simple solution. The full story of health is the unfolding journey of an idea and how this idea is changing the way we think, feel and act in today’s context.

The perspective of health that I present here emerges from my own experiences over the last 31 years. These experiences started in childhood; they continued throughout my schooling years and, more recently, have persisted in my roles as athlete, activist, teacher and scholar. This journey is worth exploring because, as I will argue, it coincides with the evolution of ideas about health, from a reductive approach to an emerging approach that embraces health in a “whole”istic way. Whether teaching, working or advocating for environmental education, I invite you to engage in this dialogue about the relationship between human health and environmental health. So, put the kettle on. Here we go.

In The Truth About Stories, Canadian author Thomas King (2003) writes, “The truth about stories is that that’s all we are” (2003, p.32). King’s message is simple; narratives are powerful because they connect us to people and to ourselves. The stories we remember and what we tell has everything to do with the way we wish to see ourselves in the world. King suggests that stories are the most important tool for creating change in our world and
that there is power in repeating the stories that we want to create. He writes, “Want a different ethic? Tell a different story” (p. 164). This is a story about the changing ethic of health.

Knowing Together

I grew up on a small farm in southeastern Manitoba. It was an environment that encouraged activity, prompted creativity and promoted learning. I was a spirited child with a high degree of energy and curiosity, which I demonstrated while roaming, exploring, playing, singing and dancing wildly. I discovered the world with all the senses and marvelled at its beauty. When I was six, the same year I started school, I started taking skating lessons. I fell in love with skating immediately, but unfortunately I didn’t have the same reaction to school. It was bewildering to sit at a desk to learn. What about our bodies? Weren’t our bodies an integral part of learning? Over time, school became a place where I felt confined and controlled, and where I understood that “mind-learning” was privileged over “body-learning”. Gym class was the only class where we were allowed to focus on our bodies and were allowed to run and play. This was the beginning of learning the world apart.

Learning Apart

As the years passed, the body-mind separation approach did not change, but intensified. I gained knowledge about the world by sitting through classes such as biology, science and physics. I used my body after school in sports and extracurricular activities. In university this dualism was further reinforced. Kinesiology’s increased focus on the “scientization” of the body (Andrews, 2008) and physical education’s focus on popular industries such as sport, exercise and leisure (Kirk, Macdonald & Tinning, 1997) further entrenched the mind-body disconnection. More recently, however, increasing discourses around the “health crisis” inspired me to question the idea of health. I quickly realized that there is little agreement as to what the idea of health means (Godbey, 1999).

Before the late 1800s, “health” was considered simply the opposite of sickness (Donatelle, Davis, Munroe, Munroe & Casselman, 2004). In other words, people were healthy if they weren’t ill. In the early 1900s, as deadly epidemics spread through society, the idea of health became synonymous with good hygiene. Then in the mid-1900s, members of the United Nations created the World Health Organization (WHO) and defined health as “the state of complete physical, mental, and social well-being, not merely the absence of disease or infirmity” (WHO, 1948). Incredulously this definition has not changed. This historical perspective provides two insights. First, that health is, in fact, an idea that dynamically evolves as new ways of knowing have evolved in time and place. Second, that our ideas of health over the last 60 years have remained relatively static.

Einstein once said, “No problem can be solved from the same level of consciousness that created it.” We can’t simply fix the mess we face with the same kind of thinking that caused the problems in the first place; what we need most is a new kind of change thinking. We need to allow room to reimagine and reconceptualize how we as healthy humans live in this world.

Rather than asking, “How do we solve the health crisis?” perhaps we should be asking, “How does the idea of health change the way we arrive at and achieve our personal and our collective goals?” By changing the question, we begin to realize the way we learn about health affects how we take action on health.

When I think back to my own story, I would argue that one of the greatest impacts on my health was sitting to learn, or learning to sit. Edward Eisner (1985) argues that “what schools do not teach may be as important as what they teach” (p. 97). In other words schools aren’t only teaching subjects; they are teaching social expectations, rules and values. While the industrial educational model has undoubtedly helped us to design steam engines and microchips, we now must use our ingenuities to consider the world anew. I argue that there is a growing
need for new approaches to teaching health that are 1) place-based—arguably our health grows out of the places we live, 2) complexity-based—arguably we are part of a larger social-ecological system, and 3) “whole”istic—arguably our health is determined by the balance of our physical, emotional, spiritual and mental states. As David Orr (1994) writes, “It is not education, but education of a certain kind, that will save us” (p. 8).

This paper is not meant to be an ending but a launching off point for more dialogue. While we have tireless champions like Richard Louv (2008), David Orr and David Suzuki advocating for environmental health, we need more people advocating for ecohealth—the idea that environmental health and human health are deeply connected. As David Suzuki (2009) once wrote, “What we do to our oceans, we do to ourselves.”

References


Erin Carter is currently pursuing a PhD in Education at Lakehead University. She competed on the Canadian Cycling team for ten years and, despite retiring in 2006, has become a strong advocate for healthy living. Erin is eager for the challenge of engaging in great adventures, conversations and experiences that work towards building healthy and sustainable communities.
Education for Well-Being

Intentionally Tuning Into Ecological Consciousness: Using the Body to Interpret the Teachings of the Land
By Jocelyn Burkhart

For many researchers and writers in the environmental and ecological education fields, outdoor and experiential educational methods are understood to be especially powerful for the development of ecological literacy and consciousness in students, both of which are crucial if we are to develop healthier and more respectful ways of interacting with the land. A couple of definitions may be helpful here. “Ecological literacy” refers to the knowledge, skills and attitudes necessary to read and understand complex interactions and processes in the natural world (Capra, 2007; Curthoys, 2007). “Ecological consciousness” refers to the consistent practice of basing personal and societal decisions and actions on a respect for the limitations and needs of natural ecosystems, as revealed by an ecologically literate assessment of any given situation (Puk, 2006). As an ecological educator who is passionate about living in a respectful relationship with the land and who has spent the past year studying yoga intensively, I sought to bridge these two worlds by asking, “How can the practice of hatha yoga aid in the development of ecological consciousness?”

