

The Hundred Year Flood: The Educational Ecosystem

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Note: this is the second in a six part series on the ecosystem of education. While, in many ways, each article stands on its own, many concepts and terms are used in unusual ways, ways that are explored in the preceding article: Building Unconditional Confidence. There we define the nature of the unconditional; here we explore how we can make that a reality.

***“Never does nature say one thing and wisdom another.”**¹ Poetic and potent - and, THE road to accessing our inherent-vitality. Great. So then all we have to do is align ourselves with nature and we are all set. Yup. But what exactly does that mean? Returning to farms and homesteads? Only those living in the wilderness can access that vitality? Actually, though I am all for lots of outside time, really *where* we are matters a whole lot less to accessing vitality than does *how* we are. Let’s explore the *how* from the inside out.*

September 2013. As soon as word of the floods in Boulder, Colorado started making the news, I started making calls. I had lived there for 13 years when my kids were little and had many friends who would be impacted. As I sat at the phone going through my list, I got a call from one of the Enki teachers who was out in Lyons, Colorado, which was ground zero for the flooding. She was speaking pretty breathlessly about something that had happened with her second grade class, but I was focused on getting information on the flood and making sure everyone was safe, and I wasn’t, at this moment, interested in school events!

Rather impatiently, she reassured me that everyone there had been safely evacuated and that while they did not yet know the fate of any of the buildings, including the school which was right on the flooding river, everyone was okay. Finally I let her tell me the story about the kids, though I was still wondering why it mattered to her so much with all the rest that was going on.

“Yesterday,” she began, “we went for our usual walk – it had been raining for days so the rain didn’t deter us. The kids saw that the river was high, and stopped to dam up a little side eddy of water. But we watch the river go up and down all the time, so I didn’t think twice about it, and we went on with our normal day.

“Later in the morning, after our indoor work, we went out for our playtime and the children immediately noticed that the rising river had pushed their dam over. They went busily into what appeared – to me anyway – to be normal imaginative play, and I watched casually. They all ran to our tree house, some climbing up to the platform while others stayed below. Soon they had an assembly line going, hauling up nuts, and seeds, and sticks. And then some kids tied a bucket to a line and set up a makeshift pulley system to haul up loads more quickly. This seemed unusually industrious so I asked about it. ‘It’s going to flood! It’s going to flood!’ they all said at once. ‘We need to get everything up high to safety; we need to make sure the animals are safe! They will need food!’ I smiled at their wholehearted play, suppressing a laugh at their cuteness, but not paying much attention to the content of their play.

¹ Juvenal, Roman poet, 55 – 127 CE

“I didn’t think more about it, but even when the day ended, the children again raced over to check on their bundles and on the river. Still, my attention was on the children, and to me – and the other adults – nothing seemed unusual about the river. We all went home.

“First thing this morning we were all awakened by the town’s emergency sirens. All hell had broken loose: buildings floating down the river, even parts of our school. Families evacuated by helicopter from hillsides. A hundred year flood! But the kids had all the little creatures well fed and safe!”

Pretty amazing, and it was clear to us both that, albeit unconsciously, these seven year olds had taken in every detail – certainly the rising water and the falling rain, but these were all-the-time events. It seemed they also picked up on much else: the changes in the wind and the unusual smells it carried; the upturned leaves; barometric pressure changes and shifts in the temperature; likely even the shift in the sounds and movements of the birds and small creatures on the land.

How? Why?

One might look at this situation and assume that these children spent most of their time outside, had a special environment, and above all, had been taught to look for such things as changes in the sounds of the animals and which side of the leaves on the trees faced upward. This group did have a fantastic outdoor environment right on the river, and they took a morning walk every day, and they played in the trees and fields at their recess time. So, yes, the outdoors was a familiar space for them and no doubt contributed to their awareness. BUT the bulk of their school day was still indoors, and, more importantly, they had been given zero direct instruction on observing their environment and had done no analysis or study of nature’s signals for changing weather – none. Intentionally.

So what’s going on here? What made the children notice a shift, a significant shift in their world, when the adults around them did not? I believe the answer is this: the children’s moment to moment school day flowed – in content, method, and rhythm – into a coherent whole, one that met their needs. As a result, they were particularly attuned to the coherence of each environment they entered – and therefore, to any absence of coherence.

