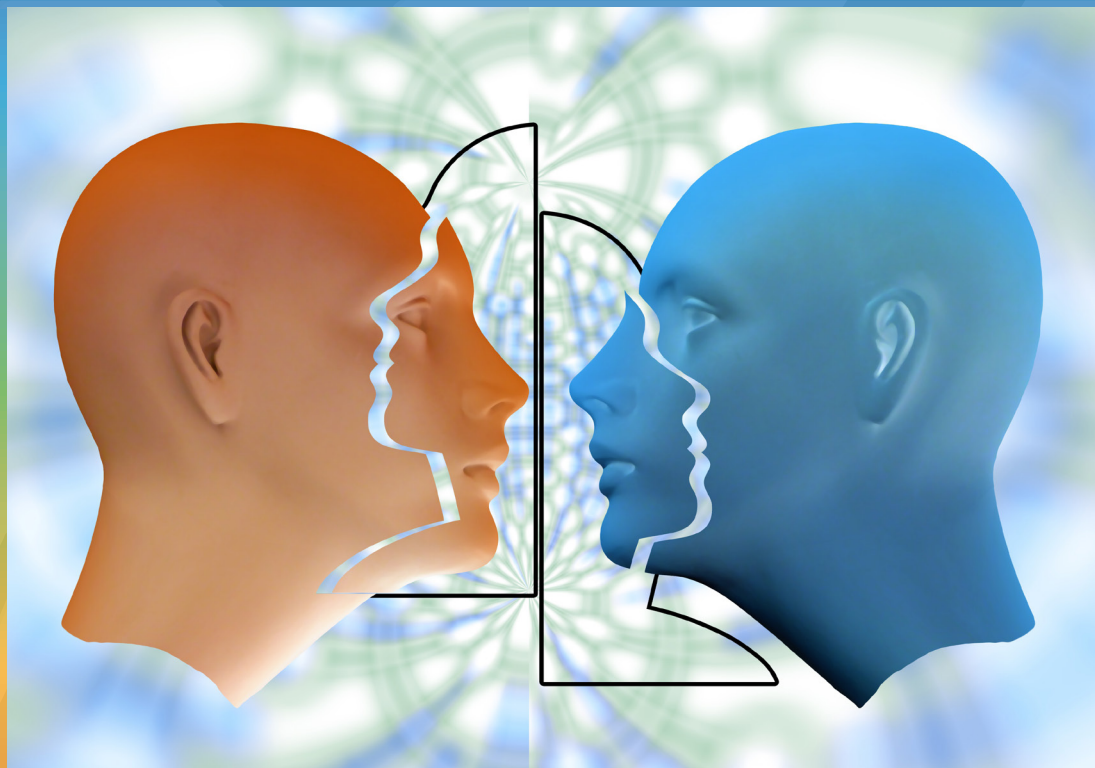


PERCEPTION, PURPOSE AND
PRINCIPLES OF HARMONY:

THE GOLDEN RULE FOR A SUSTAINABLE FUTURE



TUKO SAWA
HARMONY ACADEMY

ACKNOWLEDGEMENT

This work relies on various sources but the bulk of it comes from HRH The Prince of Wales' book: "Harmony: A New Way of Looking at Our World," (2010) which calls everyone to join the "Sustainability Revolution" to save our planet.

I acknowledge the dedication of the Harmony Ambassadors in Tanzania who are working tirelessly to change "harmful" perception that destroys wellbeing of people and our planet.

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FRONT COVER: Image from Pixabay: By Gerd Altman

AN URGENT MESSAGE TO HUMANITY

WE NEED TO CHANGE HOW WE THINK, ACT AND MEASURE SUCCESS.

We have collectively failed to engage with **Nature** sustainably, to the extent that our demands far exceed its capacity to supply us with the goods and services we all rely on.

Our unsustainable engagement with **Nature** is endangering the prosperity of current and future generations.

At the heart of the problem lies deep-rooted, widespread institutional failure.

The solution starts with understanding and accepting a simple truth: our economies are embedded within **Nature**, not external to it.

Our economies, livelihoods and well-being all depend on our most precious asset: **Nature**.

We are part of **Nature**, not separate from it. We rely on **Nature** to provide us with food, water and shelter; regulate our climate and disease; maintain nutrient cycles and oxygen production; and provide us with spiritual fulfilment and opportunities for recreation and recuperation, which can enhance our health and well-being. We also use the planet as a sink for our waste products, such as carbon dioxide, plastics and other forms of waste, including pollution.

Nature is therefore an asset, just as produced capital (roads, buildings and factories) and human capital (health, knowledge and skills) are assets. Like education and health, however, **Nature** is more than an economic good: many value its very existence and recognise its intrinsic worth too.

Biodiversity enables **Nature** to be productive, resilient and adaptable. Just as diversity within a portfolio of financial assets reduces risk and uncertainty, so diversity within a portfolio of natural assets increases **Nature's** resilience to shocks, reducing the risks to **Nature's** services. Reduce biodiversity, and **Nature** and humanity suffer.

ABOUT THE LESSONS

The following eight lessons are intended for rebalancing **perception** to encourage sustainable lifestyles. They will equip the learner with a renewed moral **purpose**, and heightened self-awareness. The **principles of harmony** will increase their ecological awareness and put the duty of care for our planet in everyone's hands.

The lessons are suitable for a medium to large groups of up to 100 adult learners. The model of learning is conceptual and collaborative.

It creates active engagement of the learners, in-depth discussions and reflections amongst themselves and the facilitators. After each lesson, learners are encouraged to consult with local resourceful Elders for discussions and documentation. Furthermore, each lesson has two values attached and offers a specific competency, aimed at building capacity of the learners to act on the harmony message and teach others about sustainability.

SUSTAINABLE DEVELOPMENT GOALS (SDG) 4:7 STATES THAT:

“By 2030, ensure that all learners acquire the knowledge and skills needed to promote sustainable development, including, among others, through education for sustainable development and sustainable lifestyles, human rights, gender equality, promotion of a culture of peace and non-violence, global citizenship and appreciation of cultural diversity and of culture's contribution to sustainable development”

(UNESCO, 2016)

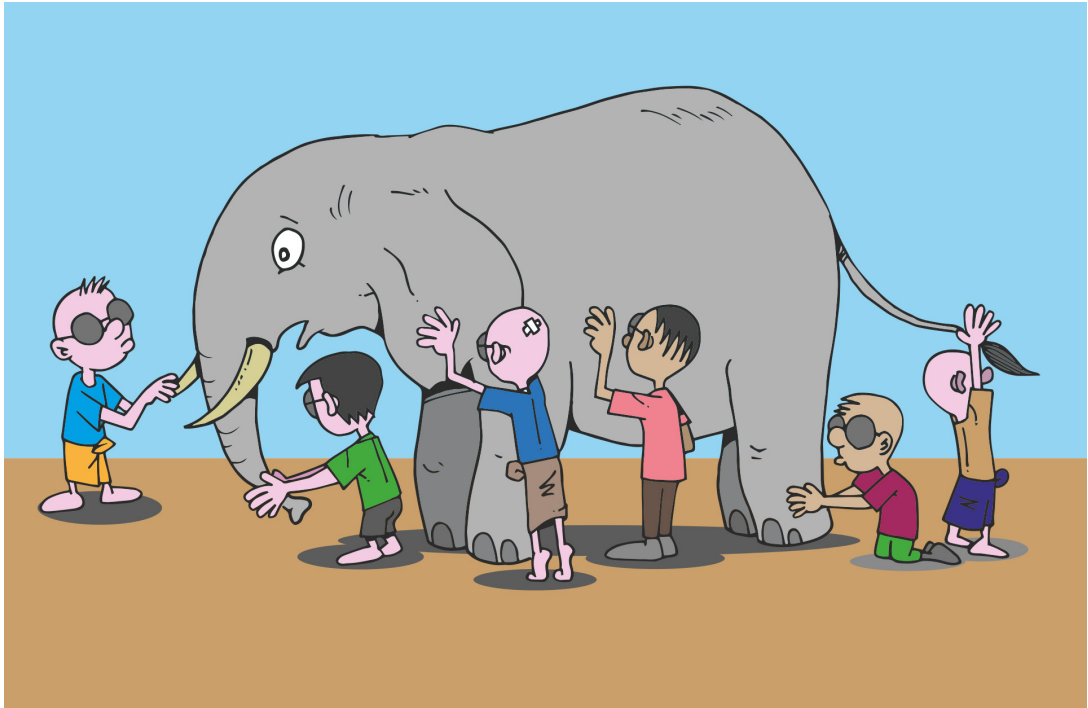


Image from Pixabay. By MoteOo Education.

PERCEPTION IS IN THE EYE OF THE BEHOLDER

The parable of the six blind men and an elephant is a story of a group of blind men who have never come across an elephant before and who learn and imagine what the elephant is like by touching it. Each blind man feels a different part of the elephant's body, then describes the elephant based on their limited experience. Each of them believes their judgement and suspects that the others are wrong.

The moral of the parable is that we must be aware of our limited, cultural-specific filters for seeing reality because "absolute truth" exists outside human experience. A harmonious way of seeing requires humility to listen to others and act with empathy because we must all work together to take care of our shared planet as equal partners.