The practice of hatha yoga is well known for its ability to help with relaxation, stress reduction and the development of strength and flexibility. It is also an incredibly powerful practice for aligning body and mind, and increasing awareness of both the physical body and the inner self. By focusing the mind on the breath and the sensations and flow of energy through the body, the mind and body come into alignment, and in this relaxed state, it becomes possible to access the body’s inner knowing. The practice of “Hidden Language” or reflective hatha yoga (Radha, 1987) provides access to this inner voice by posing reflective questions during the hatha yoga practice that enable intuitive and previously unconscious insights to rise to the surface of the mind. Many of the various hatha yoga asanas, or poses, mimic natural landforms and creatures, and physically capture the essence of central quality of each through posture and movement. The mountain, tree, cat, dog and tortoise poses are excellent examples of this. By positioning the body in these various asanas and using awareness of the breath to align the mind with the body, it becomes possible to access the unique teachings of each of these various elements of the natural environment.

Symbolism plays a key role in this learning process. By asking reflective questions that draw upon the distinctive form of each asana and what it represents, the intuitive voice is able to respond specifically and intelligently. For example, when practising the tree pose, the mind can reflect on the metaphor of tree roots drawing nourishment while the feet ground and support the posture. Similarly, asking, “What are you growing up to or reaching toward?” as the arms stretch upward enables an embodied understanding of and response to this question. Furthermore, this response could occur on more than one level of awareness for each person, including, but not limited to, the emotional, physical, mental and spiritual levels. As the body mimics each unique element or creature, the space is created for awareness to expand into these elements. This enables, for example, an experience of “tree sense” with the tree pose or of “cat consciousness” with the cat pose. And in these moments of novel and spacious experience, the teachings of the land and its beings begin to emerge.

As the body forms itself into the shape of a tree or a cat, and the mind asks, “How am I like a tree or like a cat?” these questions become an invitation to explore our similarities with, and acknowledge our connections to, these beings with which we cohabit the earth and exchange energy. In this way, the practice of reflective hatha yoga
trains the mind to think beyond the physical form of the body. The various yoga postures and accompanying reflective questions encourage inward looking, and they expand awareness of personal and ecological connections with the chosen elements of the natural environment. In my experience, the more I practise these postures using this method, the more the insights revealed remain with me long after the practice ends. For me, this clearly indicates the powerful potential for reflective hatha yoga to aid in expanding students’ awareness of ecological interconnections, which, in turn, is the foundation for developing an ecological consciousness.

References


Jocelyn Burkhart (BA, BEd, MEd) is an outdoor/ecological/experiential educator, permaculturalist and lifelong learner who is currently studying yoga at Yasodhara Ashram in BC. She is interested in the potential for both wilderness/rural and urban garden experiences to foster more respectful relationships with the land and within our communities, and is exploring body and energy awareness and the impact of imagination and intention on all of the activities she engages in, from facilitating/teaching, gardening and cooking, to reading, writing and creating art.
Musings of a Songwriter: Connecting Students to Community and Nature through the Language of Lyric and Song

By Michael Filipowitsch

One of the most enduring lessons that I learned as a musician is that sometimes the most expressive notes are the ones never played. This lesson continues to teach me as I learn to correctly use it within my compositions, as well as live performances. Silence isn’t just the canvas upon which music is painted; it is one of the colours on the composer’s palette. Silence creates dynamics; it allows the listener to have the opportunity to wonder what is going to occur, actively involving them in a musical journey. The length of silence, the distance between periods of silence and the magnitude of silence all have an effect on the listener. Measures of silence are not waiting periods; rather they are times of active listening, much like a good conversation. I believe this forms a relationship between the music and the listener. I find the same to be true when speaking about the many nuances of environmental education.

During my tenure as an outdoor educator, I have found myself with students in many different natural environments. At first, the tendency was to always be talking, instructing. I eventually learned the difference between the outdoors being the backdrop for the lesson and the outdoors being the teacher. Whenever the outdoors was acting as teacher, my tendency to speak lessened, and the ability to be silent with a group of students proved to be effective. Getting students to connect to a place was aided by the sounds naturally occurring there; be it the wind rustling the leaves or a small group of deer making their way to a familiar feeding ground. As in music, a few moments of silence can raise a participant’s expectations of what is about to occur.

When I stopped working at outdoor centres, I moved to the inner-city of Toronto to work with youth. I still found myself intrigued by the different sounds. I often used music as a tool to connect with students and wrote songs that spoke to the different environmental, social and political aspects of where I was living. In fact, I always seemed to compose songs that acted as companions to where I was or what I was learning. I found when I put thoughts into song, I remembered them. The song medium gave me context and allowed for emotional expression of what I had read, seen or heard. The music enabled things to resonate within me.

Currently, I am curious about the way music and emotion can be integrated with place-based education to foster actively engaged students with a deeper sense of connectedness and appreciation for the natural world.

Music and Place

Gruenewald (2003a) describes place as a construct for cultural analysis. If this is true, then music may fit well within this context. According to Leavy (2009), “The use of music as a source of data in social research derives from the idea that music is a cultural text, and, as with other cultural texts, by examining music we can investigate a range of questions about the culture in which the texts were produced” (Leavy, 2009, p. 111). More than this, music, when performed, is a “site of embodiment for both the performer and the listener” (Leavy, 2009, p. 113). The production of music is a physical exercise that involves the use of the entire body for both performer and listener. Sound penetrates us, engaging us on a bodily level in fundamentally different ways than the visual, for example (Leavy, 2009, p. 113). In the Inuititut culture, songs are considered thoughts. These thoughts are “sung out with the breath when people are moved by great forces and ordinary speech no longer suffices” (Bennett & Rowley, 2004, p. 106). Through music, the Inuit were able to give expression to the part of the human spirit.
that “lies beyond the reach of words and actions alone” (Bennett & Rowley, 2004, p. 106).