At first glance, this may seem like an unusual statement, but I think we all have direct experience of the basic principle. For example, imagine you are at an orchestra performance. They are playing a Bach piece you know well. All the instruments are playing together, each doing its part and forming a harmonious and melodious whole. You relax and flow along with the music. Then on to the next piece. This one you don’t know at all, but still, you relax into the harmonious mood. Suddenly the violin takes off on its own, breaking the standard Bach rules of melody and harmony and rhythm. You sit up, system on alert. Something is off. You have never heard this piece before, but you have no trouble recognizing that something is off. Any one of us may like the sound of broken musical rules, we may not, but we notice and that’s what matters here. In a nutshell, whatever we know from our own experience, we recognize in each situation we meet, *and* we also notice if it is not there. This is how the human capacity for resonance works, and the vast majority of us use it intensively, all the time, to navigate the social world. Those who can’t do so effectively are said to be

dealing with Asperger's Syndrome or to be on the Autism spectrum. Resonance is an innate human capacity.

When the children resonate with coherence, the proverbial clouds clear and they can connect with their inherent-vitality – and that is the goal here! So these children recognized a breach in coherence, and their “coherence anchor” led them to interact with their world to right the problem.

None of us will be in that state all the time, and both with peers and at home we will certainly experience many different things that challenge coherence! But children – really, all of us – are like the old fashioned clown punching bags. When I was a child they could be found in almost every home: a plastic blowup clown with a heavy, sand-filled base. The children would punch it or kick it or even push it down to keep it knocked over. But the fun part was the way it bounced back up – the way the sand pulled it back up. *In humans, our inherent-vitality is that sand.* Yes, the children will experience many “punches and kicks” over the years, literal and figurative, and there will be times they are held down for far too long. But each time the clouds clear and there is an opportunity to experience their inherent-vitality, that sand-base pulls them right back up. So no matter what else they may face, in their Enki day, the teacher is always striving to free the clown and let the sand pull the children back to experience their inherent-vitality.

To turn back towards our inherent-vitality when we fall, we must realign with the laws of nature. This is where Juvenal's insight comes in: *never does nature say one thing and wisdom another.* Never – not sometimes. It is important to realize how literally that is meant: both Juvenal and I really are saying that, in relation to humans, our ability to access our inherent-vitality is dependent on perceiving and following nature's laws. And Juvenal and I are not two lone strangers on an ice-floe with a strange outlook; many spiritual teachers speak of this same truth. My own spiritual teacher, Chogyam Trungpa Rinpoche, used to say, “The world has an order and a power and a richness that can teach you how to conduct yourself artfully, with kindness to others and care for yourself.”²

This understanding is the foundation, the guide, and the safety check for all things in Enki Education. We begin with the two over-riding laws:

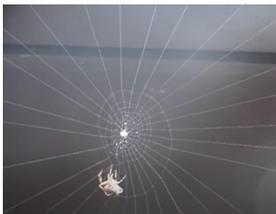
- 1) the law of interdependence or ecosystems; and,
- 2) the law of microcosms within macrocosms, each following the same basic laws.

1) *The* foundational law of nature is the law of ecosystems: all aspects of our world are inter-dependent and are constantly impacting one another. An ecosystem is a web, a literal web. The phrase “web of life” is a wisdom, not a metaphor: all aspects of life form a literal web.

Think of a spider's web. Each has radial or warp threads that move between the center and the periphery, providing the scaffolding for all else. The same is true in all ecosystems. For plants, these radial threads are sun, water, soil, nutrients, and energetic forces like the pull of the moon.

² Shambhala: Sacred Path of the Warrior, Chapter 17

All plants work with these elements, and each element has its stable and vital contribution to make. For example, water brings hydration, not heat. Sun brings heat and activates photosynthesis, but it doesn't bring hydration or nutrients. And so on. Always true. However, not all plants use these elements in the same way: a desert cactus works differently with them than does a New England maple. Because of the radial threads, we have the coherence of a self-sustaining, law-abiding ecosystem, and yet do not lose dynamic variety.



The radial threads are the principles through which all else weaves, whether we like it or not, and whether we align ourselves with them or not. Such is the nature of an ecosystem.

