### Partnering in a Living Event

# Evolution of a Way of Being

As I reflect upon my own journey as a person and as a teacher, I come to realize that I have always just naturally turned to the earth and the creatures of the earth as a source of energy and comfort.

Almost every photograph of me as a child involves the garden. My first two years of life were spent with my mother as she nursed my grandmother who was dying of stomach cancer. My grandmother wanted to stay alive long enough to see her lily bloom. She never said those words, but I knew it to be true and I told my mother so.

Together Grandmother and I watched it from her bedroom window, me under the covers, next to her soft flannel nightgown that always smelled of baby powder; she, propped against a pillow lying on a sheep skin pad my mother had purchased to prevent bed sores.

The lily was but a bud and would bloom soon. But not soon enough. Somehow, I sensed that that. And so, I waddled out to the garden determined to pick it. I heard my mother's scream of 'no' just as my fingers snapped the stem. "Now it will never bloom for her," my mother cried, full of despair and an anger impossible for her to suppress.

But we put it in warm sugar water and my grandmother did see the white translucent flesh of the open lily and inhaled its sweet fragrance the day she left us forever.

Eight years passed and time found my mother and I and her boyfriend living in a rented house in a small prairie town. It was a complex time for all of us. My 'step-father' was possessed by an unnatural love for me and it threw all of us into a place of pain and fear. Instinctively, I once again turned to nature. I planted a huge garden where none had been and I fell desperately in love with Tom, the milkman's horse.

Tom was a beautiful Clydesdale who clip clopped by our house each morning at six am and stopped, without any signal from the milkman who would run to our door and leave two glass bottles of milk.

In the beginning, I lay in bed, waiting for the comforting sound of that clip clop, for the stopping of the sound as Tom patiently waited for the milkman to deliver the bottles, and then the return of the sound of the clip clop grow dimmer as it stopped and started again down the street.

Soon, I began to look out my window, watching the horse and the man. It was the horse who captured my attention. I had never seen any living thing more beautiful. He took my breath away.

Finally, I gathered enough courage to leave my house and stand by Tom as the milkman delivered the milk. Those precious moments became the focus of my life. I would touch Tom's soft nose with my forehead. I would bring him bits of apple or carrot or oatmeal. I secretly considered Tom to be my horse. When he was changed to a different route, I thought I would die.

Many years later, my own daughter and I were on a slow train travelling from Moscow to St. Petersburg to visit the Winter Palace. It should have been a joyous time, and was in a billion ways, but for one. A dear friend was abandoning our relationship to focus his energy on a person who he thought would further his academic career more than I could. He told me he was trading compassion for cognition. I was experiencing a deep sensation of betrayal. But we were all on the same trip, all worked at the same university and I had to manage my feelings, not an easy thing for me to do.

I sat on that train and began to write. I began to write the story of a young girl in love with the milkman's horse. In between words, I would look out the window and see the snow covered branches of poplar trees, just like the ones that grew along the highways in Saskatchewan. The snow comforted. The memory of Tom warmed me. I closed my eyes and remembered the clip clop of those huge beautiful feet. My daughter sat beside me to share a pot of tea and some Russian cakes. The tea was strong and bitter. I held a lump of sugar between my teeth and sipped.

Teaching came to me early in my life. In the sixties, there was a huge shortage of teachers and after just one year of Teacher's College, I found myself teaching English in a large high school in Prince Albert, Saskatchewan.

The school, Riverside Collegiate, was so named because the Saskatchewan River ran right by its strong brick walls. I taught in that school for seven glorious years.

Each year, before we delved into any book, any assignment, any 'formal' learning, I had a practice of taking the class down to the river to play. In those days, you could do such things. I never got permission. I never got parents to sign release notices. We didn't worry about being sued. It was a small town and life was a lot more natural back then. And easier.

Sometimes we would go each day for a week, or longer. No one questioned my taking the students on a field trip. I am guessing they imagined I was teaching poetry or having them write about nature. The truth was, I wasn't really teaching at all. But

I was learning. Learning about them, who they were, how they interacted with one another. We were becoming a group of people who were going to spend the greater part of the next year together and I instinctly felt the outdoors was the best place to do that.

Had you asked me, I would have said that I wanted to feel the beat of their hearts before we began the journey of learning curriculum.

We dug for clams, threw rocks, caught minnows, made small rafts out of willow sticks. We told stories, helped one another up and down steep banks. We became a family. Sometimes we'd troop into town and eat shoe strings potatoes and gravy at Bob Chow's restaurant. I never questioned the value of this time spent getting to know one another. I doubt it would be possible to do that today and I am sad that it is not.

It is still possible to do these things at the university. It does take some formal permission taking; but the students can give you the permission. And so, each year, my graduate students have come to a botanical garden I have created on three acres in a rain forest in Washington State, to be together in nature. It has come to be one of the most treasured experiences for all of us, students, their loved ones who often join us, and me.

Two years ago, I sold my garden and my town house in Vancouver so that my daughter and I could live in the company of horses. Why? Because something deep inside me felt horses had a lot to teach me. Because some yearning in me understood that it would bring renewed energy and life to my retirement years. Because more simply, the horse called to me, and I responded.

### The Way of the Horse

"The animal is there before me, there close to me, there in front of me—I who am following after it. It surrounds me" (Derida, 2002, p. 380).

Gittins (2013) in her examination of the way ancient peoples understood their relationships to animals makes a very interesting case for the significance of animals on human history. Her study of the archaeology of the People of the Upper Palaeolithic and their being socially linked to animals led her to claim that humans have been so dependent on animals that "it is difficult to say that animals could change history, could influence the outcomes of our lives now from their actions then, but I think it is *at least* possible to say that history would have been impossible without them" (p. 131).

An interpretation of the tattoos of nonhuman animals etched upon the preserved human bodies from a Pazyrk archaeological culture of Inner Asia has led Argent (2013) to suggest that to enlightened people, "riding can be seen as an interspecies apprenticeship process, where both humans and horses pass along social knowledge as thoughtful actors with defined roles. From this perspective, the horse tattoos are presented as polysemic materializations of the bonds between particular Pazyryk horses and people, of blended identities, and of cosmological values related to time, memory, and belonging" (2013, p. 170).

Ancient peoples and indigenous peoples have long recognized and cherished their relationship to animals and to nature. As scientific thinking and, even more recently, technology worked to move humankind away from its awareness of its essential link to and reliance on nature, many began to lose interest in nature except to exploit it for pleasure or profit.

Kahn, Severson & Ruckert (2009) claim that our interest in and attraction to nature is a fundamental, genetically based human need and uses the term "biophilia" coined by E.O. Wilson in 1984 to discuss this need. If we loose this relationship, we lose part of who we are.

Rose (2011) has discovered that biophilia- and biosynergy (induced *relationships*) tend to produce different outcomes. Bonds formed through biosynergy are likely to harmonize human/nonhuman cooperation, and lead to mutual satisfaction of human, nonhuman, and ecosystem needs. Biophilia motivates humans to bond with other animals principally for human satisfaction; this can lead to overlooking or dismissing the broader needs of the nonhuman animals and their ecosystems.

Corning (2003) suggests that synergy is more than a driving force in the evolution of life, but is a crucial factor in assuring the fate of humankind (p. 454).