Music-making can enable us to tap into our passions and emotions, opening up a diverse realm of possibilities. As Gruenewald (2006) claims, “Poetry makes me stop” (p. 3). Further, Gruenewald (2006) contends that “our experience of time—what we have time for and what we don’t—pretty much define who we are and what we believe in” (p. 4). However, in our fast-paced society, stopping is hard to do. Music can help us to stop and breathe, aiding us to reach towards our deep creative places. Through this process, we are able to ask ourselves questions like what really matters, instead of concentrating on what works (Gruenewald, 2006; Jickling & Wals, 2008).

How can educators use music in an effective way that can be engaging, encourage connections with the natural world and promote active citizenry? Elliot (2008) suggests that music needs to be looked at more broadly than solely a piece of music. Music should be viewed holistically to include the situated actions and pieces, products of all forms of music-making of all interested people involved. Within this practice, music becomes “revealing of one’s self and one’s relationship with others in a community” (Elliot, 2008, p. 54).

Elliot proposes that the basic part of what we need in order to reclaim our place in the public sphere—and to become articulate about and for music and music education—is an understanding of what listening to music involves. In Music Matters (1995), Elliot proposes a contingent heuristic model of musical works that posits that music work includes at least “six dimensions of musical meaning to listen for: musical design; musical representations of people, places and things; musical expression of various kinds of beliefs (personal, political and so on); and how all these above are interpreted and performed” (Elliot, 1995, p. 54). Within this model, music acts as a way of having meaningful conversations about musical-social consequences of students’ respective “beliefs, values, or the ethics and morality of their actions” (Elliot, 1995, pp. 55).

In this view, enhancing musical/rhythmic intelligence has nothing to do with what is commonly referred to as musical talent. It has to do with knowing how to use music and rhythm to put ourselves into optimal states for dealing creatively with different situations (Lazear, 1992). Music transforms into something that can bring emotion into the classroom, giving teachers and students another way of seeing, of opening to instead of closing off from, difference in a context of diverse experiences and ways of knowing (Greenwood, 2006).

Integrated within existing theories about place-studies (Gruenewald, 2003a, 2003b; Sobel, 2004, 1996), music adds yet another dimension and understanding of communities and local environmental issues. Further, music could help transform the language of current curriculum by infusing it with emotional conversations that stimulate students to think critically, and respond through creative expression and cooperative learning.

Orr (1994) often writes about the educated citizen, pointing to how much of the world’s destruction has been perpetrated by people who hold the highest levels of education. Is this a direct function of the messages implicit in our educational institutions? Although all of the answers cannot be prescribed through simply incorporating music within place-studies, this action does offer an avenue for bringing emotional content to the conversation, it can enable a sense of community and it could possibly allow students to critically view the places that they live. In the end, it will be hard for us to preserve the integrity of communities, species and the environment without establishing an “emotional bond between ourselves and nature as well—for we will not save what we do not love” (Orr, 1994, p. 43). I like to imagine that this emotional bond can begin to happen through varied types of transformative interactions, such as the kinds found within properly directed musical experiences.
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Singer, songwriter and current Master’s student at Lakehead University in Thunder Bay, Ontario, Mike Filipowitsch is constantly striving to find a balance between his passions for music and education. Twenty-five national tours and various stints as an outdoor educator over the last seventeen years have definitely given him a unique outlook on life.
Fishing: Learning to Live Well on This Land

By Andrew Lee

I recently embarked on a theoretical journey in which I learned much about myself in relation to the natural world. One of the most prominent things I learned was that how I carry myself impacts how I view the world and its many inhabitants. I will refer to this realization as my personal environmental ethic. On a recent ice-fishing adventure on a nearby lake, I was reflecting on this journey and realized that my specific passion for the outdoors might very well serve as a vehicle by which I can enable others to develop their own unique environmental ethic.

I believe that fishing can aid in fostering a certain ethical view of the environment. It allows participants to carry themselves into the world in a creative way that not only foregrounds Indigenous ways of knowing but also allows for a certain connection to be made with nature. Because fishing can be both a meditative practice and one of subsistence, it might prove valuable to the fostering of connection to the natural world and to alternative ways of knowing for students.

Fishing as a Meditative Practice

Fishing can be very meditative in nature, regardless of whether you fish for subsistence or pleasure and practice catch and release. In a book that I recently read entitled Catch and Release: Trout Fishing and the Meaning of Life, Kingwell (2003) describes the times in fishing when there appears to be nothing happening.

To the outside eye, perhaps, it seems dull and lifeless; we might even look as though we are doing exactly nothing. And yet, we are doing everything, all the complicated invisible things that fishing demands: concentrating, looking, thinking, wondering, calculating. (p. 126)

In drawing on this rather profound statement regarding the meditative qualities that fishing requires, I would argue that by designing curriculum in schools involving fishing, we might foster a greater sense of place consciousness and connection within our students. With some guiding principles for the activity, students will be afforded an opportunity to connect with nature in a unique way and engage in a practice that is not only historically relevant to many Indigenous cultures but that is also reflective and challenging to both the mind and the body.

In my experience as a fishing guide in Northern Ontario, I have recognized the meditative powers of fishing. I have seen the thrill of the catch, the necessity of the kill and the harmony that one attains simply by being out on the water and immersed in nature. Whether you are a novice, a seasoned professional or are completely new to the activity, the meditative powers of fishing can move you to be drawn to a specific region or to become an advocate for something you value. The qualities that fishing requires and provokes are ones that might lead participants towards developing their own environmental ethic. The connection that those who participate in fishing appear to have with nature is, in my opinion, equal to that of any other outdoor activity. Participants can pick their enjoyment at any level.