2) Microcosms within macrocosms. Most people reading this are more than aware of the importance of respecting the interconnectedness of nature, our macro-ecosystem. However, we are often less conscious of the fact that every single aspect of life operates in its own micro-ecosystem. This applies to everything, from the cellular groupings in our bodies, through the organs, through family, community, country – and through growth and learning, i.e. education.

These micro-ecosystems work like a series of Russian nesting dolls, or microcosms within macrocosms. From the smallest of these out, each ecosystem must fit within and be in harmony with the next, and the next and the next, right up to the largest, that of the natural world. How does this happen? **Each micro-ecosystem follows the same natural laws or processes, but each has its own expression of these.** That expression determines the health of all beings in that system, and, in turn, the health of all that surrounds it. So we flip this joke 180 degrees and, knowing the dolls together form an interdependent organism, we can honestly say to the ticket teller, “Yes, *really* one ticket!”



These are the two primary laws in a nutshell, and Enki Education is founded on the understanding that alignment with them is what opens access to our inherent-vitality; as detailed in the last article, compassion, wisdom, fulfillment of potential all naturally flow out from there. Certainly this alignment happens for everyone, throughout life; if we didn't experience it at all, two things would happen: firstly, there would be no seeking – we only seek what we have glimpsed; and second, we would be dead because that inner vitality is what keeps us going. It happens spontaneously and sporadically, and it happens because in our own ways – exercise, meditation, hiking, doing pottery, and so on – we cultivate it. So I am assuming that everyone has personal experiences of this alignment; our focus here is on how to make this alignment be the ground of our work with the children, both at home and in the classroom.

Let's take a break there and come back to explore the details as they apply to education.

Section 2: The forest school or the forest process?

We both began and ended the first section with a statement that is simultaneously obvious and radical: if our goal is to access our inherent-vitality as often as possible, then we must align ourselves with the laws of nature's ecosystem. What does this mean for education?

All this focus on aligning with natural laws might make it easy to conclude that, in education, honoring the natural laws would make us choose an outdoor program. One might, quite logically, think that the best alignment would happen in Forest Schools or Wilderness programs. Not necessarily true. Certainly these *could* be an option. However, one could be aligned with the laws of growth and learning in New York City, or out of alignment in rural Canada. One could be fully in alignment in a structured brick and mortar program, and completely out of alignment in an open-ended forest or wilderness one. Same applies the other way round. Certainly time in nature matters for us all and I don't mean to diminish the importance of that, but *just* being outdoors does not guarantee an alignment with the underlying laws of nature. Critical to full alignment – and therefore to experiencing our inherent-vitality – is aligning ourselves with the *processes* involved in growth and learning. These can be honored anywhere; here we are talking about processes, not about curriculum content or place.

The Educational Ecosystem: it can't be stressed enough that an ecosystem is an interdependent whole AND this can only be a healthy whole if we are working within the laws or underlying processes of the radial threads. Everything else in our world "weaves" through these stable threads, just as do the orbital (circular) threads on a spider's web. As described earlier, it is through alignment with the radial threads that we get the coherence of a self-sustaining, law-abiding ecosystem, and yet do not lose dynamic variety – i.e. both the cactus and the maple have their place.

What is so beautiful and reassuring about nature is that it *does* follow deep and unyielding laws, and, simultaneously, it manifests endless flexibility. Herein lies our healthy individuality. It does not lie in a free for all or an expression of the whims of desire, but in creatively and responsively aligning ourselves with the basic laws of nature. The funny thing is, at some level we basically know this and act accordingly. In the early years of a child's life, we watch them unfold according to the laws of development and we do so with joy.

Each of my three children began to crawl at precisely the same moment, so much so that it felt a little spooky: At five months, they excitedly rocked on all fours, making a sound that was between a grunt and a hum and a victory cry; then at five and a half months they were off in a full forward crawl. But walking! Not so similar. They still all walked right at a year, but the process for each was so different. My daughter had been couch surfing and walking holding a hand for about six weeks, but she showed no interest in ever walking on her own. Then on her actual first birthday, she got up, walked all the way across the room, plunked down and smiled quietly. My next child, a "devil take the hindmost" little boy, had done so much climbing and falling off things that we hardly noticed his first steps! They followed many a crash and face plant and were just another part of "what has Evan gotten into now!" Actually, they just speeded up the rate at which he found more mischief. My third, another boy, at about 10 and a half months discovered he could stand by himself and bounce up and down in place. He would stand there, hands in the air, elbows bent, bouncing and laughing that

so-full baby laugh, just 100% in the delight. Periodically he would say “aiye-di-di” which sounded an awful lot like “I did it,” though he was still a good year from having the “I” concept. Still, it caused us to laugh, too. When he did walk, it was one step at a time, punctuated by bursts of laughter.