DUBAI MARINA Photo from Wikimedia. By Davido Mauro (2020)



MAASAI HOMES IN NGORONGORO, TANZANIA
Photo from Wikimedia. By George Lamson (2012)

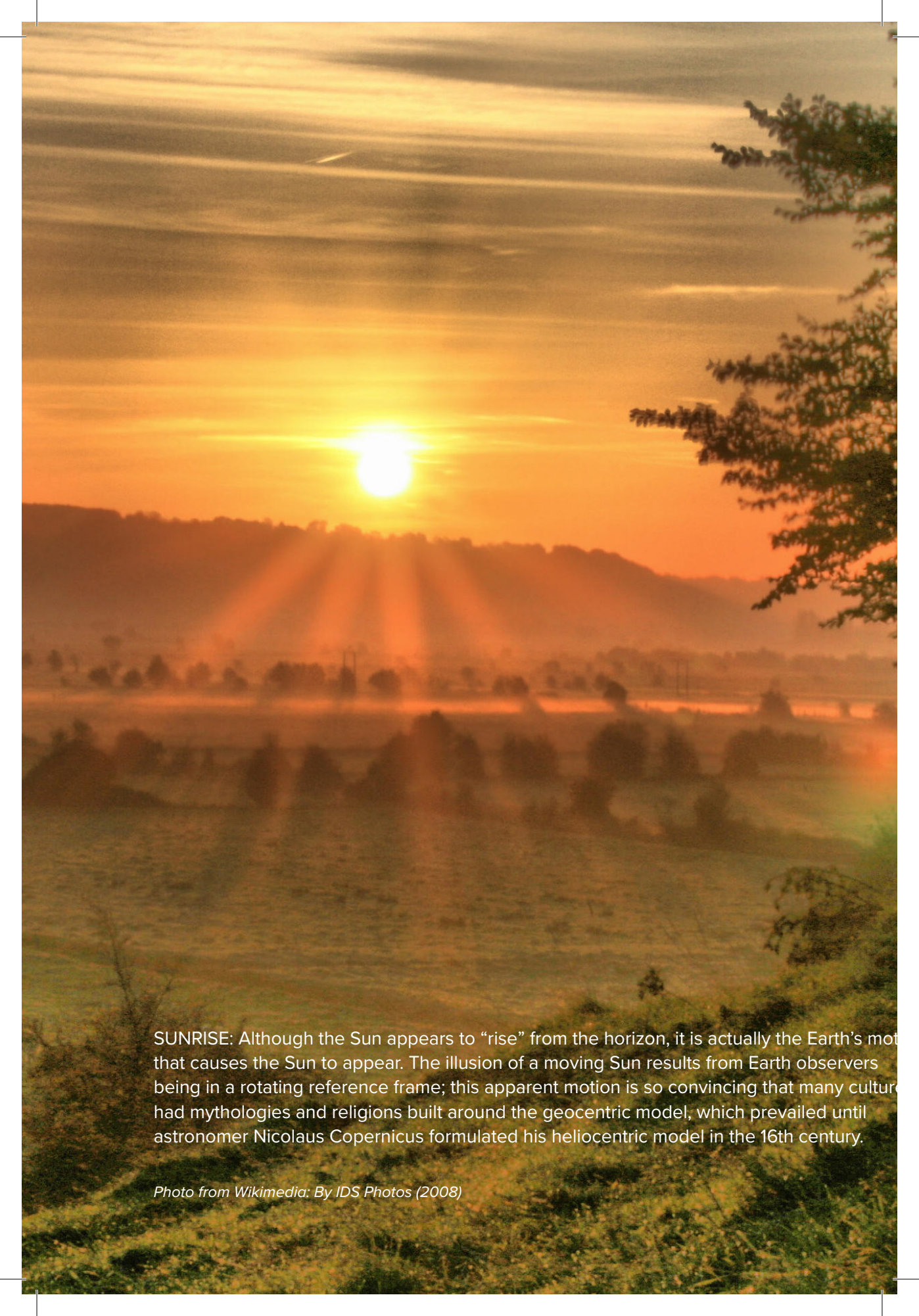
INTERROGATING “DEVELOPMENT”

The accepted “Civilisation / Development” narrative disempowers billions of people worldwide to believe that their ancestral’s ways of adapting to their environments are inferior and in need of “developing.”

Modern education reinforces the same harmful perception by excluding indigenous knowledge, which offers a

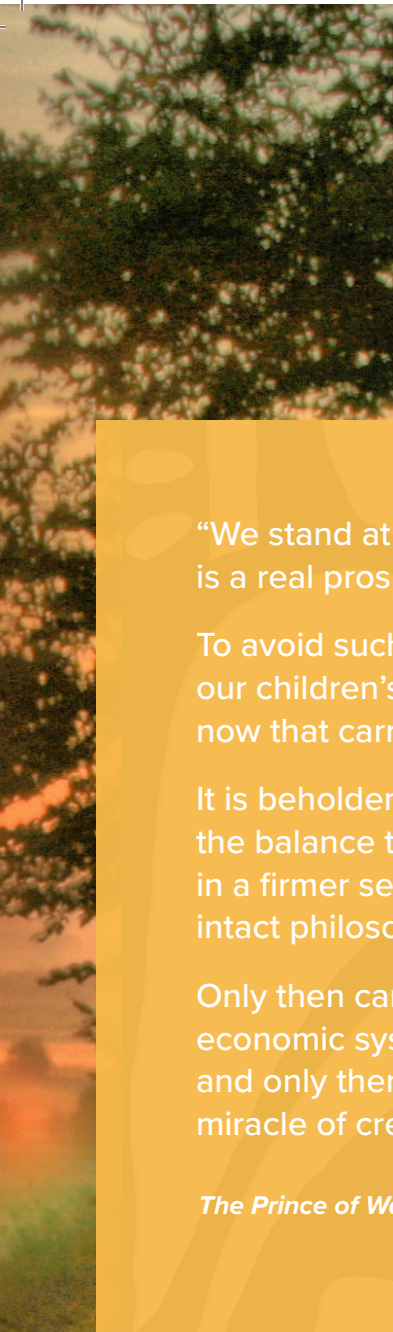
more holistic approach of how to relate with Nature.

To address excessive consumerism and environmental degradation, we must rethink our relationship with Nature.



SUNRISE: Although the Sun appears to “rise” from the horizon, it is actually the Earth’s motion that causes the Sun to appear. The illusion of a moving Sun results from Earth observers being in a rotating reference frame; this apparent motion is so convincing that many cultures had mythologies and religions built around the geocentric model, which prevailed until astronomer Nicolaus Copernicus formulated his heliocentric model in the 16th century.

Photo from Wikimedia: By IDS Photos (2008)



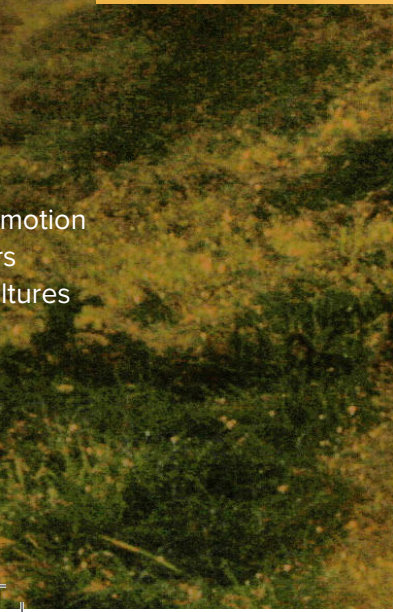
“We stand at an historic moment. We face a future where there is a real prospect that if we fail the Earth, we fail humanity.

To avoid such an outcome, which will comprehensively destroy our children’s future or even our own, we must make choices now that carry monumental implications.

It is beholden upon each and every one of us to help redress the balance that has been so shaken by re-founding our outlook in a firmer set of values that are framed by a clearer, spiritually intact philosophy of life.

Only then can we hope to establish a far more sustainable economic system; only then can we live by more rooted values; and only then might we tread more lightly upon this Earth, the miracle of creation that it is our privilege to call ‘home’.”

The Prince of Wales (2010:325)



motion
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ltures

“Reverence is not science-based. It is not knowledge. It is an experience induced by love, and love comes from relationship. Without reverence and love, without a spiritual relationship, it seems to me that we are little more than a chance group of isolated, self-obsessed individuals, unmoved by love and un-anchored by any sense of duty to the thing that deserves our reverence.”

The Prince of Wales (2010:312)

TUKO SAWA / WE ARE OKAY

Tuko Sawa is a Swahili expression meaning we are okay. It also means we are equal or we are the same. It is a very helpful tool for reminding ourselves that we are all created equal, endowed with consciousness and that we can make the choice to “treat others as we wish to be treated.” This is the moral compass called “**the Golden Rule**”, which informed many cultures and almost every sacred tradition in our world.

The golden rule is often quoted with a sigh of helplessness as if a divine intervention is needed to help us make this “difficult” choice of doing

good, forgetting that we can make that choice. However, what is missing from the golden rule is how to treat Nature (We are part of Nature, not separate from it).

In practice, the Tuko Sawa concept extends the Golden Rule to Nature, with the understanding that, what we do to Nature we do to ourselves. Poisoning the soil or polluting the water means our health will suffer because our food will not be safe. Tuko Sawa offers a personal philosophy for doing the right thing even when no one is looking.

TUKO SAWA CORE VALUES ARE HUMANITY, LOVE AND UNITY

HUMANITY

is about dignity and equality.

LOVE

is central in any relationship.

UNITY

is the awareness that we are part of one living entity of dynamic, diverse, interconnected and interdependent life systems.

PERCEPTION AND PURPOSE

We make assumptions and conclusions based on the “pictures in our heads.” These images are collections of everything we have learned and experienced since our childhood, which enable us to perceive the world. They determine our inner ok-ness.

Although perception is culturally-specific, the materialistic worldview of “progress” has the ability to dictate how people perceive themselves and others. Technologies of communication have crossed cultural borders allowing “progress” to speak with the same visual grammar.

Institutionally, prosperity of a country is measured by how much money their citizens are spending. More money, Skyscrapers and gadgets of luxury count as progress/success; whatever the cost to Nature.

People from the so called “developing” countries, are then seen as not Okay.

Youth from these stigmatised countries are often risking their lives on dangerous sea voyages in order to find OK-ness in the countries whose images fit the universal perception of progress.

This is contrary to what elders in these societies believe. They find purpose in taking care of what was handed to them with dignity and without greed, knowing that every cycle brings new abundance. They understand that everything in the universe is ordered by an infinite force that is also present in all creation on earth. These elders treat Nature with awe and reverence and they tread gratefully on this planet.



LIFECYCLE OF A COMMANDER BUTTERFLY
Photo From Wikimedia. By Rajeesh Raghav



One of the Learners, Dickson Athanael from Tabora, Tanzania consulting with Elder Kalugendo (100 Yrs old) about the Principle of Health. Elder Kalugendo has never had cause to go to a hospital and enjoys great health - Note how the Elder listens with the whole “being.”



NATURE IS OUR TEACHER

To ensure a sustainable future, we must respect Indigenous Wisdom and integrate it into the Global Knowledge Systems to improve our understanding of Nature.

The elders who hold this knowledge are dying out so it is necessary to take action now. They may not know how to read or write but they are “audio encyclopaedias” willing to share knowledge that equipped them to improve their lives and protect their natural resources.

All we need is to learn
how to listen to them
because they know how
to “read” Nature.

“We are testing the world to destruction and the tragedy - no, the stupidity - is that we will only discover the real truth when we have finally succeeded in completely denuding the world of its complex life-giving forces and eradicating traditional wisdom. If we continue to engineer the extinction of the last remaining indigenous, traditional societies, we eliminate one of the last sources of that wisdom.”