Fishing as Place-Conscious Education

It is important to note that I do not wish to simply employ fishing as a method to attain successful place-conscious education. Rather, I am attempting to unpack the philosophy upon which critical place-based education is based. Greenwood (n.d.) asserts that place not only provides a specific local focus for ecological experience, but also helps to break down the dualism between “culture” and “environment.” Because fishing, as a means of subsistence, is based on traditional epistemologies and involves a specific interaction with (and experience in) nature, it would appear to be a viable activity for students to make authentic connections.
with the natural world. The purpose of this participation would be twofold: it would engage students in alternative ways of knowing (culture) and would also engage them in the outdoors (environment), thus assisting in overcoming the culture/environment dualism.

Successful Curriculum Design

For the successful creation of a critical place-based curriculum focused on fishing, I suggest that those involved engage in dialogues with local First Nations and community members who might have historically relevant information based on the specific place where your school is located. Greenwood’s critical place-based theory notes the importance of knowing what has happened in the past, what is happening now and what some possibilities are for the future (Greenwood, n.d.). By educating students about what has happened in a given place from multiple perspectives, including those of First Nations, and educating about what is currently happening, we might foster creative imagination for the future and successfully engage in one aspect of critical place-conscious education.

Conclusion

By recognizing opportunities to engage in outdoor experiences, provide subsistence and foster an environmental ethic, all in their own communities, students might become more inclined to advocate for environmentally sustainable activities in their own regions. Granted, fishing is only one of these opportunities and may not be for everyone. I challenge readers to find something in their own community that engages students in the environment for a specific purpose and recognizes alternative ways of knowing. I have chosen fishing as one of these practices because of my personal background, the meditative qualities that fishing requires and provokes, and the specific Indigenous ways of knowing that are consistent with traditional fishing methods. Learning to live well on this land involves the formation of a specific environmental ethic that might begin to form from engagement in activities such as fishing.

I am referring to both the traditional Indigenous practices of fishing and the traditional sustainable methods of commercial fishing such as long-lining and jigging rather than bottom trawling.

References


Andrew Lee is a Master’s student in the Faculty of Education at Lakehead University. He grew up in St. Mary’s, Ontario, spending every free moment catching carp and bass in the Thames River and swimming in the historic “quarry”. During university he has studied in both the Faculties of Outdoor Recreation and Social Sciences at Lakehead. While working towards a Bachelor of Arts in History and a Bachelor of Education, he spent his summers guiding fishing trips in Northern Ontario and leading canoe trips in Algonquin Park. Looking forward, he hopes to continue researching the meditative practice that he believes fishing is.
I am a social worker who provides counselling to women who have experienced childhood sexual abuse, adult sexual assault and intimate partner abuse. In an urban location in the downtown core of Toronto, Ontario, I provide both individual and group counselling to women impacted by trauma in a community-based setting. Various modalities and theoretical frameworks that include feminism and anti-oppressive methods inform my counselling practice. I am often asked how such theoretical frameworks are integrated into my job. There are many interpretations of feminism and anti-oppressive practices that include broadening individual experiences into the larger social system. A clear example would be connecting women’s experiences of violence and abuse to the larger system of patriarchy, colonialism and systemic oppressions, such as racism, sexism, classism, heterosexism, xenophobia and pathology.

Often I hear women share that they are blamed for the abuse and violence that they have experienced. Where are these messages of fault, shame and blame coming from? How can I support women by deeply reflecting on the imposition of dominant values? Together we engage in a process of deciphering between values that have been harmful and values that they wish to now incorporate that can provide healing, growth and nourishment. The approach that I take in the counselling role is to provide a space for reflection, process and personal transformation.

I utilize nature as a means to connect individuals and communities with the concepts of reflection, process and
transformation. I believe that bringing nature into the therapeutic environment is a form of feminism and anti-oppressive practice. Aspects of nature, such as mother earth, can be used as symbols of feminine energy and have been honoured by many communities globally as vessels for healing. Whether it is participating in sweat lodges to offer our sufferings to mother earth or creating herbal remedies for the ailments of bodily pains, nature is utilized to endure in a process of healing, transformation and self-discovery.

For many years, I have been interested in developing a relationship with nature to guide my professional practice. When I witness the changing of the seasons, I come to an understanding of transformation. For example, a tree goes through many changes, from vividly coloured leaves in the fall, barren branches in the winter and sprouting buds in the spring, to fruitful flowers in the summer. Nonetheless, a tree remains a tree throughout this process. How can the example of a tree be part of a therapeutic healing process?

I will share a few narratives of various social work settings where I have incorporated nature into practice as a means to provide reflection, process and personal transformation while connecting the personal journey to a larger social commonality. I honour the teachings that I have been offered by many indigenous healers, academic scholars and the individuals to whom I provide service.

**Nature and Her Presence in Practice**

I have plants, seashells, stones, lava, rocks, soil and water in my office. At times I bring flowers and offer them to the women as transitional objects. Transitional objects, like a flower, can support women to bring the counselling environment (support, trust, compassion, etc.) into their everyday environment (home). The presence of nature in my office is done with intention; nature’s presence is used to support women in the process of grounding emotions and feelings as she describes voices, and explores and discerns her experiences of violence and abuse.

Representing generations of knowledge, stones and rocks are symbols of wisdom. When I invite a woman to hold a stone, I ask her to notice feelings she holds inside her. Holding and engaging with a stone can provide her with the opportunity to externalize her feelings, to acknowledge that feelings exist and that she can begin to explore the depths of her feelings. While holding a stone, we may discern a variety of questions. When did she begin to have these feelings? Where are they held in her body? What values lie beneath the feeling? What does the feeling need? Holding a stone offers her an opportunity to position her feelings outside of her mind and into an earth-bonding space of support.
Nature as a Vehicle for Healing, Transformation and Self-Discovery: Cultivating Healthy Relations with Emotions

I worked on a medical team as a mental health specialist for children and youth with life-threatening illnesses in an outdoor recreational program in south-central California. Much of what was expressed to me by children and youth was their relationship to death and the need to share what death means to them. Conversations of death and dying were an essential aspect of healing. Some youngsters felt enormous guilt for putting their parents and family through much pain; others expressed not feeling heard or understood in relation to their ongoing thoughts of death and the afterlife.