Research would suggest, then, that my desire to spend my golden years in the presence of animals, surrounded by nature was a need to retain my humanity. One thing was for sure. I was determined to have a biosynergy-induced relationship. My daughter, born with a missing chromosome, had to take artificial hormones in order to grow and to develop into healthy womanhood. Those hormones had come from the urine of pregnant mares. The mares lived a terrible life of pregnancy and abortion, or pregnancy and separation from foal, reduced to living laboratories of hormone production.

I wanted to pay back. I rescued a thoroughbred racehorse named Lady

Rhythm. No longer able to win races or produce expensive babies, she had become a liability. And she was to be given away or taken to slaughter.

She became my first large companion, an introduction to a new way to communicate, a new way to be in the world. Wise, graceful, gentle, she was willing to forgive the abuse she had suffered at the hands of owners who had exploited her and she began to teach me the ways of the horse.

The first lesson she taught was that horses value social communion so much they will risk all to be with other horses. I had been told that though herd animals, they would be content to live alone if other horses were in the neighborhood.

Lady Rhythm taught me that was untrue. She called to the neighbor's horse. She stood by the fence staring longingly in his direction. She faced the direction of the ranch she had come from for hours and hours. She kept telling me what she needed and I kept feeding her bits of apple and spending as much time with her as possible. I had no real idea of what she was trying to get me to understand.

So she did what she had to do. She used her strong body to burst through a wooden fence, race through a blueberry field, jump across a wide ditch, race a train, run for ten miles in a few minutes and finally, tear through an electric fence to be with a herd.

I located her bleeding, wet with perspiration, but happily grazing with her new family. She didn't run when I approached her. It was as if she knew she would be found, would be returned to my place. She had escaped because it was the only way she could make me understand how desperate she was to live the life a horse is meant to live. With their own kind.

In search of a companion, I discovered Twilight, a Chincoteague Quarter Horse mare. It was love at first sight. She was way over my price range, but once I had met her, I could think of nothing else, talk of nothing else. Twilight had chosen me, she had spoken loud and clear, galloping to the fence when I came to visit the farm, leaning over and pulling my hair. She whinnied when I left to look at other horses that were also for sale. She stamped her feet and complained loudly. When I left, aware that this horse was way too expensive for me, she raced after the car for as far as the fence would allow.

When I returned a week later, Twilight trotted right up to the gate, confident that she would be returning with me. She was right. She was irresistible.

Two minis and two lamas soon followed and Lady Rhythm was happily part of a herd.

A herd who teaches me something new every day. One of the saddest lessons was when Twilight and Lady Rhythm ran away. An angry police officer woke me up in the middle of the night warning me that I 'd better take better care of my animals or I'd end up in court. "These horses were racing down the highway. Could 'a killed someone."

I was astonished. I was certain they were happy, would never run away. What were they doing on a highway heading South East. South East, the direction of Roy, WA where I had rescued Lady Rhythm.

The next morning Lady Rhythm was agitated. She wouldn't eat. She was filled with a terrible anxiety followed by what could only be described as sadness. Her body lost energy, her head drooped, her eyes half closed. Twilight would not leave her side. She stood patiently, what? Protecting? Comforting?

I phoned the previous owner and reported what was happening to Lady Rhythm, inquiring if she had ever responded like this before.

"We put her down two night ago," The woman told me.

"Who?"

"Dusty, she'd been with Lady Rhythm for all her years as a brood mare."

Dusty was the horse the owner had tried to convince me to take when I took Lady Rhythm. But Dusty was very old and not well and I felt inadequate to be reaponsible for a horse like her when I knew nothing about horse care.

Lady Rhythm had asked Twilight to come with her to be with her old friend who was dying. Over two hundred miles away, she knew what was happening to Dusty and being the caring motherly creature she was, Lady Rhythm had determined to be there to support Dusty. Twilight, who understood, had joined her.

Loyal, courageous, telephathic, loving, horses form relationships that we tend to forget about as we go about buying and selling and even rescuing them. I had a lot to learn and these magnificent creatures were willing to teach me.

Scientists who might have mocked this description, insisting that I was making up the story rather than listening to what my horses were telling me, have now contributed explanations for horse and animal behavior.

"Quantum physics research during the last 20 years has discovered that physical objects are not as separate as we once thought they are. At the quantum particle level, all separateness disappears and everything is connected. Schrödinger described this process as 'entanglement'" (Erickson, 2011, p. 145).

Erickson goes on to explore the historic study of telepathy in animals, particularly the work of William J. Long who in 1919 described animal telepathy as "a natural gift of faculty of the animal mind, which is largely unconscious, and ... the animals inherit this power of silent communication over great distances is occasionally manifest even among our half-natural domestic creatures" (p.29). "Because of intuition's apparent independence of distance, theorists have explored the quantum phenomenon of entangled non-locality" (Bernstein, 2006, p. 8).

Erickson speculates a very positive outcome with an acceptance of the notions of telepathy that is also the natural way of the horse. She speculates that transparency and empathy would emerge, as it would be more difficult to witness suffering without feeling a response. She links her ideas with Grosso's who associates telepathy with animal liberation. "It would be more natural to acknowledge that nonhumans suffer as well as experience pleasure, and we would more readily share their pathos and enjoyments" (Grosso, 2010; p.3).

The research on telepathy and its potential for greater understanding and increased concern for the other not only reflects the way of the horse, but could hopefully lead to more humane treatment of animals. Admitting that animals have feelings could lead to changes in laws regarding the way humans exploit animals.

There is a second aspect of animal knowledge that could deeply influence social interaction. Kathy Pike, founder of the Mind Body Method and leader of Equine Experiential Learning describes the stories of her life experience in equine facilitated workshops in her book, *Hope...From the Heart of Horses*. Those stories reveal something more and more equine specialists are coming to recognize:

Our thoughts, both conscious and unconscious, create a state of being in our bodies, and the power of being heart-centered. Since horses are finely tuned to the intentions, energy (or emotion), and thoughts that a person hides, they can reflect back to human's state of being and offer opportunity for learning" (2009, p. 189).

Similar stories appear in the work of Mark Rashid, author of *Horses Never Lie* (1993) and *Nature in Horsemanship* (2011). He explains the function in the brain driven by mirror neurons which permit the horse to reflect back to us the truth of what we are thinking and feeling (p.173).

These two aspects of the horse, their ability to communicate through telepathy and their ability to reflect the real thoughts and feelings that we are consciously or unconsciously experiencing triggered the idea to use horses in teacher training.

# Turning to the Other

For this part of their training, student teachers were invited to engage with any "other" for one day on a small farm owned by the professor. The "other" consisted of four horses, six chickens, two llamas, four ducks and two doves. The relationship was not the usual one of humans using animals or controlling them. It was a dialogic relationship.

In preparation for the day at the farm, one of my formal doctoral students, and present colleague, Dr. Charles Scott, visited our classroom and introduced the students to Rice and Burbules (1992) and Burbules (1993) who argued the significance of educational relationships to human and social flourishing, and developed a neo-Aristotelian model of what they call "communicative virtues," defined as "dispositions that enable communication, especially between partners who differ in terms of their linguistic styles, experiences, or beliefs."

Scott focused on the need for real experience in alluding to the Aristotelian perspective out of which Burbules' work emerges, reminding the student students that the 'communicative virtues' are pragmatic—they are not learned as principles or imperatives, but arise out of our efforts to establish a way of life.