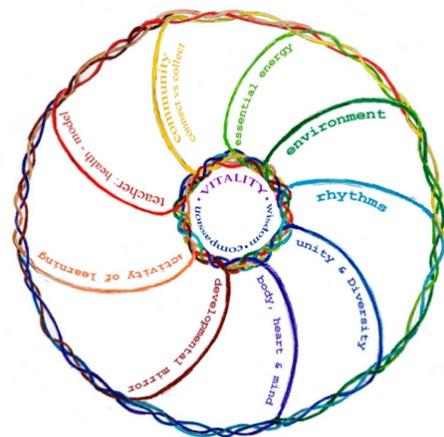
Anyone who knows my three children, now adults and parents themselves, is laughing at this point because right there in how they approached walking, they announced who they were and how they would meet the world, and yet all were doing essentially the same thing. All of them were working with the laws of gravity, balance, and physical alignment, and all were moving in the same basic direction, i.e. up. We assumed – and hoped – they would all walk and would do so in pretty much the same way as any other person. Still, we parents delight in this very normal event as the miracle it actually is. Certainly each baby’s particular way of standing up and readying to walk is adorable and seems monumentally important to the parents. Yet it is in the way these obey the underlying laws of nature that we recognize the miracle – none of them would be quite so adorable if they didn’t result in walking effectively!

There are many places, like walking, where we delight in this alignment with nature without hesitation, sharing in the experience of the child’s accessing that inherent-vitality. This same alignment – and delight – can be the core of all our work with the children. In all areas, **we can best help the children to clear away the clouds of confusion and experience the open flow of their inherent-vitality by aligning ourselves with the underlying laws of growth and development.**

So whether choosing an approach to teaching reading or wilderness skills, painting or sports, independent or teacher led structures, and so on, if we are to have an ecosystemic education, it is necessary to “weave” each approach or issue through the radial threads of the web. This means asking oneself how the specific method, material, location, or activity, aligns with the principles of each radial thread of the educational ecosystem; from there, we adjust in service of the whole.

Let’s start with listing those – no need to track these, we will come back to explore them more fully:

- 1) Environment;
- 2) Rhythms;
- 3) Unity and Diversity;
- 4) Integration of Body, Heart, and Mind;
- 5) Mirroring Child Development;
- 6) The Activity of Learning;
- 7) The Teacher – as a model and in her own health;
- 8) Community – connection vs collection;
- 9) Essential Energy.



I am sure there are other ways to describe the same principles, even other ways to cluster and separate them, and, even in Enki, we have at times broken them up differently. But these are the foundational issues, no matter how we describe them. Most importantly, each of these radial threads

is more than a banner headline; each carries a perspective and a breadth and depth of understanding; that will be the focus of upcoming articles. But what matters throughout is that we come to see how each thread aligns with the processes of nature and what that means to our day to day work.

Let's explore an example: *Rhythm. The rhythmic flow of the day was something that had always been important to me, and, when teaching teachers, I often likened it to the flow of day and night. This analogy supported the importance of the alternating of inbreathing, focused activities, with outbreathing, active and playful ones, and that was key to sanity as well as learning. Most teachers know this, even if they had to learn it the hard way – the children are relentless teachers! But once Juvenal's outlook had burrowed deep into me, I began watching all of nature more closely – in this case, the rhythm of nature. Something caught my attention: dawn and dusk, the transition times. In their great displays of color and that odd "suspended silence," I began to see the importance of transition.*

Pretty much anyone who has lived or worked with children knows that many struggles with children – maybe even most – happen as we try to move from one thing to another. We generally rush, or warn, threaten, or even bribe our way through those transitions. But watching nature I was seeing the importance of transition, and just in case we might miss it, she displays this dramatically and beautifully.