On one occasion, I invited a group of twelve-year-old boys to help sow seeds for an on-site herbal garden. We piled manure, compost and soil, taking our time to thoroughly mix each important component to nourish beds for sowing seeds. One boy commented, “Carolina, we need a whole lot of sheep manure to enrich this soil.” Another boy responded, “Ya, like us, we go through a whole lot of s**t to get through our pain.” I could not let this moment of total discernment pass by and asked the boys to pause for a moment and notice what was needed in their own personal lives to enrich their experiences. One boy responded with, “For my father to listen to me.” Another boy responded that he would like his mom not to worry and be stressed. All boys stated that they wanted to be loved and not viewed only as a disease. I heard all boys share the need to feel safe to express their emotions. Each boy shared his fears, hopes and uncertainties; how life was precious to them and how death was important to speak about.

Preparing the earth to sow seeds gave space to recognize the need to share, discuss and feel emotions. Being with earth provided playfulness and yet profound reflections. I feel confident in stating that much of what was emotionally expressed in the herbal garden by each child occurred because of earth’s presence to contain and embrace feelings.

Nature as a Vital Tool for Self-Care, Compassion and Love

Living and working in an urban setting requires great creativity when striving to engage with nature. I am often asked what small town or forest outside of the city I go to when I mention having spent the weekend with nature. I take long walks through Toronto’s local parks, such as High Park, Scarborough Bluffs and the butterfly conservation area. In the summer time, I often ride my bicycle to the lakeshore, take the plunge and swim in Lake Ontario. There is a wonderful UV-filtered and contained swimming area near Islington and Lakeshore that I truly adore. When I was in Havana, Cuba, I observed many Cuban families swimming in the ocean near the downtown Malecon (water wall). I thought to myself, this is the most accessible way to connect with local bodies of water. I noticed children and adults alike laughing, swimming and even fishing off the Malecon. I am a lover of water and have noticed that it is essential for me to spend time around and within bodies of water to support a process of unwinding and replenishing from the professional work that I do. Nature can maintain our sense of belonging. I believe that we can engage with nature from wherever we are, whether it be inhaling the air with intention and allowing air to bring in freshness, supporting urban organic gardens and taking the time to plant seeds or admiring the sun, moon and stars from all corners of the city.

Carolina Gana was born in Santiago, Chile, and raised in Toronto, Canada. She has a Masters of Social Work and provides trauma counselling in both English and Spanish to women who have experienced childhood sexual abuse, adult sexual assault and intimate partner abuse. Carolina is a global feminist, social justice advocate, nature-lover and devoted traveller. Carolina’s professional endeavours have led her to work with communities in the Dominican Republic, Nicaragua, Mexico, Iceland, California, Louisiana, British Columbia and Peru.
Combining Outdoor Education and Anishnaabe Culture in a Four-Credit Semester Program in Blind River

By Alexandra Thomson

A testimony about the New Trails program at W.C. Eaket Secondary in the Algoma District School Board, written by Alex Thomson, based on an interview with program teacher/facilitator Ryan Forsyth:

Before the course the kids weren’t achieving because they’re not attending class for a variety of reasons. But in the program they become part of a group. Because they have the same teacher and see the same classmates every day. We start with team building activities. They become part of a cohesive unit where their individual skills are appreciated. They’re learning skills, which boosts their confidence. If students aren’t achieving, we can spend a whole day on something. So they see immediate success and receive positive feedback. They start getting good marks, they start going to class and their character improves. I tell them “this is success. This is what success feels like”. And I believe success is addictive. Many of them start attending their classes and succeeding in the year after the program. Some of them need reminders about their successes after the program is over in order to continue to do well. Because of the success we’ve been having, it’s not surprising that we now have a partnership with the Mississagi First Nation. They support the program with equipment, supplies and a financial contribution.

Ryan Forsyth attended a four-credit semester program at Elliot Lake Secondary School in the late 1990s. The program, led by Mark Robinson, changed his life. Ryan found work in the outdoor guiding industry and went on to lead several month-long canoe trips in remote locations in Ontario. This led him to a teaching job in Moosonee, Ontario, after he received his teaching certificate from Lakehead University. Ryan taught for two years at Northern Lights Secondary School in Moosonee, where he led an Outdoor Education program and later taught at W.C. Eaket in Blind River, Ontario.

Sheila Nyman, the principal of W.C. Eaket, was immediately supportive of Ryan’s idea to implement an outdoor education program in conjunction with the First Nations community. They found financial support from the Gosling Foundation, and the Algoma District School Board matched the grant. They started making connections with the local First Nations community, who mostly come from Mississagi First Nation and Serpent River First Nation. The program, now called New Trails, was born. Recently, the Mississagi First Nation has supported most of the program’s financial needs.

W.C. Eaket has a Native resource worker, Reg Niganobe, who plays a key role in building and maintaining relationships with the local communities and Elders, promoting traditional Aboriginal culture with the school, and helping all students, regardless of their heritage, develop cultural awareness. He has been instrumental to the success of the program. Ryan says of the Blind River and area’s First Nations and Métis community: “You make a call to the community. And if it’s got to do with education, people will volunteer, and right away you’ll have what you need. It makes me wonder why historically that kind of partnership wasn’t utilized.”