The Prince of Wales (2010:22)



Photo From Wikimedia. By IndoMet

DEFORESTATION IN BORNEO Between 2000 and 2017, 6.04 million hectares of old-growth forest were lost in Borneo, a decline of 14%. About half of that area was ultimately converted to industrial plantations, and 92% of the forest that was converted was replaced with plantations within one year of being cleared. In that same time period, industrial plantations increased overall by 170%, or 6.20 million hectares, of which 88% were for oil palm and 12% for pulpwood.



LESSON ONE: HARMONY

WHAT IS HARMONY?

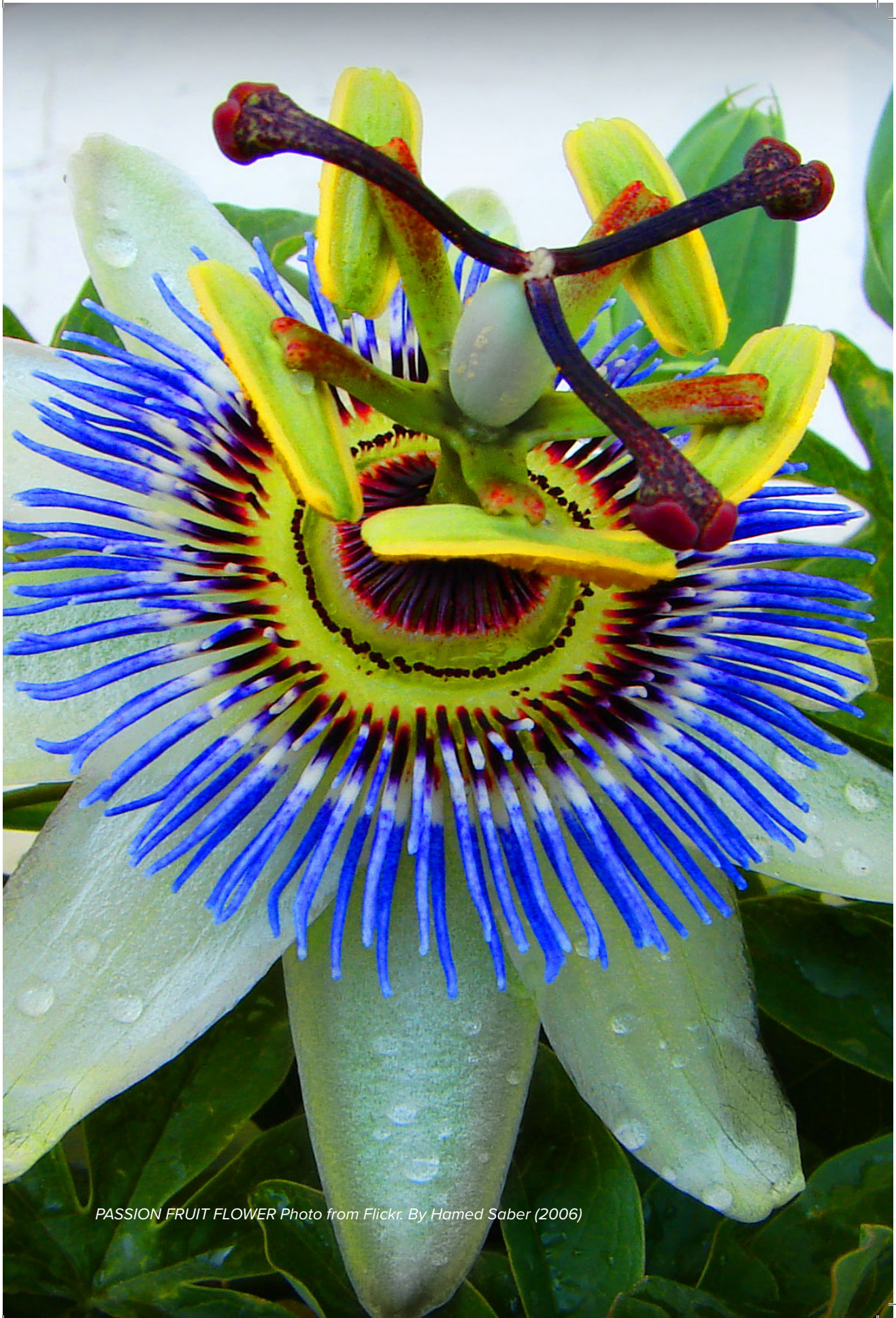
The word harmony originates from the Greek word harmonia meaning “joint” (united) or fitting together. Everything in the universe is interconnected, interrelated and interdependent. Moreover, there are underlying principles that enable and regulate the right relationships within this unified whole in order for a balance to be maintained at all times. This is what harmony is all about. Right relationships within the whole.

A holistic perception that considers life from this wider perspective is spiritually grounding and enhances our wellbeing and sense of purpose. First, we must accept that we are all part of one living entity and we must tread on this planet with gratitude and dignity in order to participate in the cycle of life harmoniously, by always maintaining the right relationship with every other element of Nature. Our Elders do so.

THERE IS AN URGENT NEED FOR HARMONY

Rethinking our relationship with Nature will rebalance our perception and reopen our eyes once again to heal the “spiritual blindness” and bring us back into harmony with Nature.

Harmony must start within ourselves. Being in harmony means we are reconnected with the essence of our “beingness” (we are Okay) and that we have a compassionate relationship with our bodies, mind and spirit. Most importantly, being in harmony widens our perspective so we can reflect with gratitude about other elements of Nature; the soil we stand on, the free air that we breath every second, the water, the sunlight, the plants, animals and other living and non living entities which all contribute to the health of our planet. When we are Okay we will treat Nature with respect and awe because we will be aware that we are privileged to be alive and witness the greatness of our amazing planet.



PASSION FRUIT FLOWER Photo from Flickr. By Hamed Saber (2006)

VALUES FOR HARMONY:

LOVE:

The Golden Rule applies here. Treat others as we wish to be treated.

GRATITUDE:

Walk with gratitude and awe at the miracles of life on earth.

COMPETENCIES:

LISTENING:

Listening mindfully and effectively is central to harmonious relationships.

CRITICAL THINKING:

We must always consider impacts of our actions on Others and Nature.

LISTENING

DEFINITION:

Listening is the ability to accurately receive and interpret messages in the communication process. Listening is key to all effective communication. Without the ability to listen effectively, messages are easily misunderstood. As a result, communication breaks down and the sender of the message can easily become frustrated or irritated.

LISTENING IS NOT THE SAME AS HEARING

Hearing refers to the sounds that enter your ears. It is a physical process that, provided you do not have any hearing problems, happens automatically.

Listening, however, requires more than that: it requires focus and

concentrated effort, both mental and sometimes physical as well.

Listening means paying attention not only to the story, but how it is told, the use of language and voice, and how the other person uses his or her body. In other words, it means being aware of both verbal and non-verbal messages. Your ability to listen effectively depends on the degree to which you perceive and understand these messages.

Listening is not a passive process (*accepting or allowing what happens or what others do, without active response or resistance*). In fact, the listener can, and should, be at least as engaged in the process as the speaker. The phrase **'active listening'** is used to describe this process of being fully involved.

“Most people do not listen with the intent to understand; they listen with the intent to reply.”

Stephen R. Covey



ACTIVE LISTENING Photo from Wikimedia. By Shimer College (2013)

THE PURPOSE OF LISTENING

Listening serves a number of purposes, and this will depend on the situation and the nature of the communication.

1. To specifically focus on the messages being communicated, avoiding distractions and preconceptions.
2. To gain a full and accurate understanding into the speaker's point of view and ideas.
3. To critically assess what is being said.
4. To observe the non-verbal signals accompanying what is being said to enhance understanding.
5. To show interest, concern and concentration.
6. To encourage the speaker to communicate fully, openly and honestly.
7. To develop a selflessness approach, putting the speaker first.
8. To arrive at a shared and agreed understanding and acceptance of both sides' views.

Often our main concern while listening is to formulate ways to respond. This is not a function of listening. We should try to focus fully on what is being said and how it's being said in order to more fully understand the speaker.

BARRIERS TO EFFECTIVE LISTENING

TO IMPROVE THE PROCESS OF EFFECTIVE LISTENING, IT CAN BE HELPFUL TO TURN THE PROBLEM ON ITS HEAD AND LOOK AT BARRIERS TO EFFECTIVE LISTENING, OR INEFFECTIVE LISTENING.

For example, one common problem is that instead of listening closely to what someone is saying, we often get distracted after a sentence or two and instead start to think about what we are going to say in reply or think about unrelated things. This means that we do not fully listen to the rest of the speaker's message.

This problem is attributed, in part, to the difference between average speech rate and average processing rate. Average speech rates are between 125 and 175 words a minute whereas we can process on average between 400 and 800 words a minute. It is a common habit for the listener to use the spare time while listening to daydream or think about other things, rather than focusing on what the speaker is saying.

Of course, the clarity of what the speaker is saying can also affect how well we listen. Generally, we find it easier to focus if the speaker is fluent in their speech, has a familiar accent, and speaks at an appropriate

loudness for the situation. It is more difficult, for example, to focus on somebody who is speaking very fast and very quietly, especially if they are conveying complex information.

We may also get distracted by the speaker's personal appearance or by what someone else is saying, which sounds more interesting.

These issues not only affect you, but you are likely to show your lack of attention in your body language.

Generally, we find it much harder to control our body language, and you are likely to show your distraction and/or lack of interest by lack of eye contact, or posture. The speaker will detect the problem, and probably stop talking at best. At worse, they may be very offended or upset.

Finally, it is important not to jump to conclusions about what you see and hear. You should always seek clarification to ensure that your understanding is correct.

“Listening is not understanding the words of the question asked, listening is understanding why the question was asked in the first place.”

CRITICAL THINKING

How is Critical thinking and Listening connected - Critical thinkers must first engage in highly active listening. Active listening provides critical thinkers with what is needed to organise the information they hear, understand its context or relevance, recognise unstated assumptions, make logical connections between ideas, and draw conclusions.

WHAT IS CRITICAL THINKING?

Critical thinking is the ability to think clearly and rationally, understanding the logical connection between ideas.

Critical thinking might be described as the ability to engage in reflective thinking (*consideration of the larger context, the **meaning**, and the implications of an experience or action*) and independent thinking (*having the confidence to draw on your own innate intelligence and depend on your own judgement, having your own views and values to guide you, rather than someone else's*).

In essence, critical thinking requires you to use your ability to reason. It is about being an active learner rather than a passive recipient of information.

Critical thinkers rigorously question ideas and assumptions rather than accepting them at face value.

They will always seek to determine whether the ideas, arguments and findings represent the entire picture and are open to finding that they do not.