Student teachers in my module had studied the work of Buber and had practiced dialogic relationship as a way of commuting with secondary students. In *I and Thou*, Buber suggests we can have dialogue with nature, with other people, and with spiritual beings: "Form's silent asking, man's loving speech, the mute proclamations of the creature, are all gates leading into the presence of the Word" (1958/2000, p. 98).

As part of the farm experience, each student was instructed to select a creature and connect with it in some way. They were invited to be present and attentive. The farm, being a different setting from the traditional classroom in university or school, and the request to dialogue with the creature provided what Bakhtin calls "carnival".

Carnival is the place for working out, in a concretely sensuous, half-real and half-play acted form, a new mode of interrelationship between individuals, counter posed to the all-powerful socio-hierarchical relationships of non-carnival life (1984, p. 123).

It was my hope that the carnivalesque setting would encourage what is often called "a beginner's mind.

Dialogue is characterized by people who surprise themselves by what they say. They do not have all theory thoughts worked out in advance but are willing to be influenced by the conversation itself. They come with questions to which they do not yet have answers. And they do not demand answers of others (Isaacs, 1999, p.136).

During the connection in this carnivalesque setting, students played music, feasted on roasted meats and sweet potatoes and connected with one another and the many creatures on the farm. The rather raunchy nature of carnival, of course, was omitted.

Because students were being asked to engage with beings who do not use speech as a way of communicating, it was important that they be focused and present. Animals, especially prey animals, communicate with telepathy. Students were invited to walk silently about the farm, focusing on their breathing, to ready themselves for the engagement with the nonhumans. "Telepathic interspecies communication may be facilitated by utilizing specific meditation techniques to quiet the mind, slow the brain waves, and shift consciousness to a level outside of time and space" (Erickson, p. 145).

As part of their previous work in writing, they had practiced imagery, focusing on specific intentions. "The 'meaning' of images is the simplest kind of meaning, because images resemble what they mean, whereas words, as a rule, do not"(Russell, in Slater (ed.) 1986. p. 292). Animals who do think in images, are known to tell the truth. It was my intention to prepare the students for possible communication in a new and powerful manner.

Though students were instructed to be present in their "turning to the other", they were also asked to leave their minds open to a flood of memory. I asked them to notice any memory that came to them during their experience with the farm animals. I did this in the belief that dialog with the 'other' promotes memory. "At any moment in the development of the dialogue there are immense, boundless masses of forgotten contextual meanings, but at certain moments of the dialogue's subsequent development along the way they are recalled and invigorated in renewed form (in a new context) (Bahtin, 1984, p.170).

Toni Morrison (2008) beautifully describes this process when asked how she knew the emotions of her ancestors as depicted in her novel, *Sula*. Morrison said she opens herself to a flooding of memory. She says it is like the Mississippi River. You damn it up, but it floods. That is because it is remembering its past and repeating the journey. So it is with writers, they remember their past and write with a flood of emotional memory (p. 77). "If writing is thinking and discovery and selection and order and meaning, it is also awe and reverence and mystery and magic" (p. 71).

Memory from the past comes into one's consciousness as implicit memory, the emotions, sensations, perceptions that come from the past.

Siegel and Bryson discuss creating cohesive narratives by integrating implicit and explicit memories and shining the light of awareness on difficult moments from your past, thereby gaining insight into how the past is impacting your relationship with your children (and in this case, with students). They recommend bringing one's former experiences into the present and weave them into the larger story of your life (2011, p. 91).

Each student was invited to write a three page narrative of the memory that had flooded while engaging with the nonhumans. The narrative was to focus only on the memory, not the event at the farm that had prompted the memory.

It was my belief that narrative would reveal some elemental and important aspect of identity that would influence their teaching practice, which in my mind, is all about relationship.

Contemporary critics across the board are now, in effect, urging the adoption of a new paradigm which understands that the discourse of "science" has erected a false god; their growing concern with moral questions leads them to re-evaluate the methods via which we discover "truth," and chief among these is a return to narrative as a fundamental activity of the human race (Tally, 2001, p.15).

Narratives were sent to the professor for evaluation. The narratives were powerful and personally meaningful and deserved careful attention. They served as an opportunity to develop skill in improving writing as well as provide a level of awareness of self and one's way of being with others.

The narratives were returned and the students met in class. Several students were invited to share their narratives. After we had enjoyed the stories as compositions and discussed ways to write effectively, we then turned to the event which had triggered the memory.

It was a bit surprising to me that no one student had the same trigger as any other student. Each was unique. Some were very subtle. The events could not be predicted or arranged. It became clear that the process had to be natural and you had to trust it.

The next task was to write down for private viewing what you learned about yourself from this combined event (being with the animals and writing of the memory) and the reflection of it. Students were invited to look inside to learn what this might mean to them as teachers. Would the way they were with non human creatures represent

something about how they might be with students? Would the memory that had been triggered reveal something important about them as teachers?

Though students were not required to read their reflections, we did have a discussion. The discussion was so rich, it took several days to give ample time for all the students who wanted to share their narratives to do so at their own pace. This was not a process to be hurried. It was a time for patience and acceptance and understanding. As students were learning about themselves, they were learning about one another and developing a deeper connection to the group.

The following week, student teachers went out into the schools for a week long practicum. They were expected to do some observations, some one on one engagement with students and to teach a few lessons. One of the "assignments" student teachers were given was to journal any thoughts they had concerning their experience on the farm, their narratives, and the ideas they had about their own way of being with others.

Upon return to the university classroom, student-teachers spent another two days sharing any behaviors that reflected how they had been on the farm and/or had been influenced by their remembered past experiences.

# Philosophical and Scientific Ideas Examined

As described, to prepare the students for the farm visit, they were introduced to the work of philosopher Buber which when reviewed after visiting the farm, led to a study of recent research on forms of animal communication.

Our focus on Buber had been his work on dialogue as ontology. We examined *I and Thou* in which Buber contends that you can "turn to" the other in a dialogic manner and enhance your awareness of the other, suggesting that it is possible to become aware of the address even in the most casual encounter, where something, "however imperceptible," occurs between two or more such that one becomes aware of the other as a "partner in a living event" and that you can share this event be it human, animal, plant, or even stone" (Buber, 1965, p. 74).

Buber describes how we receive not specific content but a "Presence" which contains mutual relation, confirmation of meaning in every event grounded here in the world (1958/2000, pp. 104-105).

While the word and response may come through speech, neither the "saying" nor the "listening" are limited to speech, nor are they limited to humanity.

This review led an investigation into the world of communication in the animal kingdom. Most students were aware of communication between whales and dolphins and chimpanzee. However, the complex languages of such creatures as prairie dogs came as a huge surprise. Listening to an interview with the biologist, Professor Slobodchikoff on the Current, CBC News (http://www.cbc.ca/news/technology/prairie-dogs-language-decoded-by-scientists-1.1322230) intrigued the class and made them keen to experience the farm in a different way. They wanted to come back and let the animals teach them again.

They were delighted to discover and examine the wealth of research on animal communication that has been conducted recently, especially in the neurosciences. Wesson's research on sniffing suggested that how one animal sniffs another is very significant. "This sniffing behavior might reflect a common mechanism of communication behavior across many types of animals and in a variety of social contexts. It is highly likely that our pets use similar communication strategies in front of our eyes each day, but because we do not use this ourselves, it isn't recognizable as 'communication' (Wesson, 2013, p. 57).