Connecting with local First Nations communities, however, is a skill. People who know local protocols and who know the community know how to ask for support. Non-Aboriginal teachers should ask for help in developing this skill if they want to involve local First Nations, Inuit, and Métis leaders, artists, Elders, teachers, and traditional people in their school. Local friendship centres, post-secondary Aboriginal support services, and Band offices can help non-Aboriginal teachers develop these skills.
Teachers wishing to acquire these skills need to realize that “cross-cultural skills can only be developed in relationship” (Sutherland, n.d.). Teachers need to first develop friendships with local First Nations people in order to learn the skills involved in bringing local Elders and resource people into the school. Building relationships with local First Nations, Inuit and Métis communities takes time and needs to be nurtured like any significant relationship. A good resource is Chapter 4 from Our Words, Our Ways: Teaching First Nations, Métis and Inuit Learners, produced by the Alberta Ministry of Education (2005). Furthermore, Principals and school boards wishing to improve their relationships with local First Nations, Inuit and Métis communities should hire Native resource workers so that this expertise is within the school.

The students in the New Trails program have learned how to set up a tipi from local volunteers, and they participate in a sugar bush in March. Volunteers have taught the class how to make a big drum, which the students bring to local area elementary schools to teach younger kids. In fact, the name “New Trails” was given by a member of Bear Creek, a local big drum singing group who is one of the most famous powwow groups in Turtle Island2 at the moment.

Of the big drum, Ryan says:

It’s almost like a magical thing. It brings the kids together. You have to work together. It’s an awesome team task. You have to be on beat. They develop hand signals, you have to know how to hold the drum stick. You have to take care of that drum. You can’t swear around it. The drum represents the heartbeat, and needs to be treated with respect. It’s great for character education and for promoting local culture. It brings me closer to those kids.

The program also has the support of local Aboriginal professionals, and includes a weekly sharing circle led by a certified addictions counsellor. Many of the students are grappling with personal challenges, and being in the program helps their self-esteem. In the past, students have participated in a fasting ceremony, and they also might do a sweat lodge ceremony this year. Ryan says of the circles and ceremonies that the students participate in:

I take part in all those things, even though I don’t have any First Nations heritage. I have to sacrifice some of my privacy, and tell the students what’s going on in my life. But the students don’t disrespect me for that. It goes both ways. I share and so they share. I would come off as a phony if I didn’t do that.

The students also develop strong friendships with their peers, which last after the program ends.

When students are struggling with managing their own behaviour, Ryan finds that using a corrective, rather than a punitive, approach allows students to make good choices for themselves. W.C. Eaket Vice-Principal Brian Beauchamp has been critical to the implementation of this behaviour management strategy. Almost all students successfully complete the program with this guidance and the role modelling from the many adults involved in the program.

The program is based around physical education and leadership, geography, Native studies and English credits. The students are outside much of the time. The students become certified in the use of GPS and in map and compass work, and earn accreditation in chain saw use, ORCA Tripping I, Basic Flatwater, Basic Kayaking, WHIMIS, Skidder/Cutter operator’s license, Pleasure Craft operator’s card and Wilderness First Aid. They have used these skills to raise funds for the program, for example by cutting trees for a local home. Students also engage in a two-week co-op placement with local municipalities and tourism businesses to prepare for work in the growing eco-tourism sector. Finally, the program integrates elements common to many four-credit semester Outdoor Education programs, including cross-country and downhill skiing, fitness, and a culminating canoe trip. Students
say that it is the canoe trip that really creates bonds between students, and helps them recognize what they have accomplished.

The New Trails program has impacted many students and is strengthening the bonds of the community at large. The Native resource worker who works with the program told Ryan that before the program existed, there was animosity between the local First Nations people and the school. Ryan said:

The First Nations people felt like they didn’t have enough of a voice in the education system. If you don’t have community partners with your school, if there isn’t a dialogue, then people aren’t going to trust the school. The program has filled that void. It’s made education more relevant to the local population.

W.C. Eaket Secondary School has also engaged in other initiatives to ensure that the local First Nations are equal stakeholders in education.

Challenges do remain. Ryan says the biggest one is “keeping your energy level up... You always have to be aware of their safety. With Native cultural activities and overnight trips Reg Niganobe is there to support us, but with the daytime outdoor activities, I’m sometimes the only chaperone with the kids.” Since it is very difficult to find a co-teacher with the right skills and character, Ryan remains the only instructor. Luckily, the partnership with the Mississagi First Nation means that the program does have fewer financial challenges than Ryan expected it would, which allows Ryan more time to dedicate to improving the program.

Ryan gets supportive feedback from community members, teachers and parents. In the first year of the program, he received an anonymous gift of home-baked cookies that lay on his desk one day after work. He said: “I never did find out where it came from. I know it wasn’t the principal.” Those tokens of appreciation go very far for Ryan, who says teaching can be a lonely profession. Small gestures that just go to show how successful a program can be when so many people contribute. If there is any lesson to be learned from New Trails, it’s that it really does take a village to raise a child.

1 Protocol is “the code of etiquette appropriate to the customs of the people or community. . . . Each Aboriginal community has its own cultural and social traditions that translate into protocols that should be followed carefully” (Alberta Ministry of Education, 2005).

2 Turtle Island is the name that many First Nations, Inuit and Métis people use for North America. Its origin is several creation stories, including that of the Haudenosaunee (Iroquois), who live in what is now southern, central and eastern Ontario.

References:


Thomson, Alexandra. (n.d.) Seeing the homeland and the trees? First Nations/environmentalist relations in N’Daki Menan/Temagami 1986–1994. Available from the author at alexmackaythomson@gmail.com; can also be found online on ProQuest’s Dissertation Database.