Critical thinkers will identify, analyse and solve problems systematically (according to a fixed plan or system; methodically) rather than by intuition or instinct.

Someone with critical thinking skills can:

- Understand the links between ideas.
- Determine the importance and relevance of arguments and ideas.
- Recognise, build and appraise arguments.
- Identify inconsistencies and errors in reasoning.
- Approach problems in a consistent and systematic way.
- Reflect on the justification of their own assumptions, beliefs and values.

Critical thinking is a way of thinking about particular things at a particular time; it is not the accumulation of facts and knowledge or something that you can learn once and then use in that form forever, such as the nine times table you learn and used in school.

THE CRITICAL THINKING PROCESS

You should be aware that none of us think critically all the time.

Sometimes we think in almost any way but critically, for example when our self-control is affected by anger, grief or joy or when we are feeling deliberately uncooperative.

On the other hand, the good news is that, since our critical thinking ability varies according to our current mindset, most of the time we can learn to improve our critical thinking ability by developing certain routine activities and applying them to all problems that present themselves.

Once you understand the theory of critical thinking, improving your critical thinking skills takes persistence and practice.

TRY THIS SIMPLE EXERCISE TO HELP YOU TO START THINKING CRITICALLY.

Think of something that someone has recently told you. Then ask yourself the following questions:

Who said it? Someone you know? Someone in a position of authority or power? Does it matter who told you this?

What did they say? Did they give facts or opinions? Did they provide all the facts? Did they leave anything out?

Where did they say it? Was it in public or in private? Did other people have a chance to respond and provide an alternative account?

When did they say it? Was it before, during or after an important event? Is timing important?

Why did they say it? Did they explain the reasoning behind their opinion? Were they trying to make someone look good or bad?

How did they say it? Were they happy or sad, angry or indifferent? Did they write it or say it? Could you understand? **What was said?**

WHAT ARE YOU AIMING TO ACHIEVE?

One of the most important aspects of critical thinking is to decide what you are aiming to achieve and then make a decision based on a range of possibilities.

Once you have clarified that aim for yourself you should use it as the starting point in all future situations requiring thought and possibly, further decision making. Where needed, make your workmates, family or those around you aware of your intention to pursue this goal. You must then discipline yourself to keep on track until changing circumstances mean you have to revisit the start of the decision-making process.

However, there are things that get in the way of simple decision

making. We all carry with us a range of likes and dislikes, learnt behaviours and personal preferences developed throughout our lives; they are the hallmarks of being human. A major contribution to ensuring we think critically is to be aware of these personal characteristics, preferences and biases and make allowance for them when considering possible next steps, whether they are at the pre-action consideration stage or as part of a rethink caused by unexpected or unforeseen impediments to continued progress.

The more clearly we are aware of ourselves, our strengths and weaknesses, the more likely our critical thinking will be productive.



CRITICAL THINKING Image from Pixabay. By Gerd Altmann

THE BENEFIT OF FORESIGHT

Perhaps the most important element of thinking critically is foresight (the ability to predict what will happen or be needed in the future).

Almost all decisions we make and implement don't prove disastrous if we find reasons to abandon them. However, our decision making will be infinitely better and more likely to lead to success if, when we reach a tentative conclusion, we pause and consider the impact on the people and activities around us.

The elements needing consideration are generally numerous and varied. In many cases, consideration of one element from a different perspective will reveal potential dangers in pursuing our decision.

For instance, moving a business activity to a new location may improve potential output considerably but it may also lead to the loss of skilled workers if the distance moved is too great. Which of these is the more important consideration? Is there some way of lessening the conflict?

These are the sort of problems that may arise from incomplete critical thinking, a demonstration perhaps of the critical importance of good critical thinking.

IN SUMMARY

- Critical thinking is aimed at achieving the best possible outcomes in any situation. In order to achieve this, it must involve gathering and evaluating information from as many different sources possible.
- Critical thinking requires a clear, often uncomfortable, assessment of your personal strengths, weaknesses and preferences and their possible impact on decisions you may make.
- Critical thinking requires the development and use of foresight as far as this is possible.
- Implementing the decisions made arising from critical thinking must take into account an assessment of possible outcomes and ways of avoiding potentially negative outcomes, or at least lessening their impact.
- Critical thinking involves reviewing the results of the application of decisions made and implementing change where possible.



LESSON TWO: THE PRINCIPLE OF ONENESS

INTRODUCTION

In lesson one we learned that harmony is a balanced state enabled by the right relationships between the elements that make a coherent whole. Harmony in human societies is also enabled by respectful relationships as sojourners (a temporary resident) on this planet. Tuko Sawa (I am Okay you are Okay) is helpful in making us see ourselves in others. This facilitates balanced/harmonious relationships of equals (Tuko Sawa).

In this lesson, we will explore the principle of oneness/wholeness to understand that everything exists together as one living entity. The principle of oneness will enable us to see the interdependence and interconnectedness of all living things and the fact that humans are a part of Nature not apart from Nature.

A coherent concept of Oneness of Nature is well understood in indigenous societies around the world. “In Africa, the worldview includes wholeness, community and harmony, which are deeply embedded in cultural values. A person becomes human only in the midst of others and seeks both individual and collective harmony as the primary task in the process of becoming a true person.” That is why there are rites of passage and peer learning (jando na unyago) that gave people a sense of purpose and belonging. Central to the African worldview is the strong orientation to collective values and harmony rooted in a collective sense of responsibility – a ‘collective ethic’ – which acknowledges that survival of the group derives from harmony through interdependence and interconnectedness.”

EVERYTHING IS JOINED UP

The idea of interconnectivity, of the world as a single living organism, is fundamental to most, if not all of what we know as indigenous cultures. Harmony is central to traditional Chinese philosophies, such as Taoism, as well as Indian worldviews. In Europe, such ideas were generally accepted until the transition of the Renaissance into the early modern period, but survived even though as a minority view. In modern academia the idea that all things exist in a relationship with all other things is based on an interpretation of the revolutionary theories of early 20th century science relativity and quantum mechanics and is especially influential amongst anthropologists. Even the concept of laws of physics points to an underlying order. In some versions, both ancient and modern, the underlying level of existence is geometrical. Often it is bound up with consciousness.

Harmony is an expression of wholeness, a way of looking at ourselves and the world of which we are part. It's about connections and relationships. The emotional, intellectual and physical are all connected. We are connected to our environments, both built and natural; and all the parts of our communities

and their environments are connected, too.

In the Harmony perspective we humans are an expression of the complete system. We are nature, just as a tree or a flower is nature.

Every living thing is intimately interconnected with every other living thing, so profoundly interconnected that the mesh or web of sustaining connections makes it impossible for one living thing to exist and function separately from all else. Imagine, for example, how long we would last without the oxygen produced by the microscopic algae, bacteria and plankton that live in the fragile ecosystems of the world's oceans, or the millions of bacteria that live in our own bodies consuming the food that keeps us going.

One of the great obstacles to our collective attempts to avert the ecological catastrophe that now looms so large is that we have lost this perspective, the feeling of belonging to nature. Even when people show genuine concern and a genuine love for nature, the shift in thinking described in Harmony which has shaped the mainstream attitude means that nature still tends to form a backdrop to our lives.



SPIDER'S WEB Photo from Pixabay. By Susanne Peterlechner

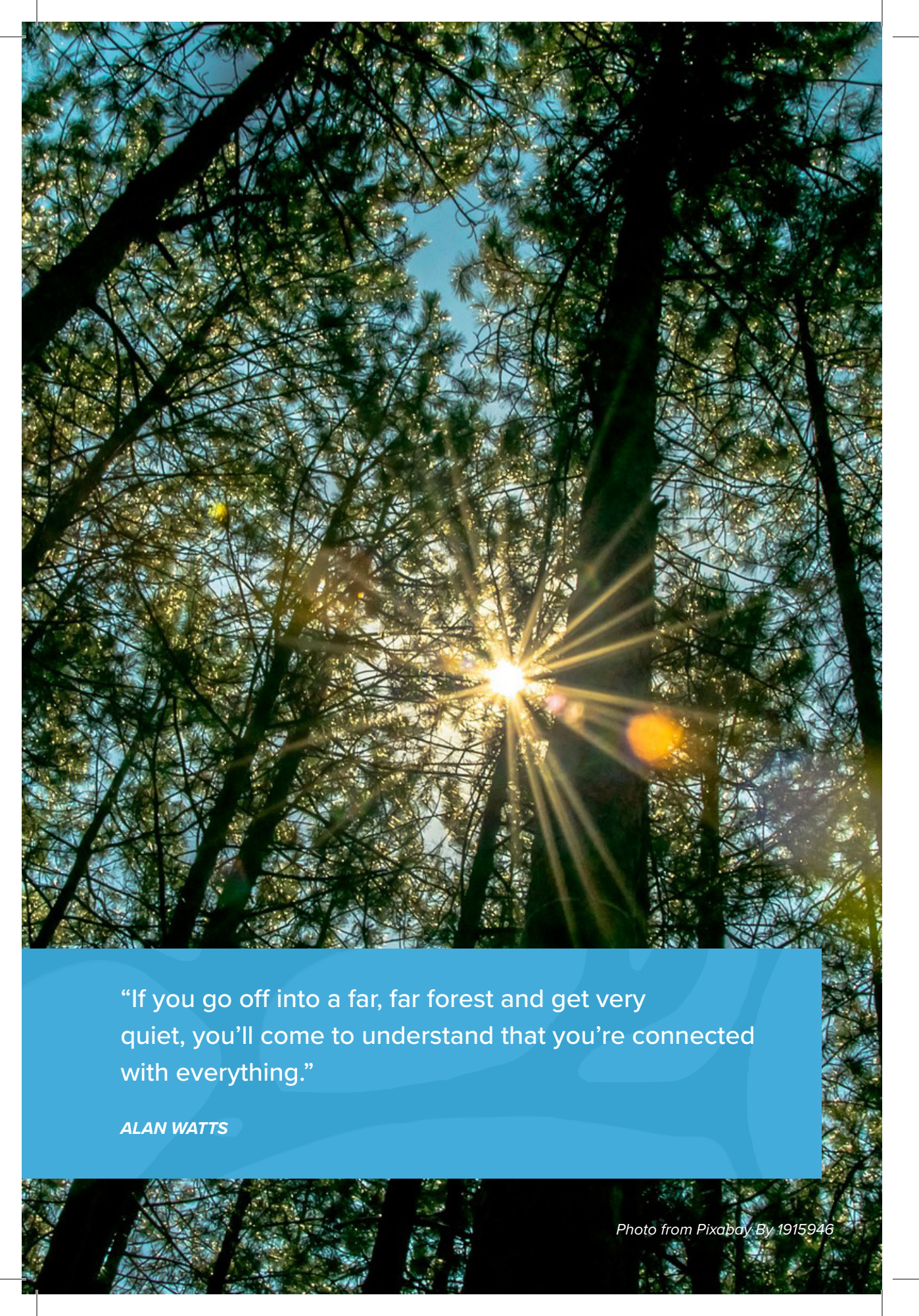
On an intellectual level we may be able to say that we are “immersed in nature,” but it is not so easy to bring to consciousness the true sense of the connectedness that implies.