Once I noticed this, there it was all around: in the transitions between winter and summer and back to winter again – and who doesn't love spring and fall! It was there in the rise, break, and retreating of the waves, and even in the pause between our own moment to moment inbreath and out. Taking that in, now my attention to our school days and to my home life included attention to all three parts of the rhythmic flow: an inbreath, an outbreath, and a transition or what I call "grace." Whether that transition happened with a song or a ritual or simply by creating a space, it was the transition itself that mattered, and that changed everything. It is not that there were never fits or resistance or total chaos, but I can honestly say that these were the exception; 80 or 90% of the time, in my classes, the transition rituals let us flow from one thing to the next in a healthy and engaged manner, and one that could accommodate the whiny outlier.

Basically, with the younger ones, when we are entering any transition, I hum or play music until I feel myself in the inner "dusk and dawn" space. I pay no attention to the children and just hum for me, so that I shift internally, into the transition space. That creates a world and invites the children in – and an entirely different experience opens up. I can't tell you how many times I have stood in a room full of busy, constructive, loud chaos, knowing it was time to shift gears and standing on the "how do I do this" precipice. Certainly, there have been times I tightened up and tried to instruct or bribe or threaten the children on to the next thing. A miserable experience. Generally lots of resistance and tears (theirs), and tension and frustration (mine). But when I stop to anchor myself in the transition, things change.

That's the most important part; as teacher or parent, I am the model. So while I do this humming, the children are shifting too. They are not conscious of it, but they feel the mood shift and often some will start to shift on their own. Either way, when I have fully entered the rich space of transition myself, I start singing the actual words of the song and, through gesture, modeling, and action, I invite them to participate. It is very rare for the children not to be pulled in, too. Just how I enter a transition shifts with age, but the intention and the attention are the same, and that is what matters.

Each time we align ourselves and our work with the laws of nature we have flipped that now-proverbial canoe back up and we are moving in harmony with the natural forces. In so doing, we help set this experience of connecting to inherent-vitality as true-north on the children's inner compasses. This true-north becomes the magnetic place toward which the children turn when confusion clouds their way or missteps land them flat on their faces. That is what we are after for the children *and for ourselves*; no one will stay connected to their inherent-vitality 24/7, or anything like that, and that is not our goal. The goal is to turn back toward accessing inherent-vitality each time we stray or trip, or even fall flat on our faces. Then what was once shame becomes curiosity, and what was once a hardening becomes an openness.

Finding and working with this harmony, for me was and is exhilarating. Hopefully, this discussion provides a sense of what I mean by aligning ourselves with the *processes* of nature; seems like a good place to take a break and we will come back to see how it all works in the next section!

Section 3: The Ecosystemic Outlook in Action

Our understanding of the radial threads forms the core of Enki and provides the *questions* through which we explore any and all educational possibilities. This is the framework that lets us remain flexible while maintaining an integral core. That core is the commitment to supporting a connection to inherent-vitality.

In each situation we meet, and with each idea we come up with, each difficulty we face, will find all of the radial threads engaged. Everything we do impacts all of them and they all impact everything we do – such is an ecosystem. However, in different situations, different radial threads will call for our attention to different degrees. This happens throughout nature. For example, access to sunlight is the prime issue for a forest plant that already has water, soil, and nutrients; and water an issue for desert plants where sun abounds, but both plants are still working with all the core elements, or radial threads, of their ecosystem. To get a feel for how this works in education, I will describe a couple of challenging situations in terms of the specific radial threads that were particularly in need of attention for new insights to open.

Situation #1: The Wolf in Sheep's Clothing

2001 Henniker, New Hampshire. I had taught many preschool and kindergarten groups at this point, but this was the first time I was to do so in an "ideal" environment: the woods of New England. And we made use of those woods, building all playground equipment right into the trees; swinging bridges went from tree to tree and you got over the gully to the sand box through a miniature covered bridge, and so on. There was a lake within an easy walk, full of tadpoles and loons. There were animals to care for and a garden to tend, and a dirt road to constantly repair, all right outside the schoolroom doors. Perfect; just what I had always wanted for the children.