Articles written about Kanzi, a male bonobo, brought to light a most important realization about the expectations we have about learners and the situations in which they learn. BBC reporter, Rebecca Morelle, revealed some interesting facts and issues around communication and interspecies communication. She reported that Kanzi is said to be able to understand about 3,000 words, as well as simple sentences. His trainer Dr. Sue Savage-Rumbaugh has said he can even combine words to form simple sentences of his own.

Dr. Zuberbuhler, a linguist, makes an interesting point when he comments on the chimp's intelligence. "But [he] is tested on human linguistic systems, not on his own natural way of communicating, and this is an artificial system. It's fascinating, thought-experiment-wise, to consider what that might mean for the whole relationship between humans and animals. Paradigms would be shifted, for sure". (BBC News 2007, Animal world's communication kings by Rebecca Morelle. http://news.bbc.co.uk/2/hi/science/nature/3430481.stm)

This information gendered discussion on how we ask students to perform in artificial ways all the time. Most often it is on our terms. With globalization a fact of today's education, being aware of how we evaluate a student's ability must take into account the different languages and cultures operating in the teacher/learner relationship. Examining speech and ability to communicate in animals provides a way to "see" this when we might overlook it in human interaction even when a careful consideration of how we examine and evaluate others makes bias quite obvious.

Of course, we understand this on one level, but when we actually work with a person we soon forget it. Animals, however, provide an opportunity to heighten our awareness because it jars us into alternative thinking.

In the Atlantic Monthly, Garbar (2013) interviews animal researcher, Dr. Slobodchikoff concerning his research on deciphering animal language. Slobodchikoff feels that understanding the communication systems of animals will be world-changing. He reminds us that something like 4 million dogs are euthanized every year because of behavioral problems. He believes that most problems are because of the lack of communication between animal and human. Slobodchikoff hopes that in the future we might be forming partnerships with animals rather than exploiting them, and "once people get to the point where they can start talking to animals, I think they'll realize that animals are living, breathing, thinking beings, and that they have a lot to contribute to people's lives".

### Case Studies

Several students have given me permission to share their experiences, narratives, and self discovery as a result of the farm, the writing, the practice teaching and the follow up reflections and discussions.

A young man wrote about a time in the eighth grade when he had joined a group in mocking a classmate from Peru who had learned to speak English by watching television and had confused the words 'constipated 'and 'anxious'.

Afternoon Television and the Delicate Art of Language

I was raised on TV. No, not literally. I didn't, you know, grow up as the precocious young son on a CBC sitcom circa 1987. But you know what I mean when I say I was raised on TV, don't you? I bet you do. Language is funny that way, isn't it? We take it for granted sometimes too, language. It's a bit like oxygen, no? I figure that as a kid, I probably absorbed the language of TV as easily as I absorbed the English language that I had heard from every member of my family and my friends' families and my teachers and my coaches and my corner store owners and, well, you get the idea. Communicating has always been so easy for me, and I would venture a guess that, outside of my French classes in school, I have spent exactly zero days and zero hours and zero minutes struggling to understand or be understood by others.

My friend Pablo hasn't been so lucky. Pablo, like me, was raised on TV too, but the TV he was raised on was of the Spanish language variety. Pablo's family came to Canada from Chile during the summer that he and I were 13. I can

imagine that TV probably started to get confusing for him after his arrival. All of the faces on TV, even the familiar ones he might have known from his favourite American shows like "Family Ties" and "Growing Pains" were no longer speaking Spanish, they would now be speaking English. I bet it was strange seeing Michael J. Fox use unfamiliar words in a voice that seemingly didn't belong to him. I wonder if people on TV seem less 'real' and kind of puppet-like when you hear them speaking an unknown language.

When I first met Pablo, I had no idea that his family had had some trouble with a sticky red bureaucratic substance. When they arrived in Canada, which meant that Pablo wasn't allowed to enrol in school for close to six months after he arrived in Vancouver. When I asked him about it recently, Pablo claimed that those six months were the best part of his first year in Canada.

When Pablo's family first arrived in my neighbourhood, I was excited to finally have a kid my own age living right next door. For the first part of that summer, my new neighbour and I would spend countless hours on our respective athletic training grounds that, if you are familiar with athletics, or have eyes, would recognize as nothing more than the shared covered garages of our parent's "Cedar Village" duplexes in North Vancouver. I would often see Pablo outside perfecting his soccer skills, which would then make me feel guilty about not practicing my hockey skills (if you could call them that).

Seeing Pablo out there, tall, strong, ridiculously agile, and already growing into a man's frame at thirteen, inspired me to venture outside and at least make a small effort at improving my wrist shot. Or what I thought was a wrist shot anyways. Looking back, I can imagine that we were quite the pair. Pablo, taking shots on a "net" drawn with athletic tape onto the faux-wood aluminum siding of his home, and me, flailing away at an orange street-hockey ball with a stick whose blade had been ground down to something more akin to a battered shoe horn than any sort of useable piece of sporting equipment.

Pablo and I maintained this routine of 'dry-land' training for the entire summer before I, or we actually, were supposed to start grade 9. Early on, during that summer, I had tried talking to Pablo whenever I saw him in his garage or anywhere else around our housing complex, but it never got beyond one or two simple questions. As the summer wore on I gave up. It was too much work for me, trying to pull one word responses from this kid, especially when the responses were never more than a series of things like "noh" and "jess." And besides, he looked happy enough, wordlessly banging that soccer ball off of his side of the garage wall. Who was I to trouble him with a conversation he wasn't going to understand?

Little by little I stopped going outside to play with Pablo. I don't remember seeing him at all in August of that year, and I definitely don't remember talking to him until the day he showed up in one of my drama classes halfway through the school year.

I politely nodded to Pablo when I saw him, which was something I had seen grown-ups do when meeting fellow acquaintances. Pablo returned my nod with a huge smile and a gregarious wave. He came over to me and said with a grin, "yo, how come you don't play hockey no more outside your house?" I couldn't believe it. This kid could speak! Were we about to actually converse?!? And why didn't I play hockey outside my house anymore? I didn't have much time to ponder this question, or process Pablo's miracle of speech, because our teacher, Mr. Broughton, had just entered the room.

Bill Broughton was, in the kindest way I can put this, Sutherland Secondary's requisite weirdo drama teacher. This guy looked so much like a drama teacher that it bordered on sarcasm. He had a beard and wore denim overalls with strategically and artfully placed paint splatters. He sported elaborate scarves and odd hats I year round, and was fond of storming out of classes and play rehearsals in fits of demonstrative-script-throwing emotional trauma stemming from his students "refusal to emote like real-live-actual-human-beings!" Mr. Broughton was great.

Even though Pablo was new to our school, he didn't seem to have any trouble fitting in. I was kind of jealous of him. As I said, he was tall and athletic and, well, the fourteen year old me would have never admitted it, but Pablo was (and still is) downright dreamy. None of those physical qualities, though, could stop Pablo from suffering through a terrible embarrassment in those first weeks at his new Canadian high school.

As much as I was impressed with how much Pablo's English had improved since I had first met him, I was still a little surprised that he had wanted to take part in our school's Spring Break Drama Club presentation of Twelve Angry Men. For the two weeks leading up to our auditions, I rarely saw Pablo without a copy of the script in his hands. I would see him on the bus, eyes closed in deep concentration, mouthing the lines of the 'Juror number five.'