As Western civilisation became more scientifically adept and technologically more sophisticated, so the gap between humanity and nature’s integrated systems began to get wider, creating the fracture that is now responsible for the greatest crisis in the history of humanity.

There is a Swahili saying that oneness/unity is strength. (*umoja ni nguvu*). This can be demonstrated by the interconnected structure of a spider’s

web with a structure supported upon four separated vertical columns. If a strand of the web is pulled or pushed it will not break because it has resilience. Its resilience comes from the relationship it has with all the other strands, so it is harder to destroy than a single column which, if pushed or pulled in the same way, will cause the structure to collapse. A single column is less stable than a spider’s web, and its collapse may also cause the others to collapse.

The principle of oneness teaches us that together we are stronger.

A low-angle photograph of a forest with sunlight streaming through the trees, creating a starburst effect. The sun is positioned in the center-right of the frame, casting bright rays of light through the dense canopy of green pine trees. The sky is a clear, pale blue. The overall mood is serene and natural.

“If you go off into a far, far forest and get very quiet, you’ll come to understand that you’re connected with everything.”

ALAN WATTS

Photo from Pixabay By 1915946

VALUES FOR ONENESS:

RESPECT:

Due regard for the feelings, wishes, or rights of others.

HUMILITY:

A recognition that you are worth no more or less than anyone else.

COMPETENCY: CONCERN FOR IMPACT

Essence Statement: Action anticipating & responding to the feelings, needs and concerns of others.

DEFINITION:

This competency is about knowing what should be achieved while accepting that getting there must take into account the perceived concerns and needs of others. It is concerned with preserving long-term working relationships while remaining faithful to one's basic objectives. It takes into account other people's interests or concerns even when you are trying to influence them through persuasive means.

BEHAVIOURAL INDICATORS

1. Takes action to have an intended or desired effect on others.
2. Acts to ensure that others will understand complex information.
3. Effectively communicates in order to influence.
4. Considers the likely reactions of others and acts to address them in planning a communication.
5. Considers in advance the impact of actions on others and adjusts actions in order to influence (have an effect).
6. Maintains people's self-esteem when interacting with them and in situations of criticism and disagreement.

SELF-DEVELOPMENT ACTIVITIES

1. Ask yourself what it might be costing others to agree with you and build their concerns into your proposals or communications.
2. Make a practice of estimating others needs and viewpoints before speaking out.
3. Actively seek feedback on how your behaviour and interpersonal skills are seen.
4. Think systematically about where your first ideas may take you before speaking.
5. Ask yourself whose interest you are serving when taking action: who are the other 'stakeholders'?
6. Actively seek to make inputs, and look for feedback



LESSON THREE: THE PRINCIPLE OF DIVERSITY

INTRODUCTION

Lesson two explored the harmony principle of Oneness showing clearly that we are part of Nature not apart from Nature. (The coherent Whole) This lesson will look at the principle of diversity to emphasise the need for celebrating differences in humans and in Nature because diversity is a necessity that makes life on earth possible. From the invisible bacterias to the graceful giraffes and the mighty baobabs, every living and non living element of Nature has a place and right to be on this planet.

Without doubt, we are all aware of the need to incorporate the indigenous wisdom that had made humans thrive and kept our planet abundant for millenniums. Earlier generations knew that diversity is a natural principle that enables Nature to be resilient and this too applies in human societies. This ancient knowledge was passed from generation to generation by word of mouth and practical applications. People's different abilities were respected and revered. A healer's talent, a farmer's prowess, builders, storytellers, midwives, comedians, (jesters) spiritual mediums and so forth.

The Earth has been here for billions of years and early humans tried and tested best practices for ensuring their survival, which they passed on to the next generation. Every geographical area had specific knowledge systems that protected diversity of life on earth. The problem started when standardising education systems enforced monoculture and relegated the role of Indigenous Knowledge Systems in the background despite it being far superior in addressing local problems. Discussing the importance of local context in any learning, the late President Benjamin Mkapa of Tanzania writes in the famous World Bank IK Notes in 1998:

“Scientific approaches to knowledge generation, as we know them today are, historically speaking, a very recent phenomenon. These modern approaches have brought about tremendous results: we have the capacity to feed more than six billion people satisfactorily; vaccinations protect our children from once deadly diseases, we communicate with the help of satellites around the globe and we compete on global market places with our products.

Yet, despite these achievements, we still have crises of hunger, HIV/AIDS, illiteracy, isolation, and conflicts and abject poverty. As scientists struggle to respond to global challenges, they have increasingly distanced themselves from local ways of solving problems. Local solutions were even discriminated against as hindering progress, outdated, “old wives tales” or simply just unfashionable.

As we “modernised” our societies, a “degree” in traditional or indigenous knowledge was not planned for. Hence, we overlooked its potential as a resource and even further neglected the knowledge that women and men, families and communities had developed themselves for centuries.”



MAASAI IN NGORONGORO, TANZANIA

Traditional Maasai have mastered the practice of living in harmony with Nature.



CELEBRATING DIVERSITY

Indeed incorporating the tried and tested practices of our ancestors especially their wisdom in relating with Nature will help us in living harmoniously and sustainably.

The harmony principle of diversity teaches us that differences are to be celebrated not obliterated. We only need to look at the different forms of life and appreciate the varieties within each species.

A true understanding of humans as part of nature moves us from the superficial tendency of tolerance and instead we embrace, celebrate and express gratitude for the uniqueness of every culture and tradition.

“Traditional leaders emphasize the importance of traditional culture and common heritage and are expected to ensure that community members live in harmony with one another. The influence of traditional leaders on their communities prevails despite the forces of modernity, changing governmental structures, modernisation, urbanisation, and encroaching Western influences.”

Edward C. Green (2009)

VALUES FOR DIVERSITY:

HUMANITY:

The virtue of acting on one's consciousness for the common good.

ACCEPTANCE:

Understanding the uniqueness of individuals instead of dismissing them.

COMPETENCY: INTERPERSONAL AWARENESS

Essence Statement: Drawing inferences (a conclusion reached on the basis of evidence and reasoning) about and maintaining awareness of others' interests, moods and concerns.

DEFINITION:

Interpersonal Awareness involves the ability to sense how others are feeling: to sense what their moods and concerns are. The key factor is to reach a conclusion on the basis of evidence and reasoning instead of relying on stereotypical information we hold on the person or group of people. This means seeking extra information whether verbal or non-verbal to enable us to empathise.

BEHAVIOURAL INDICATORS

1. We are aware of the feelings of others.
2. We are sensitive to changes in other people's mood or temperament.
3. We can see things from others' viewpoints.
4. We can sense others' emotional states and ways of thinking.
5. We understand the unspoken meaning in a situation.

6. We can empathise about others' concerns and interests.
7. We can detect the concerns, interests or emotions which seem to lie behind what people say.

SELF-DEVELOPMENT ACTIVITIES

1. Ask for the underlying concern.
2. Check for consistency between verbal and non-verbal behaviour.



PRONOUNCED 'CARE'

KEA is a very useful tool for cross-cultural interactions. We must acquire balanced **knowledge** about other cultures and beliefs to help us understand them instead of relying on stereotypes. We should have **empathy** for others because it is the most human thing to do. We then must choose the right **attitude** to treat others as we wish to be treated.



LESSON FOUR: THE PRINCIPLE OF INTERDEPENDENCE

INTRODUCTION

In lesson three we looked at the principle of diversity in Nature and understood that our differences are to be accepted, because diversity is what makes nature resilient. In this lesson we will explore the principle of interdependence to see how the interconnectedness and inter-relationships of the diverse elements enable harmony within the whole.

The health of each element is enhanced by the greater diversity within the whole. This is called 'biological diversity' or 'biodiversity' for short. The result is a complex web made up of many forms of life. For this web to work best there is a tendency towards variety and away from uniformity and, crucially, no one element can survive for long in isolation. There is a deep mutual interdependence within the system, which is active at all levels, sustaining the individual components so that the great diversity of life can flourish within the controlling limits of the whole.

A good place to start exploring how interdependence works within the whole is our own bodies. The human body is an amazing and complete system made up of billions of living cells, which work in ordered and dynamic inter-relationships to keep us alive. Scientists have come a long way in figuring out the exact number of cells to be around 30 to 40 trillion. These cells work harmoniously, without conscious command from ourselves, as long as we keep supplying them the essential needs. (Oxygen, water, food, warmth, sleep). This process of supplying essential needs to our bodies has led us to have an economic relationship with the natural world. It goes without saying that, being part of the natural order means that we are hardwired to want to make the best use of the natural environment around us for our own survival.

Humans need nature; we have created civilisation from it, we eat plants and animals, we use trees, sand, and rocks for building. We use chemicals and elements extracted from

rock and water and air to power our civilisation. We use plant materials for energy, to clothe ourselves, and we breathe air that is kept at 21 percent oxygen by a complex suite of chemical equations much larger than any of us can comprehend.

We must remember that what we exhale, the trees are inhaling; what the trees exhale, we are inhaling every moment of our life.

Going around without being aware of these processes is a “spiritual blindness.” Spirituality is about inclusiveness; allowing our consciousness to embrace the whole existence and our part in it. The wisdom of elders can help us begin to look at the world around us more holistic with eyes that see the essential power of interdependence and diversity.

Fundamentally, the principle of interdependence teaches us that we are individual entities within a whole and to thrive, we must interact respectfully with each other because no single human can exist without

input from others. Furthermore, it is our joint responsibility to ensure that our economic activities are ethical so that the extraction of resources from our planet is respectful of our planet; the only home known to humans.

If we start by the awareness that the relationships that are inside us are also outside, and that no single organism can survive on its own, perhaps then we might look at the world more differently.

If we observe relationships in the natural world, we will see that the principle of interdependence is one of giving and taking. Sadly our “development” mode is focused on limitless growth and mechanistic view that does not put value on natural environments.