We began the year with the rhythmic flow I had, virtually always, used with young ones, a common one that seems to serve them well: we started our day with space for open-ended creative play, gathered after about an hour for some focused movement together, snack, story, crafts, and then a long outside play before lunch. Great. Except it wasn't. That open-ended creative play was not a relaxed, imaginative, inner settling. It was a tight, anxious, controlling event. They did lots of seemingly creative things like putting on plays. But if you listened closely, or settled back to feel the mood, you would notice that one child – the same one every time – was directing the whole thing and everyone was tense about his or her part; and they were only 5 years old! There was no settling in, no relaxing in the open-space and letting the deep imagination flow. There was just a low level, outer focused, "what should I do?" tension.

Beginning our day that way meant that this mood ran along underneath all the different activities to follow, until the children had been outside for a while – then they began to let the tension float off, settle in, and engage in imaginative play outside. So most of our day was held in the grip of this tension. Not what I wanted for the children!

Let me be clear about this tension: it had a great disguise. Most adults walking into the program saw the children engaged in drama and working hard at crafts, and so on – and many did comment on how great that

was. The outer behavior was great - if you didn't listen too hard! But the inner mood, and the children's conversations, were all about proving their worth – comparison and control were the currency. This was not about accessing inherent-vitality; this was not working.

I spent time looking at the different radial threads and making adjustments to the content of activities and stories and the like, based on developmental needs. I worked more with large muscle activities in our circle. I shifted things in the environment. I did more movement to try to bring body, heart, and mind into harmony. And on through the threads, I tweaked things. Nothing was working. And it was pronounced that the only time the children seemed to just settle in and relax was toward the end of their outside play. There, the competition and control faded back and imaginative, cooperative, and deep engagement bloomed.

Might this group need a rhythm that began outside? It was looking that way, but I was loathe to change the rhythm of the day; little ones are so dependent on having a known sequence to their day that I was sure a big change would throw them into the stratosphere. Still, when nothing else was helping to settle them, I decided to try.

Next day, we began our day outside. Boy, that was a rough day; the rhythmic breach did send them into the stratosphere and there was not one moment of settling in at all. One of the children, the most controlling of the group, our little play director, was so distressed by the change that when his mom arrived to pick him up, he greeted her with, "I am NEVER coming back to THIS school!" Hard to hear, but I knew we were only hearing about the rhythmic breach and it would take time to see if this was the right move.

To my surprise, it only took two days. On the third day, they arrived ready to play outside. Settling in happened very quickly and their play was imaginative and cooperative and you could feel them processing and experimenting with their inner worlds; I did not feel the tension at all. I did wonder if we would be staying outside all day - and I was prepared to do so! But after about an hour, the anxiety started rising up again with some of them getting tired and whiny and others going into overdrive. The control issues started peeking out. So I sang them back inside where we gathered for the other activities; interestingly, now they settled right back in. Most interesting to me was that their indoor creative play completely shifted. In truth, because of how different the outside play had been, I was fully prepared just to go back out after they had recharged with snack, story, and movement. But before I could even move in that direction, there were logs and silks and rocks and wooden creatures being moved around the room, and they were all deeply engaged inside.

And so it went to the end of the year. The rhythmic flow had been out of sync with this group, so even though all the rest was on target, the children could not receive that nourishment until we righted the rhythm. Once done, nothing else needed changing. Now the web was working as a whole, tension and control and competition were the exception, and, far more often than not, the children settled deeply into all the activities. Interestingly, even the child who had so badly needed to control and direct was able to settle into an open-ended and cooperative play the vast majority of the time.

Situation #2: *The children went flat*

Let's go back to the first article and the story of Micah, back to his realization about Copernicus, and look at how the Enki Web influenced our approach to this study. Really, in Micah's reaction and the class' response to it, one can see the impact that working with the web can have – the impact on both the depth to which the children will go and on their willingness to step into the unknown wholeheartedly. But that is the end result; in order to show the impact of working with the web, I will need to go back many years; back to the first time I taught this unit, a time before I was conscious of and working actively at all with the principle of an educational ecosystem.