Alex Thomson teaches Aboriginal Education and Outdoor Education at Lakehead University in Orillia. She has worked in youth camping for many years. She completed a Master’s degree in Canadian Studies and Indigenous Studies at Trent University. Alex is a qualified teacher looking for principals interested in starting up a similar program in the Peterborough/Orillia/GTA area. Please email amthomso@lakeheadu.ca if you’re interested.
I wish to foster dialogue with Ontario outdoor educators about our history. Five branches have shaped outdoor education in Ontario: agricultural education, environmental education, outdoor adventure education, ecological education and climate change adaptation. While each is a unique discipline, they all incorporate outdoor experiences. History helps educators more clearly describe the role of outdoor education in improving society by fostering awareness of human-nature interconnections.

**Agricultural Education**

The roots of outdoor education began during Ontario’s agrarian revolution as British Loyalists during the 1800s transformed the forested wilderness into a self-sufficient agrarian society. This revolution was perceived by Ontario’s first Superintendent of Education, Dr. Egerton Ryerson, as a way to transform the province from a British colony into a self-sustaining society that could support the industrial expansion of Ontario. While previous attempts to establish a public school system failed due to irregular student attendance, agricultural education facilitated increased school attendance as education systems became relevant to agricultural communities struggling with an environment that provided a subsistent livelihood (Davey, 2003). Agricultural education promotes Agricultural Science with direct experiences outdoors through farm work. By the early 1900s Agricultural Science had become a course for many secondary school students, while elementary teachers focused on nature study and school gardening. Traditional disciplines were connected to issues facing agricultural communities, and many students were assessed based on how they demonstrated their curricular knowledge through farm work (Thompson, 2009).

**Environmental Education**

As the gasoline engine took hold and Ontario’s automotive network expanded, some agrarian landscapes became urbanized. In the 1960s the Ontario Ministry of Education changed Agricultural Science to Environmental Science (Andrews, 2003). Public concern for the environment increased, starting the environmental education movement. Environmental education recognizes that people are one of many species on Earth, and teaches students to identify and develop solutions to environmental problems (Andrews, 2003). In 1965, the Ontario government permitted school boards with over 10,000 students to purchase land and operate environmental field centres to address social concerns about human impacts on the natural environment (Passmore, 1972). In the 1970’s environmental education began to shift to the classroom as science education transitioned towards lab-based studies (Pyle, 2001). Outdoor educators began to integrate outdoor pursuits into their environmental education programs to motivate students and teachers to continue participating in nature-based experiences. The term “environmental education” began to be used interchangeably with the term “outdoor education” (Andrews, 2003).

**Outdoor Adventure Education**

By the 1990s outdoor adventure education took a prominent role in outdoor education as Ontario entered an economic recession. Outdoor adventure education promotes personal social development (Henderson & Potter, 2001). At this time many school boards faced a shortage of financial resources and growing student populations (Borland, 2009). Outdoor centres were considered to be non-essential fiscal burdens and were closed. Surviving facilities had no choice but to appease school boards and the governing Conservative Party by shifting from environmental programming to more
lucrative outdoor pursuit–based programs. Outdoor educators began to offer these programs to school groups, the public, and corporate groups for user fees. Many new practitioners entering outdoor education at this time came to believe this was the way many outdoor education programs had always operated.

**Ecological Education**

In 2000, the Ontario Ministry of Education (governed by the Ontario Conservative Party) removed Environmental Science from the secondary school curriculum, promising to integrate ecological concepts across new science and geography curricula. Yet by 2003, few geography and science teachers taught ecology due to time constraints, a new curriculum, and a lack of attention to ecological concepts in the curriculum. Puk and Belm (2003) recommended outdoor education be integrated with ecological education and studied across all natural settings. Ecological education uses direct experiences in the natural world to promote awareness about human dependency on ecological services.

**The Future: Climate Change Adaptation**

In 2007, the Ontario Ministry of Education (governed by the Ontario Liberal Party) identified outdoor education as essential. A 2009 policy document mandates and guides its implementation across the curriculum. Educators are now expected to work with local communities to offer outdoor experiences that foster an understanding of humans’ place in ecosystems. At a current historical precipice where humanity needs to move from an oil-based economy to an alternative energy economy, outdoor education is again being identified as important for transforming the provincial landscape. I only wonder how outdoor educators will tackle this challenge.

**References**


James Borland, Faculty of Education, University of Windsor. This research is supported by internal scholarships from the Faculty of Graduate Studies and Faculty of Education at the University of Windsor. James can be contacted by email: borlandj@uwindsor.ca
This workshop came about because a storyteller and a scientist kept going out for walks in the forest and explaining the things that they saw to each other. The storyteller (Zabe) used folklore, Native myths and imagination to explain the wonder of the land, while the scientist (Greg) used chemical analysis, a geological timeline and physical principles to explain things. After many discussions about why they each explained things differently, they realized that different purposes and ways of seeing the world gave rise to different forms of engagement and occupations. There is a time and place for using creative storylines to captivate a young audience, but there is also a time and place for understanding the way the periodic table can be used to explain everything between the core of the Earth and outer space black holes. It is the wonder and desire to be outside on the land sharing our understanding of things that is important. For many educators working with elementary students, it is easy to simplify scientific concepts, but we must always remember that the inherent natural curiosity aroused when our senses interact with the landscape creates the opportunity for the development of interdisciplinary, integrated, higher thinking skills. So it is with this intention that we polished our magical thinking wand and donned our laboratory skull caps to explore some of the inner workings of the environment that succour our daily existence.

We structured our workshop to offer the participants choices among many simple story titles and questions, which, like a mature tree, offer a myriad of branches and roots, pathways that can be taken in order to illustrate the connection between science and the wonder we observe in our daily lives. The following are some examples and briefly outlined concepts that we offered. In this article, we will present just enough to spark a bit more inquiry so that you can hopefully provide explanations and tell stories at levels that are appropriate for your students.

Here are some of the choices we presented:

The story of life on Earth as told by your cast iron frying pan.