The principle of interdependence requires us to think more holistic, respect relationships with other elements of Nature and to take nothing for granted. This way, we can cooperate as a global community in taking care of our shared planet.

“Interdependence is a fundamental law of nature. Even tiny insects survive by mutual cooperation based on innate recognition of their interconnectedness. It is because our own human existence is so dependent on the help of others that our need for love lies at the very foundation of our existence. Therefore we need a genuine sense of responsibility and a sincere concern for the welfare of others.”

Dalai Lama

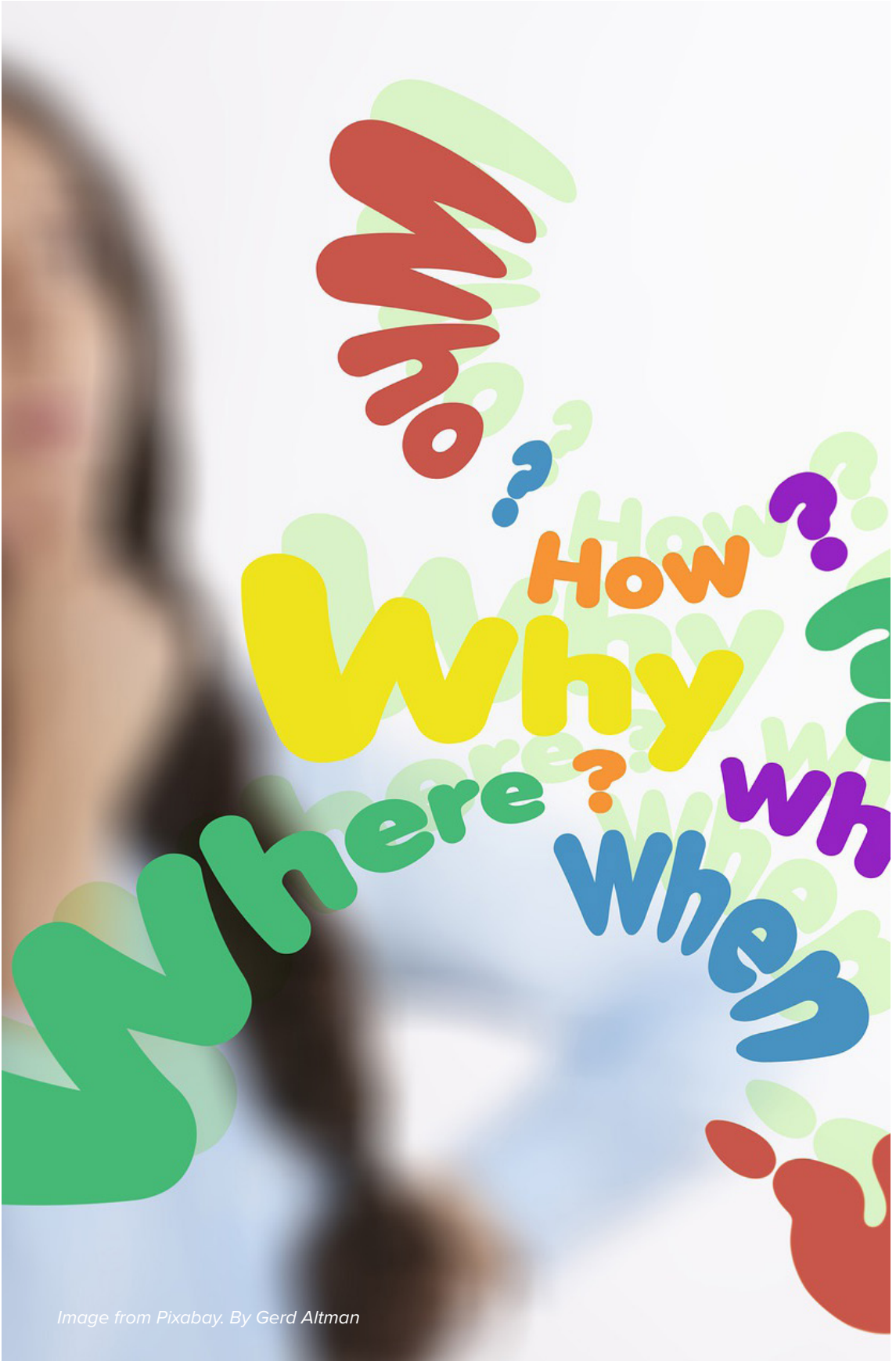


Image from Pixabay. By Gerd Altman

VALUES FOR INTERDEPENDENCE:

TRUST:

Firm belief in the reliability, truth, or ability of someone or something.

COOPERATION:

The action or process of working together to the same end.

COMPETENCY: CONCEPTUAL THINKING

Essence Statement: Seeing the bigger picture requires the ability to think abstractly, connecting dots, deepen understanding and create new ideas for problem solving. Conceptual thinking helps in seeing relationships and drawing elements together into broad coherent (logical and consistent) frameworks.

DEFINITION:

This competency describes the ability to see things as a whole; to relate different events, past experiences and new pieces of information; to make connections, see patterns and trends (a general direction in which something is developing or changing); to draw information together into frameworks which can then be used to interpret complex situations.

BEHAVIOURAL INDICATORS

1. Makes connections between facts and events that are not readily obvious.
2. Relates different pieces of information and recognises trends.
3. Understands how one task relates to the wider framework.
4. Compares present data and events with previously defined frameworks.
5. Associates seemingly unrelated information in order to analyse a situation.
6. Forms a general impression from the way people behave.
7. Identifies the key factors in a complex problem.

SELF-DEVELOPMENT ACTIVITIES

1. Always ask yourself what the context is around what you are doing.
2. Review outcomes of your projects and note where problems occurred and plan to anticipate them.
3. Check the impact of any proposed solution with people who may be affected.
4. Ask yourself what the key factors are in the problem you are working on?



LESSON FIVE: THE PRINCIPLE OF GEOMETRY

INTRODUCTION

Lesson four looked at interdependence to reveal the incredible inter-connectedness of Nature's intricate systems to understand the relationships of giving and taking that sustain life on earth. In this lesson we shall explore the harmony principle of geometry in order to marvel at the greatness of Nature by discovering how it expresses the universal order that underlies all of life.

The word "geometry" comes from the Greek word geometrein (geo-, "earth," and metrein, "to measure"), meaning "measuring earth." Geometry was originally the science of measuring land, which can be traced to Ancient Egypt. The Greeks standardised it to become one of the branches of mathematics. Geometry is concerned with properties of space that are

related with shape, size, distance and relative position of figures. It is the geometry of matter that allows us to see beauty and differentiate visible entities.

Interestingly, although geometry is a knowledge that appears to be produced by human beings, its expression and meaning exists independent of humans.

The most important example of geometry in everyday life is formed by the nature surrounding us. If one looks closely, one will find different geometrical shapes and patterns in leaves, flowers, stems, roots, bark, and the list goes on. The leaves on the trees are of varying shapes, sizes, and symmetries. Different fruits and vegetables have different geometrical shapes; take the example of an orange, it is a sphere and after peeling it,

"Learn how to see. Realise that everything connects to everything else."

Leonardo de Vinci



“There is a direct relationship between the patterns that inspired the builders of all those great masterpieces of sacred architecture and the way the natural world operates when it is in a healthy state of balance. This is because “the two speak with the same ‘grammar’.”

Prince of Wales. (2010: 8-9)



A TRADITIONAL HOUSE IN TANZANIA



AN ANT HILL

one will notice how the individual slices form the perfect sphere.

Beautiful forms, symmetries and patterns surround us representing Nature’s visual grammar. It is easy to conclude that indeed, geometry is the sacred language of Nature.

All forms of life are directly related to geometry to accommodate their growth without changing shape. Structures made by living

creatures for example the hexagonal honeycomb by bees, spider’s webs etc are interpreted in terms of sacred geometry because they make precise numerical patterns that are replicable by the same creature anywhere on the planet.

The ancients believed that the nearest the human mind could get to the Divine Mind was through numbers because of the divine proportions and relationship between the arithmetic of number and the geometry of the physical space around us. As a principle of harmony, geometry is considered sacred because it is essentially the original blueprint, the script for all of life and how it is divinely constructed and organised. It is the mathematics of the Universe, which forms consciousness and matter.



VALUES FOR GEOMETRY:

TRUTH:

is the actual state of a matter, an adherence to reality, or an indisputable fact.

HONESTY:

is a quality of being sincere and being able to represent ideas in an accurate, convincing manner.

COMPETENCY: STRATEGIC THINKING

Essence Statement: Taking the longer term into consideration and developing broad scale objectives (a goal).

DEFINITION:

Strategic Thinking shares with Conceptual Thinking the ability to put things in context and to think broadly. It differs from Conceptual Thinking in that it requires, in addition, the kind of thinking which involves looking into the future. Thus, it involves consideration of the future needs; thinking about how present processes and methods might be progressively affected by future development and trends; developing long term goals and strategies extending over significant time spans.

BEHAVIOURAL INDICATORS

1. Considers whether short-term goals will meet long-term objectives.
2. Establishes a course of action to accomplish a long-term goal or vision.
3. Determine long-term problems and opportunities.
4. Considers how present processes and methods might be affected by future developments and trends.
5. Prepares and reviews contingency plans for problems and situations that might occur.
6. Develops broad scale, long-term objectives.

SELF-DEVELOPMENT ACTIVITIES

1. Routinely scan your environment to pick up significant trends.
2. Generate a ready to use plan for the achievement of your objectives.
3. When undertaking a new task, ask yourself how it fits into your purpose or strategic objectives.



LESSON SIX: THE PRINCIPLE OF ADAPTATION

INTRODUCTION

In lesson five we looked at the principle of geometry and the sacredness of all life. We understood that the structures and patterns made by living creatures look the same whether the animal, bird or insect is in New York, USA or Dodoma, Tanzania. They are all guided by inert infinite intelligence that is constant and automatic. In this lesson we will look at how this infinite intelligence works in nature in order to maintain balance of all living things. The harmony principle of adaptation will reveal the mechanisms that enable life to persist and thrive in a specific geographical place.

Adaptation refers to modification in being or doing for the purpose of surviving changes. In nature, organisms are constantly adjusting to their environment in order to fit and thrive. Organisms can adapt to an environment by altering their body functions to increase their chances of surviving. Human bodies too adjust to their environment. For example; people who live on higher altitudes where air is much thinner than at sea level inhale fewer oxygen molecules with each breath so their bodies adapt by developing an ability to carry more oxygen in each red blood cell. In other words, although they breathe like everyone else at sea level they are capable of supplying enough oxygen to their bodies without any mountain sickness, which a traveller in their area might experience. There are many examples of how living creatures adapt to their environment. Likewise, all human societies undergo adjustments in ecological, social, or economic systems in response to actual or expected climatic stimuli and their effects or impacts. Adaptation causes changes in processes, practices, and structures to moderate potential damages or to benefit from opportunities associated with climate change. Examples abound; we have seen how humans prepare for storms, floods, and disasters.