1989. I was working with a particularly lively group of group of seventh graders, very engaged and used to putting 100% into all they did. Sure, there were exceptions and struggles, but the overall mood of the group was one of unusual gusto. When I told them a shorter story of Copernicus they were all ears. But when I showed them the accompanying star charts, I felt that gusto go flat. They were excited to make models of the geo-centric and helio (sun) centric systems, and they were eager to share whatever research they uncovered, but their focus was on showing how much we know today, how much smarter we are. The tone was very much one of collection and competition, and no one walked out on that precipice of the unknown that Micah fearlessly approached; actually, they didn't seem to notice the precipice before them. No one stretched to sit inside Copernicus' experience, to connect, nor did they apply their own imaginations or their perceptions to the information I set out before them.

So years later, when I was deeply involved in developing Enki, when the time came again for me to teach the unit to a different group – Micah's – I spent some time with the Enki Web to see if I could uncover a doorway to deeper learning, to connection. I began to explore the issues brought to light by the radial threads: rhythms; environment; and mirroring child development, and all these seemed to be in good alignment. But when I got to the Essential Energy thread I could see that work was needed.

Essential Energy is the one radial thread that is not about the children; it is about the material itself, about what lies at the heart of the material and, therefore, why we would teach it at all. I knew that at the broadest level, from the science perspective, it is not the facts that are essential – the children can get those online any time. Collecting of facts is not science. Essential to science is entering into the wonder of the unknown. All scientific progress starts there and returns to this "living in the question and standing with new, reality-shaking possibilities." As Einstein said, "Learning is experience; all the rest is just information."

So now came the fun! To uncover the opportunities for teaching this unit as experience, I worked with another long time Enki teacher, Marguerite. Together, we set out to figure out how to bring this study as a living experience. To do that, we looked to the radial threads of the web. We discovered that we needed to experience the skies ourselves and find the directly perceivable relationships. We spent many weeks at it, watching the constellations and the planets: we each got to watch the Big Dipper and Cassiopeia circle the North Star while Orion rose and fell and Jupiter went on its own way. 4:00 a.m. became a fun time to rise! A little at a time, patterns began to reveal themselves and the two of us grew so excited we couldn't stop calling each other to report in. Now, the dry information had an entirely different feel and we could design observation activities and questions that would allow the children to see for themselves and to enter the magic of the ordinary.

Interestingly, it also led to a rewriting of the story, but this time rather than reporting on Copernicus' life, we stood inside his life with all its trials and inspirations.

In the course of working with Essential Energy all the other problems were righted, and you can see the impact of fully entering the study from Micah's experience and the class' response.

Each situation will be different and call our focus to different threads, but these radial threads are the “sun, water, soil, nutrients, and so on” of the educational ecosystem, and we apply them to everything that teachers find of interest or concern, from within Enki or from the world at large.

Exactly how a given teacher sees to manifest these principles for her particular situation will be different teacher to teacher, and home to home, and school to school. But the questions the adult asks, the perspective she brings, will be the same. In an Enki program, the teacher will work with these consciously any time something has that “off” feeling, or anytime any new initiative inspires her. So whether the topic is Brain Gym or Wilderness Awareness, New Math programs or the history of revolution, racial justice or self-directed projects, and so on, we look through the lens of each radial thread to see how the approach might be adapted and integrated into the Enki program in such a way as to support the coherence of the program and, therefore, support the child's accessing of inherent-vitality.

With experience, we come to see the world through the lens of these radial threads all the time and we have an overall feel for where there are alignment issues and where harmony is flowing. Over time, it becomes only an occasional event that we systematically go through all the threads in depth, but when something is stuck, even 30 years in, I step back and go through each thread, all in search of new understanding.

Most importantly, beyond the Enki program, *no matter what system or educational methodology one may use, whether one is conscious of the radial threads or not, these principles are at play.* Like sun, water, soil, and nutrients in the forest, they are at play in all learning situations; the only question is how much we align ourselves with them, and, in so doing, support the accessing of inherent-vitality.

Section 4: A living, breathing organism

At this point, we have established that life is made up of ecosystems and that each of these follows the same natural laws or processes, expressing them in unique ways. Those processes are the radial threads of our web or ecosystem, and it is through our alignment with these that we support the accessing of inherent-vitality. Our perspective, and a breadth and depth of understanding of these, forms the questions through which we, in Enki Education, explore any and all educational possibilities. But none of these radial threads exist on their own – ever.