I can remember now, on the morning of the auditions, seeing Pablo clutching a script that looked less like something that was once paper and more like a

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wrinkled and tattered scrap of a treasure map from the prop department of a cheesy made-for-TV pirate movie. I laughed when I saw Pablo in the drama room that day. He came in full costume, a grey suit with a white shirt and a cornflower blue tie. He even wore a Twelve Angry Men-ish fedora. He must have really wanted that part. I teased Pablo about his suit. I asked him if his dad was going to notice that it was missing from his closet. I also joked about Pablo's script. I asked him if his mom had put it through the washing machine or something. Everyone laughed. Pablo laughed, too.

The real laughter in the drama room that day, didn't take place until rehearsals were well underway. I read my part, 'Juror number 7,' with ease. I had only started studying my lines two days before. Pablo read shortly after me, and it didn't go so well. He kept getting flustered and forgetting his lines. He kept getting stuck on the line that was easily confused. It went something like, "maybe they learned something we don't know." But the line just wouldn't come out right. The angrier Pablo got, the worse his memory seemed to be. Finally, mercifully, Mr. Broughton put an end to Pablo's suffering. He asked him, "Pablo, what's wrong? You seem to be having a hard time there, is everything alright?"

"Yes, I'm okay, but I'm just feeling really constipated and I can't get these lines." Now, even the most respectful adults would have had a hard time stifling a laugh at this line, but in a room full of grade eighth and ninth grade students? Forget about it. People were on the floor. They were laughing in that way that actually makes your sides hurt. I laughed with them. My sides hurt. Pablo laughed too.

Mr. Broughton tried again. "Pablo. You can't remember the lines because you are constipated?"

"I'm sorry Mr. Broughton, I'm just so constipated, it makes it hard to remember everything."

Again, much laughter, and even some pointing. After the rehearsals, word of Pablo's medical condition travelled the hallways pretty quickly. Kids were calling him "Ex-Lax" in Gym class, and in the cafeteria, a bizarre chant of 'Pab-lo Prune Juice! Pab-lo Prune Juice! 'started when he walked in. I didn't join in, but I didn't exactly stop anyone from doing it either. Pablo wasn't laughing anymore.

Many years later, over dinner with Pablo and his wife, he brought up the audition story. He said, "do you remember that time I said I couldn't remember any lines for that play because I was constipated?"

"Sure," I said. Hoping that Pablo had forgotten, or was, at least, not going to remind me that I hadn't stuck up for him all those years ago.

"Well," he said. "All that time during my first year here, maybe you remember, I wasn't going to school. My mom and dad were at work, and I had nothing to do and no one to hang with, so I just sat in my room and watched TV all day. That's actually how I learned to speak English so quickly. Anyways, I would see these ads for laxatives that asked 'are you constipated?' and they would play sad music and show people who looked totally stressed out and, like, rubbing their temples, and scrunching up their faces and stuff. So, I though, constipated had to mean stressed out, so when Broughton was like, 'Pablo, why can't you remember your lines?' I thought I was telling him that I couldn't remember them because I was stressed out, not because I couldn't take a crap."

What on the farm had triggered this memory? I was surprised when the student teacher shared that his memory had been triggered by his failure to engage. He simply was unable to find any creature on the farm willing to relate to him. His fellow student teachers were having success and he wasn't. He did not connect with anyone. The creatures either ran away or ignored him no matter how much he coaxed or threatened.

I was very proud of his analysis of the situation and of his narrative. He recognized that he was demanding that the creatures meet him on his terms. He wasn't putting energy into seeing the world from their point of view; only from his own and his desire to "do the task", rather than a real desire to engage with the 'other'. And the 'other' knew it and refused to play the game.

How did this play out in the classroom during his practicum? When he went into the classroom, he had similar challenges with secondary students. When the supervising teacher left the room, the class began to take advantage of the situation and he became angry and scolded them. He realized he had lost an opportunity to create a connection; instead he scolded and they all waited in silence for the 'real teacher' to return

He realized he had to put his own narrow expectations aside and enter the world of his students with a more appreciative and flexible attitude.

This triggered a constructive conversation on expectations and communication with children and with animals. Students recognized that often classroom students are communicating with us in ways we do not notice or understand because they are

different from us. It is the same with animals. We all know animals sniff, but our study of the research explained that the sniffing is a complex form of communication. The young man related how when Twilight, the mare, had come up to him and sniffed him, it frightened him. He though she might be wanting to bite him and he abruptly backed away, frightening her and he lost a chance to connect.

Famed horseman, Rashid, says he always looks for an "opening", a chance to relate to a horse, especially if the horse is difficult. The student recalled a story I had told them about a time I was doing research on using Jungian archetypes to motivate reading literature in a middle school. The students were supposed to be working on a computer program I had created to examine archetypes in art, music and literature. But a group of pre-teens at a table were pre-occupied with passing around a book. The teacher came over to the girls, rapped hard on the table, and scolded them for being off task.

I made my way over to the table later and looked at the 'forbidden' book. It was a book of 'American Dolls' – a recent craze amongst this age group. The dolls represented a great variety of professions and races. I thumbed through the book and the girls shared nervous glances, expecting more reproach.

But I saw an opening. "These dolls are really expensive," I ventured. They nodded that they were. One offered that her mom had bought her one for her birthday. "Imagine how popular they'd be if you had archetypal dolls. Archetypes are pretty universal".

I had their interest. We began to dialogue on how the various archetypes might be represented. What would an Orphan archetype American Doll wear? What expression might she have? If she could talk, what might she say? What adventures might she have? Which of the archetypes would they enjoy playing with?

When I left the table a few minutes later, the girls were buzzing with excitement and ideas.

I had counseled my student teachers to look for an opening. They'll give it to you. Did I care if they talked about archetypes looking at the program I had created? No. My objective was to introduce them to the idea of archetypes. If I could use something THEY were interested in, that spoke their language, all the better.

My student teacher had realized that in chasing the chickens, in moving away from the horse, in admonishing the students, he was doing everything from his point of view, his needs. He was the primary concern and missed the opportunity to engage on an equal level, a level open to who they were, what they needed, and how they might prefer to engage.

It was a hugely important lesson for this particular student. And it was learned in so short a time – a day at the farm, a day writing a narrative, a day of reflection, a day of teaching and a second day of reflection. Some teachers take years to learn this lesson. It can't really be learned from a lecture, or from a book. It needs to be experienced and examined for deeper understanding. That way, the learning can be transformative.

A second case study I was permitted to share presents a narrative of a woman from India who was flooded by the unhappy memory of being "paraded" as a prospective bride when she touched my elderly thoroughbred who had been brutalized in her early days as a race horse.

### The Bridal Bridle

You may be sizing up my haunch, pal, just do not slap my ass. The words streaked unbidden across my mind as I walked past Xxx, my potential groom. I had to fight to keep my thoughts in check so I could keep the smile off my face. My parents' presence in the room served as my mental bridle helping me to keep focused on my goal for the day: "demure".

The tea tray assigned me was heavily laden with my mother's best tea service, white Corelle with peach flowers. I will never understand my family's fascination with Corelleware. Granted that it is practical and well-nigh indestructible, but it's certainly no Royal Doulton. The rattle of the cups and saucers seemed uncomfortably loud, forcing me to move more slowly across the silent, watchful room.

I tried to steal a glance at my potential mother-in-law, but this proved a difficult a manoeuvre to navigate while trying to maintain my demure posture - eyes down, definitely no eye contact. I didn't want her to think anything bad about me. She, however, boy, I felt her eyes boring holes through the top of my head. As though that would somehow let her read my thoughts or gaze directly into my soul. Good luck with that lady. My act was way too good for that.