We can see clearly here that the harmony principle of adaptation is teaching us to constantly “read” what nature is saying and adapt. It teaches us not to overuse resources because something else, somewhere must compensate to maintain balance. Over time, the number of predators and prey in an ecosystem rises and falls in a predator-prey cycle. As the number of prey increases, so does the number of predators shortly afterwards. This is because there is more food. This reduces the number of prey because they are hunted. Which reduces the number of predators because there is less food. This increases the number of prey and the cycle repeats.

As humans, we consider ourselves the stewards of the earth, because we have imagination, and the ability to create sophisticated technologies for managing our own adaptation to our environment. The question is the sustainability of our development/ adaptation models.

Architecture for instance is at odds with how life is organised. We live in one-area and travel miles to work in another. Same with food production, leisure etc. We are overdependent on motorised transportation for our everyday need. Looking at modern life through the lens of the principle of adaptation we are faced with a big question: why are we not adapting?

While the case for adaptation is clear, some communities most vulnerable to climate change are the least able to adapt because they are poor and/ or in developing countries already struggling to come up with enough resources for basics like health care and education. Equally, the same communities might not want to stay on the right path of “simplicity” simply because they are stigmatised as not “developed.”

“All failure is failure to adapt, all success is successful adaptation.”

Max McKeown

VALUES FOR ADAPTATION:

COURAGE:

is mental or moral strength to push through a difficult situation.

KINDNESS:

is caring about others and doing things to help make their lives better.

COMPETENCY: FLEXIBILITY

Essence Statement: Ability to alter behaviour and opinions in the light of new information or changing situations.

DEFINITION:

Flexibility refers to the ability to see the merits of differing positions: to change plans if circumstances dictate, and modify even strongly held opinions in the light of conflicting evidence. Unlike Adaptability, Flexibility focuses on the ability to modify/change behaviour within the same culture or environment, whereas Adaptability focuses on different or changing environments.

BEHAVIOURAL INDICATORS

1. Modifies own behaviours in respect to a situation.
2. Modifies behaviour in order to reach a goal.
3. Works around obstacles that prevent completion of tasks.
4. Sees the merits of differing positions or opposing viewpoints and changes behaviour accordingly.
5. Maintains effectiveness during rapidly changing tasks or priorities.
6. Changes plans if circumstances dictate.
7. Modifies a strongly held opinion in response to contrary evidence.

SELF-DEVELOPMENT ACTIVITIES

1. Seek feedback on your behaviour in this area.
2. Check your underlying interests and test how your present views support these.
3. Be conscious of and test your assumptions.
4. Research the background to a situation and then place probability ratings against any of your strongly held views.



LESSON SEVEN: THE PRINCIPLE OF HEALTH

INTRODUCTION

Lesson six explored the importance of adaptation in maintaining life as we know it in our natural surroundings and even within our own body systems. We already know that nature embraces biological diversity and that the health of each element is enhanced by there being a great diversity. Biological diversity or 'biodiversity' for short is a complex web made up of many forms of life. For this web to work best, there is a tendency towards variety, which is interdependent, meaning no one element can survive for long in isolation. This deep mutual interdependence within the active system sustains the health of each individual component so that the great diversity of life can flourish within the controlling limits of oneness. Every ecosystem contains an interlinked diversity of life, where each animal and plant is dependent upon the health of its neighbours. In other words, nature maintains health systems.

For any organism to be healthy it must be in harmony. The converse is that a body is 'diseased' - it does not enjoy equilibrium. So, although we cannot see it, our health depends upon harmony and that extends to the impact of those external things that influence and shape our experience of

and responses to the world.

The principle of health requires us to look closely and learn from nature's system to understand that the same dynamics that underpin the health of the natural world applies to our bodies. Our bodies remain in balance through self-sustaining systems. The way bodies maintain equilibrium mirrors the way that nature works.

Better health can be promoted through understanding the self-regulating systems that are at the heart of how we thrive. It is crucial once and for all to remember that in order for humanity to endure alongside the natural world, we must have better relationship with everything else present on our miraculous planet. The soil upon which we stand on, is home to trillions of living creatures that air it, and fertilise it to make it possible for us to grow our food. Soil per se is an abiotic entity. Like water, soil is not alive but it contains living organisms. The overall health of all these organisms is intimately linked to our very survival.

All living things take and give back to nature to maintain harmony. Ancients knew how to "read" the soil, and developed appropriate farming systems to ensure it maintains its

fertility and yields abundance. This abundance depended on nature's cycles and even today indigenous societies still farm sustainably. However, it has become increasingly acceptable to use excessive synthetic fertiliser and pesticides for profitability. This industrial farming mode is not sustainable because it cannot be repeated again and again.

A truly durable farming system is the one that has kept things going for 10,000 years – the one that is commonly called 'organic farming'. This is actually how farming was always conducted before industrial techniques came to dominate agriculture. It means farming in a way that preserves the long-term health of the soil, which comes down to giving back to nature, organic matter to replace what has been taken out. It means maintaining microbes and invertebrates in the soil and good moisture. It means using good water catchment management, planting trees that prevent the soil being eroded and maintaining the teeming biodiversity, including the beneficial and essential insects, such as bees.

Human beings are among the most complex of all life forms and yet it seems that we sometimes regard our collective and individual well being as something equivalent to looking after a car. We mend the parts as

they fail rather than seeking out and securing the causes of health, which tend to include wholesome food, rest, relaxation, exercise, a sense of community, enhanced by the quality of surroundings, relationships and contact with natural spaces. In fact, many developed countries have reported long-term increases in mental health problems.

The combination of the stress of trying to keep pace with rampant consumerism and the impact of people living more isolated lives has led to many millions becoming victims rather than the beneficiaries of how we have chosen to achieve and measure progress. We must try and avoid cheap globalised food, bereft of identity and produced at massive environmental cost, holding huge risks for humankind, at many different levels.

A more harmonious relationship with land and food – and thus ultimately with nature – can deliver improved health and food security for people if we embrace the more integrated and holistic approaches that can take us there. Indeed, if we allow nature to be our inspiration, we will be able to moderate our consumption, maintain healthy bodies and have time for mindful reflection about our life's purpose.

“It is health that is real wealth and not pieces of gold and silver.”

Mahatma Gandhi



Wikimedia. By W. Bülach (2018)

BAOBAB TREET Over time, the Baobab has adapted to its environment. It is a succulent, which means that during the rainy season it absorbs and stores water in its vast trunk, enabling it to produce a nutrient-dense fruit in the dry season when all around is dry and arid. This is how it became known as “The Tree of Life”. Baobab trees can grow to enormous sizes and carbon dating indicates that they may live to be 3,000 years old.

VALUES FOR HEALTH:

CARE:

Feel concern or interest; attach importance to something.

MODERATION:

Doing something in a way that is reasonable and not excessive.

COMPETENCY: ANALYTICAL THINKING

Essence Statement: Logically breaking problems down into their essential elements (vitaly important; absolutely necessary): carrying out diagnosis and developing solutions.

DEFINITION:

Analytical Thinking involves looking for underlying causes, thinking through the consequences of the different courses of action and developing clear criteria for guiding decisions.

Unlike Conceptual Thinking in **INTERDEPENDENCE**, which is about relating things and putting them together. Analytical Thinking is about breaking problems down into their different constituent elements – it is about deduction, drawing logical conclusions from the available information. As such, it uniquely describes the kind of sequential thinking, which for example, underpins planning activity.

Analytical skills are important because they allow you to find solutions to common problems and make informed decisions about which action to take next. Understanding problems and analysing the situation for viable solutions is a key skill in every position at every level.

From a **HEALTH** principle, Analytical Thinking skills can be used to help us with moderation, which is a principle for life. In ancient Greece, the temple of Apollo at Delphi bore the inscription *Meden Agan* - 'Nothing in excess'. Doing something "in moderation" means not doing it excessively. For instance, someone

“If one oversteps the bounds of moderation,
the greatest pleasures cease to please”

Epictetus - Ancient Greek philosopher

who moderates their food consumption tries to eat all food groups but limits their intake of those that may cause deleterious effects to harmless levels.

As an example, when we say Analytical Thinking involves looking for underlying causes (Chronic medical conditions) – in what many may call “underlying conditions”, including diabetes, heart disease, obesity, cancer and kidney disease. Using Analytical Thinking to moderate anything we ingest, will fundamentally help our Health.

BEHAVIOURAL INDICATORS

1. Makes sense of information by organising it.
2. Identifies cause and effect relationships. (To put it concisely, the cause is the why something happened and the effect is the what happened).
3. Considers pros and cons before deciding.
4. Thinks through the consequences of different courses of action.
5. Thinks through priorities.

SELF-DEVELOPMENT ACTIVITIES

1. Learn How Things Work. Don't just find the solution but know how exactly certain things work.
2. Practice Your Problem Solving Skills. Keep in mind that for every problem, there is a solution.
3. Select someone who is good at analysing problems and review your approach with them.
4. Approach every setback and failure as an opportunity to learn.



Image from Pixabay. By Gerd Altmann



LESSON EIGHT: THE PRINCIPLE OF CYCLES

THIS IS OUR LAST LESSON. WE ARE NOW FAMILIAR WITH THE OTHER TIMELESS PRINCIPLES: ONENESS, DIVERSITY, INTERDEPENDENCE, GEOMETRY, ADAPTATION AND HEALTH.

INTRODUCTION

The principle of the cycles will help us understand the dynamics and repletion of activities within the whole. Cycles is a series of events that are regularly repeated in the same order. Nature's cycles, or natural cycles are all terms that refer to the key life-sustaining processes in Nature, that work in cycles. Cycles mean that there is a constant and ongoing exchange of elements between air, earth, water, plants and animals. Nutrients in soils are recycled, rain is generated by forests, and life is sustained by the annual cycles of death and rebirth. Every dead animal becomes food for other organisms. Rotting and decaying twigs and leaves enrich soils and enable plants to grow, while animal waste is processed by microbes and fungi that transform it into yet more vital nutrients. And so Nature replaces and replenishes herself in a completely efficient manner, all without creating great piles of waste. This entire magical process is achieved through cycles.