We went back in time 200 million years (exploring the concept of geological and ecosystem time) and told the story of a species (stromatolites) that changed the Earth's atmosphere, as we are doing now, causing iron to rain from the seas, wiping out numerous species. We then explored the resulting iron deposits, the role iron plays in our lives and how the concomitant addition of oxygen to the atmosphere allowed life to evolve in a direction that includes humans. We used the example of seasoning a frying pan to illustrate the process in reverse.

Why does a copper kettle make a better cup of tea?

In exploring the many answers to this question, we dealt with the concept of heat transfer in everyday materials that we might experience while camping,
such as tea kettles, rocks by the lake and fire, and even snow insulation in a quinzhee. Copper transfers heat at a faster rate than other cooking materials. (It is useful to know that aluminum and cast iron work best when you want that cup of liquid hot now.) We also deconstructed two cookstove designs to demonstrate their efficiency in moving heat from a fire into your cook pot.

*Purple New England asters—locoweed (neurotoxin) or critical vitamin supplement?*

We used the example of the New England aster (the purple flower we are all familiar with in the autumn) to introduce the concept and broaden our understanding of biogeo-indicators, plants that can tell us much about the geochemistry of the soil, bedrocks and dependent ecosystem we are in and some of the perils of transporting species out of their native habitat. We explained how New England aster concentrates the element selenium from the soil it grows in. In eastern North America, the native home of the aster, the bedrock and the derivative soils contain very little selenium. When the plant was introduced to the selenium rich soils of western North America, the plant took up toxic levels of selenium; when consumed by cattle, this kills the cattle and poisons the milk so it is unfit for human consumption. At the same time, trace amounts of selenium are absolutely critical to human health.

In the process of exploring the seemingly paradoxical effects of selenium, the story helps introduce the complex nature of chemical-human interactions and illustrates the importance of scientific literacy in facilitating informed decision making.

*What does a foram’s diet have to do with climate change?*

In this presentation, we introduced the foram, one of a myriad of simple, single-celled creatures that have lived in the oceans for millions of years. We explained how forams and their cohorts remove billions of tons of carbon dioxide from the atmosphere and help buffer (balance) the CO₂ equilibrium of the air we breathe. In the discussion, we shared the importance of variable rates of change (through time) in global processing. This led to the question, can the oceans help mitigate the global warming caused by CO₂ emissions? In the long term, yes; in the short term, no; knowledge and understanding of rates are requisite to the adoption and design of wise public policies.

Corollary branches of the story explore the limestone seen in southern Ontario and how it was formed and how the chemistry of bedrock impacts everything from the food we eat, the roads we drive on and the quality of our drinking water. (Note: When Greg learned all this in a lab, he used a $500 plus taxonomy textbook in trying to decode which foram he was looking at in each fossil. He had to determine the period of time and ocean it lived in after sorting through hundreds and hundreds of diagrams of cute little forams. Learning foram identification makes learning to identify a few local plants a breeze in comparison.)

We had other stories and questions but they will have to wait until you can join us on a hike.

Greg Lester is both a geologist and avid amateur ecologist who divides his time between the forest of Ontario and the near Carolinian forest of Alleghenian plateau of upstate New York. He was very impressed and delighted that the workshop participants were so eager to stretch beyond their comfort zone and deal with scientifically complex, technical material, to better serve their students.

Zabe MacEachren is always amazed at the new colours of rock Greg is able to find along the roadside. She is still very determined to prove that those purple apatite crystals Greg dug up along the roadside near her home in Kingston can be used in casting spells to wake up students to the magic found in the gray, white and black inanimate matter, sometimes referred to as rocks, as well as the chemical formula called photosynthesis that turns plants green.
Information for Authors and Artists

Purpose

Pathways furthers knowledge, enthusiasm and vision for outdoor experiential education in Ontario. Reflecting the interests of outdoor educators, classroom teachers, students and academics, the journal focuses on the practice of outdoor experiential education from elementary to post-secondary levels and from wilderness to urban settings. Pathways highlights the value of outdoor experiential education in educating for curriculum, character, well-being and the environment.

Submitting Material

The Pathways editorial board gladly considers a full range of materials related to outdoor experiential education. We welcome lesson outlines, drawings, articles, book reviews, poetry, fiction, student work and more. We will take your contribution in any form and will work with you to publish it. If you have an idea about a written submission, piece of artwork, or topic for a theme issue, please send an e-mail outlining your potential contribution to the Chair of the Editorial Board, Kathy Haras (kathy@adventureworks.org).

We prefer a natural writing style that is conversational, easy to read and to the point. It is important for you to use your style to tell your own story. There is no formula for being creative, having fun and sharing your ideas. In general, written submissions should fit the framework of one of Pathways’ 20 established columns. Descriptions of these columns may be found at www.coeo.org by clicking on the publications tab.

Whenever possible, artwork should complement either specific articles or specific themes outlined in a particular journal issue. Please contact the Chair of the Editorial Board if you are interested in providing some or all of the artwork for an issue.

Formatting

Use 12 point, Times New Roman font with 1.25 inch (3.125 cm) margins all around. Text should be left justified and single spaced. Place a blank line between paragraphs but do not indent. Please use Canadian spelling and apply APA referencing style.

Include the title (in bold) and the names of all authors (in italics) at the beginning of the article. Close the article with a brief 1–2 sentence biography of each author (in italics).

Do not include any extraneous information such as page numbers, word counts, headers or footers, and running heads.

Pathways contains approximately 550 words per page. Article length should reflect full page multiples to avoid partially blank pages.

Submit articles to the Chair of the Editorial Board or issue Guest Editor, preferably as a Microsoft Word e-mail attachment.

Each piece of artwork should consist of a single black and white drawing (cross-hatching but no shading) on 8½ by 11 paper.

Submit artwork to the Chair of the Editorial Board or issue Guest Editor either as a digital file (jpg is preferred) or as a hard copy.

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