I could sense Xxx's eyes on me though, carefully assessing my slow walk, maybe my looks, who knows. I felt like a heifer at the auction block and was reminded of my cousin Gurdip's wedding when I was 15. My aunts tried really hard to get me to weave a colourful tassel which matched my fancy new salwar kameez through my braid. I might have if it hadn't come with a bell in the middle of it. I wanted to feel pretty, not like Bluebell the cow.

Maybe I should have worn one that day for my own personal inside joke, but the mental image created made me more depressed than amused.

And after my walk across the room, that was it. I went back to the other room, and if Xxx and his parents liked what they saw, Xxx would be along presently to talk to me in private; to continue his assessment, no doubt.

I sat quietly at the kitchen table, waiting. Even my dog eared copy of Pride and Prejudice couldn't quite get my mind off the other room. The sound of the polite chatter buzzing on the other side of the door made my chest tighten and my stomach drop inside me.

I felt as if I'd been sitting there for ages, but in truth it was only 15 minutes before a silence fell, and I heard footsteps coming down the corridor.

One one-thousand, two one-thousand, three one-thousand, I counted in my head. The footsteps paused. A voice in the hallway. Not my mother or sister, "This door here, Auntie Ji?" Four one-thousand, five one-thousand, six one-thousand. ..and the handle turned.

Xxx, or Balbinder, as his mother called him, stood waiting at the door. He was of middling height, dark skinned, a little soft around the middle. And he looked bored.

I had dressed quite plainly that day and kept my head covered with my scarf, both at my mother's insistence. But despite that, I had taken some care with my appearance. Xxx looked as though he hadn't even bothered to tidy himself up.

"Hi"

"Hi" I replied. "How are you?" How are you? Of all the things I could have said, I came up with how are you? Great! The humour seemed to escape him though.

"I'm good, I - I'm good".

Our conversation that day was brief, and mainly one-sided. I told him all about myself, good things and bad, because I thought I should make some effort to make my mother's hard work pay off. You see, for her, to arm and prepare me for survival in the adult world was to train me to be a good housewife. Xxx told me he wasn't much of a talker, and that his parents had pressured him into coming.

I did a really great job of holding on tight to my demure face that day. For the most part.

If I am honest with myself I would say I was surprised and even offended by his words. There he sat clearly measuring me up and judging my worth with the rest of them. And I had really tried hard that day to fulfill what was required of me and to share what I could of myself. And he didn't want to be there? I guess I had just assumed that only a person who had a vested interest in meeting me would have shown up. Had he decided he found me wanting after all?

The appearance of my mother with yet another cup of tea, her kind, bovine eyes full of her Bollywood-fuelled dreams of a happily ever after, did nothing to help my frame of mind. Her smile tightened the knot into my chest, which was starting to feel like panic. My smile for her was a tight grimace, my demure facade now slipping.\_

Pretty soon the talking was done. Xxx stood up and cast a very appraising look over me, than went back to staring at his thumbs. That look made me feel as though I had been stripped bare. I felt the judgement of a farmer's stare at a cow he is considering for acquisition. And he said, "we'll see".

Rage and humiliation boiled through me in that moment. "We'll see?"
Really? On the auction block of matrimony I had laid bare my underbelly.
Apparently only a man who didn't even want to be there was present. I'm sure the look I turned on his already receding back showed that he had failed my assessment, and then some.

As he walked away, all docility was gone. The weight fell away, the heat of my anger burned my fear and lifted me up light as air. Or at least, it lifted my right arm. I wanted to strike out and push him out the door as if he were the animal at the auctioneer. "We'll see" infuriated me.

My family watched me from their positions at the other end of the hallway. A moment of silence. Looks of horror. Seeing them caught me off guard and stilled my hand. Xxx knew nothing. I lowered my hand and told his receding back, "yeah, maybe."

What incident at the farm had motivated this flood of memory? I could never have guessed. I had made available carrots and apples and crackers for students to share with the horses if they so wished. This Indo-Canadian woman had never fed a horse. She picked up a carrot and proceeded to offer it to the old race horse, Emily.

"I think I'll feed the old gentle one," she said, adding with a nervous laugh, "better chance of not getting bit."

"Actually, that's not true. She is more likely to bite you then Twilight, my high strung young mare would".

I explained that Twilight was still wild and had never worn a bit. Her mouth was very sensitive, all nerves intact. She could pick a grain of sugar from your palm. You could grip a carrot and she'd bite right up to your fingers and never touch your flesh. Lady Rhythm, on the other hand, had suffered the ravages of cruel bits. The nerves in her mouth had been severely damaged. She couldn't feel your fingers, and could easily mistake them for a carrot. It would be better to hold your hand flat and let her take the whole carrot from your outstretched palm.

Thinking of Lady Rhythm as a young mare, brutalized and hurt in a way which still affected her reminded my student of a period of her life when she'd been paraded in front of a man who wasn't really interested in her. Though she'd pretended to have a lot of bravado, the whole incident was very demeaning and the pain of it still stung.

The student teacher placed the carrot on her palm and offered it to Lady Rhythm who gently took the carrot and stayed close while she crunched the orange goodness in her strong teeth. She stayed close to the young woman for a long lingering period, as if she were feeling the memory of something that had hurt the woman and she was wanting to comfort her. I am not sure the student teacher was aware of the comfort, as I watched the old horse stay protectively close, a look of sweet compassion on her beautiful face.

"What a graceful lovely horse," the student said to me later that day. "I felt she was almost reading my mind."

"She was," I replied.

How did this relate to her teaching? She recognized how complex her feelings as a young woman had been. She was caught in a tradition that she felt compelled to follow even as she rebelled against it. She felt disappointed, rejected, even by a person she did not want to be with. This recognition followed her into the classroom in two ways.

She realized that she herself could feel rejected in a situation where she would not have expected that feeling. I had counselled the students not to take it personally if a student came late, or wasn't paying attention, or wasn't learning despite the student teacher's best efforts. Students are like all of us, with full complex lives and many things besides the teacher will be influencing their attention or ability to learn that

day. The Indo-Canadian student teacher was aware of this intellectually, but having recalled the complex, sometimes conflicting feelings in her narrative, she was more grounded in her understanding.

This is an important lesson, not one easily learned, especially in a young student teacher wanting so much to be accepted by students.

The second way her experience afforded her insight was in being aware of how students caught up in an institution which is, it self, very traditional, may be rebelling against it, even as they are wanting to succeed in it. The student teacher became sensitive to the duality of emotions a teenager might feel and therefore respond in what often seemed like contradictory ways.

For example, a rebellious student who pretends not to pay attention and who truly does not value an assignment, will, never-the-less feel defeated or hurt if not given positive feedback on the work done. The student teacher was determined not to jump to conclusions, not to look at student behaviour from a narrow vantage point, and to give respect to all students, including the seemingly uninterested or those causing a disturbance.

To listen to this student teacher speak with such clarity and sensitivity about her relationship with students was not only a pleasure, it was a deep encouragement to continue with the work we were doing combining work with non human teachers and with narrative.

A third narrative I'd like to share was written by a young woman who had spent time with her family in the Amazon and wrote of her experience swimming in a river inhabited by piranha. She slipped into the water assuring the fish she meant them no harm and was coming as a guest into their home.