The linear cause and effect nature of speaking requires that we begin discussing them as separate entities, but this is misleading at its core. Why? John Muir described it perfectly: "*When we try to pick out anything by itself, we find it hitched to everything else in the Universe.*"

As is true for the elements in any ecosystem, no one element is more important than any other, AND each is impacting and being impacted by all others moment to moment, creating a full system, or “being.” **It is not a linear process or a cumulative one. Rather, in all cases, all the threads come to bear on each other and act in response to each other at every moment – we cannot align with an ecosystemic paradigm if we do not honor this.**

Many programs attend consciously to one or two or more of these threads. In my long search for a deeply nourishing approach to education, I taught in and explored many, many approaches, from free-schools and Headstart, to Integrated Day, Theme Studies, and Emergent Curriculum, to traditional public schooling, to Montessori and Waldorf Education. I found elements of the ecosystem in each, and that helped inform me. And I have seen quite a few wonderful individual teachers who instinctively connect with many of the threads. But still, despite the richness I experienced in many places, I always felt something missing. That something is the living pulse of an ecosystem. Why does it matter? It is in the moment to moment relationship between the radial threads that the web becomes an organism and that is what opens access to inherent-vitality.

Frequently, the thought of living this truth initially feels overwhelming to teachers and parents – so much happening at once! And it actually *is* overwhelming if we try to chase after each thread separately; then we will just exhaust ourselves and move farther away from our inherent-vitality. This struggle stems from the fact that we, in the modern West, have come to believe in a linear cause and effect reality. But, in fact, this dynamic ecosystem is how our bodies work – we don’t ask our hearts to hang on a minute so we can breathe, or our cells to hold still so our blood can pump! This ecosystemic process *is* life, so reconnecting with life means stepping into this all-at-once awareness. Interestingly, once you make this shift, it is much easier to navigate the ecosystemic than the linear because it resonates with our bodies and with the world around us.

We had an interesting exploration of this at the most recent Teacher Training Course.

The teachers had spent the last three years focusing on the separate radial threads and beginning to see how they work together. But the sense of it all working as a breathing organism hadn’t quite settled in. Tess, a

particularly tenacious trainee unwilling to skip along with partial understanding, kept questioning as she struggled to get it. I pondered how to find a living way to explain.

By good fortune, it happened that the room we were in had a set of harmonic bells, each with a different tone and of a different color. I gave each teacher a bell and an assignment: walk in and out of the circle at any pace they wished, ringing their bells in any rhythm they chose. They did – they had been studying Enki for three years and were used to this kind of learning! At first it was cacophony, and a little painful on the ears. Then, a bit at a time, it settled into a beautiful harmony. The room resounded with this unified song and it seemed to carry itself – and us – without effort; so much so that the students did not want to stop. The parts had become a whole, not by all coming to do the same thing, but by finding the place where the individual tones and rhythms naturally settled into a whole. Point made.

In fact, we know this ecosystemic pulse in our bodies; we know it in music and dance; we know it in sports, and so on. We know it and we live it. We just don't trust it in our learning! Odd, but true. Once we move into this ecosystemic way of thinking – and living – we have made that 180 degree flip and we stand in a new world. It is a different world, different, but in harmony with nature's wisdom. Here, all the old treasures still belong, just inverted. So, when we looked at the issue of the kindergartners' not settling in and getting caught up in control and competition, once we moved into a rhythm that met the children's needs, we could still do all the nourishing activities, and do so far more fully. Or if we go all the way back to the example of working with Copernicus in the first article, we can see the same thing at play: with the goal of letting wonder connect us to our inherent vitality, we still observed and analyzed, questioned and looked at charts and theories, but just *when* we did this and *how* we did this was completely different than if our goal had been imparting information. So rather than coming out of the study with a lot of factual information and little else, the children came out with a sense of wonder and the resulting eagerness to look further, *and* the information and ideas they had gathered had real meaning.

If we think back to the orchestra situation, and we approach our teaching with the same underlying sense of conducting all the instruments, we will find the parts working together to make a whole and the whole serving that deep accessing of vitality from which compassion and wisdom naturally flow. When this becomes the ground of our days, then all our trips and falls become opportunities to awaken and seek the whole again. For the children, this is an unconscious journey, a cellular one. But, coming back to where we started - storing animal food for the flood – we can see that the experience of a coherent ecosystem *within* connects the children to the ecosystems around them.