#### Piranhas

The children were not allowed to swim in the brown river. Piranhas lived there. They would bite off their toes. When their mother said that, she grabbed their feet, baring her teeth in a monster growl, and then laughed a huge, openmouthed laugh when they screamed. They could see all her teeth when she laughed, right back to the molars.

In the tent that night, the girl asked the boy – her older, wiser brother – if it was true that piranhas lived in the river. They sat in silence for a moment, listening to the drone of the cicadas outside. The jungle here was thick and dark and the air draped heavily over their little tent like a damp, festering carpet.

"We'll just have to find out," the boy answered. This was not a challenge, just a statement of fact. The challenge had already been given. It hung suspended in the air, in the warm wind that stirred the canopy and in the dank undergrowth that rotted slowly in the darkness. They didn't wear shoes. Neither child thought of the creatures that slithered and scuttled across the floor. They didn't think of the spiders with their pincers and the snakes with their fangs. Their feet sunk into the hot dark earth and the forest shuddered, pulsating like a beating heart. They held hands — not because they were afraid — but because they were together. In the moonlight, the river gleamed. During the day, it was dirty and ugly and brown but at night it glittered like silver. Behind her, the girl heard a splash. Her brother had jumped in. She could see his face bobbing out of the water, his hair shining like a seal's.

She followed him, throwing her small, bird body into the water. The river was warm. Fanning her fingers outward, she floated, waiting. She knew that the piranhas lived here. She knew that she would have to be careful not to offend them. She would be polite and wait, like a guest at a dinner party.

When the fish did come, they did not bite. They flickered around her like fireflies and their tiny teeth nibbled on her toes, scraping and cleaning off the dead skin. She called out in delight and looked around for her brother but she could not see him. His head – bobbing out of the water – was gone. The river was still as glass. She called his name but the pale darkness swallowed up her voice. In fright, the piranhas swam away. The search lasted all night. The adults roamed the forest, their voices shrieking the eeaaaasboy's name.

In the tent, the girl listened to the cicadas outside. They chanted one word over and over again, "bad" "bad". She wanted to answer them but the darkness had stolen her voice. When they found him, he was covered in mud. He could not tell them where he had been. She lay in the tent, listening to everyone talking outside, hugging the boy, crying. Under the covers, she felt the piranhas nibbling at her toes.

What had triggered this memory, the memory of swimming in forbidden waters? Or a brother gone missing and her feeling responsible?

She told her classmates that the atmosphere of acceptance and respect at the farm had generated the memory. She admitted the narrative she had written was quite allegorical in nature. She had swum in dangerous waters, and had felt that if did so respectfully, it would be ok. Her brother had gone missing for a long period of time one evening as dusk turned to darkness and parents with flashlights called into the night.

It was interesting to observe this particular student. She was very bright, a gifted writer, an activist and a deep thinker. I had not seen her engaging in a deep way with any one particular animal. Her memory was triggered by a general feeling rather than by a specific moment of engagement. I was wondering what she felt this revealed about her. And how would this relate to her teaching?

The young woman expressed a deep hope she would be able to create this same atmosphere in her classroom and she also recognized that she would be a visitor in another teacher's classroom and would also have to respect that relationship.

We had discussed this issue a lot in preparing for their practicum. We were guests and the classroom teacher was responsible for the students and might feel that the way to act on that responsibility might differ from what the student teacher felt to be 'best'. The classroom teacher might also have values and practices that differed from or even contradicted what student teachers had learned in our university class.

I had counseled the student teachers to be respectful of the classroom teacher's ideas and to resist the temptation to "know the right way" to relate to students or to teach a particular subject. The student teacher's time would come when they had their own classrooms. They might try to negotiate an opportunity to try different methods, but in the end, the classroom teacher was in charge.

That became a real challenge for this particular student teacher when her ideas differed from the classroom teacher's. This pafticular student teacher had some very strong ideas about pacing and flexibility that didn't always match the classroom teacher's need to be on schedule and complete the demands for covering the curriculum. During her practicum the student teacher became very aware of the complex relationships involved in teaching in a public school system.

Though the time at the farm had allowed her to articulate this understanding, she had not had any real moment with an animal who might have been able to teach her something about handling the situation with some degree of acceptance.

The atmosphere of the farm was one thing, but in order for the animals or birds to actually teach the student teacher something, a deeper connection had to happen. This was an important lesson for me. My instruction in how to experience the farm became more precise. At first, I had not valued the importance of the animal, especially the horse, to be teacher. In time, as more student teachers came to the farm, I began to recognize the power of a horse, in particular, to reflect the student's feelings and to send a telepathic message that would resonate and guide the student later in the practicum.

Animal telepathy was first written about in 1919 by William J. Long who was a minister and well-known naturalist of the early twentieth century. He accepted animal telepathy as "a natural gift of faculty of the animal mind, which is largely unconscious, and it is from the animal mind that we inherit it.

Quantum physics research during the last 20 years has discovered that physical objects are not as separate as we once thought they are. At the quantum particle level, all separateness disappears and everything is connected. Schrödinger described this process as "entanglement."

When two systems, of which we know the states by their respective representatives, enter into temporary physical interaction due to known forces between them, and when after a time of mutual influence the systems separate again, then they can no longer be described in the same way as before, viz. by endowing each of them with a representative of its own. I would not call that *one* but rather *the* characteristic trait of quantum mechanics, the one that enforces its entire departure from classical lines of thought. By the interaction the two representatives [the quantum states] have become entangled. ((Schrödinger, 1935; p. 559 in <a href="http://plato.stanford.edu/archives/spr2015/entries/qt-entangle/">http://plato.stanford.edu/archives/spr2015/entries/qt-entangle/</a>).

Teachers experiencing communication with horses and other animals of prey provides a window into the world of how the 'other' makes sense of her world and thus becomes a teaching tool and preparation for working in a global world where inclusion puts complex demands on all members of the learning environment, teacher and student.

# Teachers as Model Global Citizens

Bratanova, Loughnan & Gatersleben (2014) remind us that our planet is faced with tremendous moral issues around threats to our environment. Though governments are posing policies to reduce this global threat. They caution:

The success of such measures is largely dependent on public acceptance and support (Whitmarsh, Seyfang, & O'Neill, 2011). This support and public participation in conservation practices rely on individuals' motivation to protect the environment (p. 539).

Two primary phenomena emerge as possible byproducts of the work my students and I are undertaking at the farm. The first is a reduction of a phenomenon scientists are calling "environmental generational amnesia". "The concern is that, by adapting gradually to the loss of actual nature and to the increase of

technological nature, humans will lower the baseline across generations for what counts as a full measure of the human experience and of human flourishing" (Kahn, Severson & Ruckert, 2009, p. 37).

One startling example of the amnesia phenomenon where the baseline shifts is reported by Kahn, et al. (2009). Children in the very polluted city of Houston, Texas report the air as being very clean, having lost the concept of what clean air actually is.

A second example they site is scientists working for Fisheries, Canada who perceive the decline in wild salmon as being normal, whereas 30 years ago, it would be perceived as very serious. Sadly, "with each ensuing generation, the amount of environmental degradation can increase, but each generation tends to take that degraded condition as the non degraded condition—that is, as the normal experience" (p. 41).

There is evidence that environmental generational amnesia reduces our health and well being, leaves us more and more indifferent to abuse of the environment and to taking advantage of animals for sport, research and profit. "The problem of environmental generational amnesia may emerge as one of the central psychological problems of our lifetime" (p. 41).

The second phenomenon the farm raised awareness of is a decline in the moral circle of concern. Studies by Bratanova, Loughnan, & Gatersleben (2012) establish an association between chronic moral circle size and nine proenvironmental activities from different domains (p. 539). As part of the teacher training using the farm, I am conducting research to discover if work with animals in a natural setting would result in a widening of the moral circle and thus promote pro-environmental activities.

Knight & Herzog (2009) claim that attitudes toward animals can influence how they are treated by society, and the views of the public as well as specialists in this area (such as scientists and animal welfare persons) can affect changes in policy, practice, law, and legislation.

The potential therapeutic value of animal companionship receives scant attention and is marginalized and grossly underfunded says Serpell (2008), a leading authority on human-animal bonds. He views the neglect of this topic as a legacy of the anthropocentrism that has dominated Western thinking which perpetuates the dismissive assumption, "It's only an animal".

"How we think about and treat animals sheds light on general processes that govern human social cognition and behavior. Hence, we can learn about ourselves by studying our attitudes toward and our treatment of other species" Knight & Herzog, 2009, p.459). This premise guided my work with student teachers.

Dr. Allan Hamilton, renowned brain surgeon who uses horses in the training of medical doctors, in his description of the evolution of the super-predator says, "we became a new kind of super-predator, an unimaginably successful killer species, playful with out wits and lethal with our intellects, but, eventually no longer in touch with the secrets deep within our own hearts" (2011, p.5).

The work we are doing at the farm is a pathway to keeping in touch with those heart secrets.

### References

Argent, G. (2013) Inked: Human-horse apprenticeship, tattoos, and time in the Pazyryk world. *Society & animals 21*. Pp. 178-193.

Bakhtin, M. (1984) *Problems of Dostoevsky's Poetics*. (Edited and Translated by Emerson, C.) Theory and History of Literature, Vol 8 Minneapolis, MN.: The University of Minnesota

Bahktin, M. (1986) *Speech Genres and Other Late Essays*. Edited by Caryl Emerson and Michael Holquist. Translated by Vern W. McGee. Austin, TX: University of Texas Press.

Bernstein P. (2005) Intuition: What science says (so far) about how and why intention works. *Endophysics, time, quantum and the subjective*, Buccheri, R et al, Editors. Singapore: World Scientific Publishing.

Bratanova, B., Loughnan, S., & Gatersleben, B. (2012). The moral circle as a common motivational cause of cross situational pro-environmentalism. *European Journal Of Social Psychology*, 42(5), Pp.539-545. doi: 10.1002/ejsp. 1871.

Bub, Jeffrey, "Quantum Entanglement and Information", *The Stanford Encyclopedia of Philosophy* (Spring 2015 Edition), Edward N. Zalta (ed.), forthcoming URL = <a href="http://plato.stanford.edu/archives/spr2015/entries/qt-">http://plato.stanford.edu/archives/spr2015/entries/qt-</a>

entangle/>.

Buber, M. (1958/2000). I and thou. (R. Smith, Trans.). New York: Scribner.

Buber, M. (1970). *I and Thou* (W. Kaufmann, Trans.). New York: Touchstone/Simon & Schuster.

Burbules, N. (1993). *Dialogue in teaching: Theory and practice*. New York: Teachers College Press.

Corning PA. (2003). *Nature's magic: synergy in evolution and the fate of humankind*. Cambridge: Cambridge University Press.

Derrida, J. (1989). *Of spirit: Heidegger and the question* (G. Bennington & R. Bowlby, Trans.). Chicago, IL: University of Chicago Press.

Erickson, D. (2011), Intuition, Telepathy, and Interspecies Communication: A Multidisciplinary Perspective. *Neuro quantology Vol. 9, Issue 1*, Pp.145-152.

Gittins, E. (2013) The Archaeology of Becoming the Human Animal. *Society & animals 21*. Pp. 120-133.

Grosso M. (2010) Consciousness and parapsychology: A thought experiment. Institute of Noetic Sciences Monthly e-News, July 2010, from <a href="http://www.noetic.org/noetic/noetic-now-issue-one-may/consciousness-and-parapsychology-thought-experiment/">http://www.noetic.org/noetic/noetic-now-issue-one-may/consciousness-and-parapsychology-thought-experiment/</a>.

Hamilton, A. (2011) *Zen Mind zen horse: The Science and spirituality of working with horses.* North Adams, MA: Storey Publishing.

Kahn, P., Severson, R. L., & Ruckert, J. H. (2009). The human relation with nature and technological nature. *Current Directions in Psychological Science*, *18*(1), Pp.37-42. doi:10.1111/j.1467-8721.2009.01602.x

Knight, S., & Herzog, H. (2009). All creatures great and small: New perspectives on psychology and human animal interactions. *Journal Of Social Issues*, 65(3), Pp. 451-461. doi:10.1111/j.1540-4560.2009.01608.x

Isaacs, W. (1999). Dialogue and the art of thinking together. New York, NY: Doubleday.

Long WJ. (1919). How Animals Talk, and Other Pleasant Studies of Birds and Beasts. New York: Harper & Brothers.

Morrison, T. (2008). "The site of memory" in *What moves at the margin*. Jackson, Mississippi: University Press of Mississippi.

Pike, K. (2009) *Hope...From the heart of horses*. New York, NY: Skyhorse Publ.

Rashid, M. (2011) Horses never lie. New York, NY: Skyhorse Publ.

Rashid, M. (2011) Nature in horsemanship. New York, NY: Skyhorse Publ.

Rice, S. & Burbules, N. (1992). Communicative virtues and educational relations. *Philosophy of Education Yearbook*, 1992. Retrieved from <a href="http://www.ed.uiuc.edu/EPS/PES-Yearbook/92\_docs/rice\_burbules.HTM">http://www.ed.uiuc.edu/EPS/PES-Yearbook/92\_docs/rice\_burbules.HTM</a>

Rose, A. (2011) Bonding, biophilia, biosynergy, and the future of primates in the wild. *American Journal of Primatology* 73. Pp.245–252.

Serpell, J.A. (2008). *In the company of animals: A study of human-animal relationships*. Cambridge: Cambridge University Press.

Slater, J.G. (ed.), (1986) The collected papers of Bertrand Russell, Volume 8: The Philosophy of Logical Atomism and Other Essays, 1914-19. London: George Allen & Unwin.

Tally, J. (2001) The Story of Jazz: Toni Morrison's Dialogic Imagination, Berlin, Germany: LIT Verlag Munster.

Walsh, F. (2009). Human-animal bonds I: The relational significance of companion animals. *Family Process*, 48(4), Pp. 462-480. doi:10.1111/j. 1545-5300.2009.01296.x

Walsh, F. (2009a). Spiritual resources in family therapy (2nd ed.). New York: Guilford Press.

Whitmarsh, L., Seyfang, G., & O'Neill, S. (2011). Public engagement with carbon and climate change: To what extent is the public 'carbon capable'? *Global Environmental Change*, 21, Pp. 56–65. DOI: 10.1016/j.gloenvcha. 2010.07.011

Bub, Jeffrey, "Quantum Entanglement and Information", *The Stanford Encyclopedia of Philosophy* (Spring 2015 Edition), Edward N. Zalta (ed.), forthcoming URL = <a href="http://plato.stanford.edu/archives/spr2015/entries/qt-entangle/">http://plato.stanford.edu/archives/spr2015/entries/qt-entangle/</a>>.