We all know that day follows night, seasons follow one another, but there are many more cycles within those broader ones and so many of

them are interrelated so that the life cycles of many animals and plants link with one another to keep the bigger cycles moving. Built into these many cycles are self-correcting checks and balances (adaptation) whereby the relationships between predators and prey, the rate of tree growth, and the replenishment of soil fertility are all subject to factors that facilitate orderly change and progress through the seasons and keep everything in balance. No single aspect of the natural world runs out of proportion with the others – or at least not for long.

Learning and practicing these principles will help us put Nature back in her rightful place – that is, at the centre of everything! This includes our own imagination as well as in the way we do things. Fashions may change, ideologies may come and go, but what remains certain is that Nature works as she has always done, according to these natural principles.

We must rethink our perception of the world in a straight line and shift toward seeing it in terms of cycles, loops and systems. Our intention must not be to master Nature and control her, rather

we must act in partnership with her and this requires a broader or 'whole-istic' view.

Let us look at a few examples of cycles in Nature we can see that they all have to do with how the earth renews itself. The living things within an ecosystem interact with each other and also with their non-living environment to form an ecological unit that is largely self-contained. Sometimes this renewal process is gradual and gentle. Sometimes it is violent and destructive. Nevertheless, ecosystems contain within themselves the resources to regenerate themselves.

1. WATER CYCLES

All of the water that is on the earth has always been here. Earth never gets water added to it - nor does water disappear from the earth. Water is constantly recycled in a process known as the hydrologic or water cycle. Fresh water is more scarce than you might think. 97% of all the water

on the earth is in the oceans, and so only 3% is fresh water. About 2.4% of the water on earth is permanently frozen in glaciers and at the polar ice caps. About 1/2 of 1% of the water on earth is groundwater. Only about 1/100 of 1% of the water on earth is in the rivers and lakes. Water is essential to life on earth, so it is important that we protect our water resources.

Nature has a way of keeping the amount of water on the earth relatively constant. A large amount of water evaporates from the surfaces of oceans, rivers, and lakes every day. It forms water vapour that rises into the air until it cools, condenses, and forms water droplets. Millions of these droplets come together to form clouds. When clouds get heavy enough, gravity tugs on the droplets, and the clouds release their water as rain or snow. This precipitation falls into streams and rivers, which flow back to the oceans, seas, and lakes, where the water cycle can begin again.

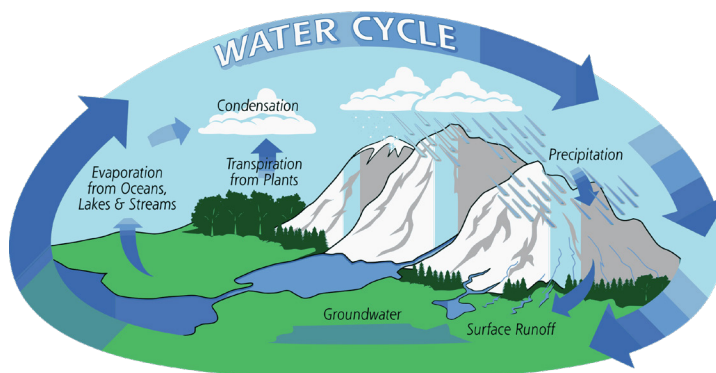


Image from Wikimedia. By Opencilipart.

“We forget that the Water Cycle and the Life Cycle are one”

Jacques Cousteau

2. ENERGY

The sun is the source of all life on our earth. Every form of energy, except for atomic energy, can be traced back to the sun. Happily, the earth is at the best possible distance from the sun for the sun's heat to provide this energy for life.

Energy from sunlight is used by plants to make food from air, water, and the minerals in the soil. This energy is stored by plants who are the primary producers in ecosystems. Energy sources such as the fossil fuels of coal, petroleum, and natural gas are really just ancient stockpiles of the sun's energy stored in plants and the animals that ate those plants that are thousands or millions of years old. These fuels came from plants that used sunlight when they lived long ago. When these plants died, they fell to the ground where their remains piled up over thousands or millions of years. As this pile grew large, the remains at the very bottom became pressed together. Over time, these remains changed. Some became a gas - natural gas. Some became a liquid - petroleum. Some became a solid or a rock - coal. We use these forms of energy to power vehicles, heat homes, and run industries. Fossil fuels are considered nonrenewable sources of energy because they cannot be replaced once they are used up.

3. LIFE CYCLES OF ANIMALS

The life cycle of an organism refers to the sequence of developmental stages that it passes through on its

way to adulthood. Mammals, reptiles, amphibians, birds, fish, insects and other invertebrates - they each have their own unique way of reproducing life. There is an amazing variety of life cycles within the animal world. Surprisingly, only about 3% of all animal species give birth to live young as part of their life cycle. Most animals lay eggs. All animals need to eat, to grow, to be safe, and to reproduce. This is all part of the life cycle. Their bodies are adapted in a wonderful range of ways to solve these problems of survival.

4. LIFE CYCLE OF PLANTS

There are over 375,000 different species of plants on the earth. They range from tiny, single-celled algae to huge sequoia trees. Life on earth would not be possible without plants because they are the only living things that are capable of converting sunlight into energy. That energy fuels the other processes of life on earth. Because plants make their own food, they are able to live almost everywhere on earth in a wide range of habitats. Many plants have developed special adaptations to help them survive.

5. SEASONAL CYCLES

The earth's atmosphere is about 430 miles thick. Without this layer of gases to protect us, we could not live. We would be scorched by the sun during the day and frozen at night. Most of the atmosphere is a thin mix of gases that is calm and unchanging. But the lowest 7 miles - the layer in which we live and breathe - contains

all the weather we experience, and is thick with gases, water, and dust. As the sun warms the land and sea beneath it, the heat keeps this lower 7 miles swirling and churning. It is the constant swirling of this lowest layer, called the troposphere, which gives us everything we call weather - from the gentle showers to raging hurricanes and tornadoes. The earth has a clear pattern of wind circulation that results from the effect of the earth's rotation and the way that the heat of the sun is distributed. It has become easier to view these cycles and patterns because of photos that can now be taken from satellites orbiting the earth.

6. PLANETARY CYCLES

Our universe has many cycles. Our galaxy, the Milky Way, turns like a wheel, and all the stars within it revolve around its centre. Our solar system moves within this galaxy. The sun spins on its axis once every 24 days and 16 hours. The planets turn on their axis and orbit the sun. Moons orbit their planets.

It took a long time for humans to understand about our planet and its cycles. Humans used to think that the earth was a huge plate that rested on the back of four elephants standing on

a giant floating turtle. Or they believed that one of the gods carried the earth on his shoulders. We now know that the cycles of our planet earth, our moon, and the sun all affect life on earth.

7. OXYGEN CYCLE

The amount of oxygen in and around the earth is fixed. But this oxygen is fed again and again through the world's living systems in a never-ending circle called the oxygen cycle. Our needs are just part of this cycle. The cycle involves a continual exchange of gases between the air and animals and plants. In a process called respiration, animals and plants take oxygen from air and give back carbon dioxide. In a process called photosynthesis, plants take carbon dioxide from air and water and give back oxygen. Respiration and photosynthesis are effectively opposite processes. Respiration takes oxygen from the air or from water, whilst photosynthesis adds oxygen to the air. Enormous quantities of oxygen are taken in by plants and animals every day, and huge quantities of oxygen are returned to the air by plants. These amounts exactly balance so that overall, the amount of oxygen in the air stays the same.

“Stars have a life cycle much like animals. They get born, they grow, they go through a definite internal development, and finally they die, to give back the material of which they are made, so that new stars may live.”

Jason Socrates Bardi

8. CARBON CYCLE

Carbon is essential for the chemical processes that support life. It plays such an important role in life that sometimes we say that life is “carbon-based”. But there is only a limited amount of carbon on the earth. So carbon is constantly cycling around the earth, turning up in a lot of different forms and places. The reactions that move carbon around make up a giant web called the carbon cycle. Plants get carbon by taking carbon dioxide from the air. They use the carbon dioxide and the energy from sunlight to make food. Animals get their carbon by eating those plants or by eating animals that have eaten those plants. When organisms breathe, they take oxygen from the air. During respiration, the oxygen reacts with food to provide energy. Respiration produces carbon dioxide which is released to the air.

Volcanic eruptions are a source of carbon. When a volcano erupts, it releases huge amounts of carbon dioxide. But remember - the earth needs its elements to stay in balance. So the effect of volcanoes is balanced by weathering which is a chemical reaction between rainwater and rocks that absorbs carbon dioxide from the air to create rock carbonate minerals. Left to themselves, these natural processes are in perfect balance. But human activities are disturbing the

cycle and increasing the amount of carbon dioxide in the atmosphere, which is causing problems because carbon dioxide is vital for controlling the world’s climate.

9. NITROGEN CYCLE

Nitrogen atoms are constantly moving in a giant circle from the air, through the soil, into the bodies of plants and animals, and eventually back to the air. This whole process is called the nitrogen cycle. All living things need nitrogen to develop and grow. Even though the earth’s atmosphere is made up of 78% nitrogen, plants and animals cannot use it in this form because the nitrogen atoms are too firmly bound together in molecules. So plants must draw their nitrogen from nitrogen compounds dissolved in the soil, and animals get their nitrogen by eating plants or by eating other animals that eat plants.

The nitrogen gets into the soil in a couple of different ways. A small quantity of the nitrogen by way of lightning. Lightning changes atmospheric nitrogen into nitrogen dioxide which is soluble in water. The nitrogen oxides dissolve in rainwater to form nitric acid which is absorbed by soil. The rest of the nitrogen in soil comes from bacteria. Bacteria are the only living things capable of getting nitrogen directly from the air. This is called “fixing”. The process is started by certain kinds of bacteria in the soil

that can extract nitrogen from the air. Then other bacteria convert the nitrogen into nitrogen compounds called nitrates, This process is called nitrification. Plants absorb the nitrates and turn them into more complex nitrogen compounds. Bacteria also help return nitrogen to the air. Bacteria in the soil decompose animal waste and the remains of dead animals and plants and produce ammonia. Nitrifying bacteria turn the ammonia into nitrates. Other bacteria, called denitrifying bacteria, convert some of the nitrates back into nitrogen gas, which is released into the air. All these different steps form a massive cycle. The effect is that, over time, bacteria in the soil return almost the same amount of nitrogen to the air as other bacteria take from the air. This keeps the nitrogen content of the earth and its atmosphere in a perfect balance.

Unfortunately, humans are interfering with the natural balance when they overuse artificially produced nitrates as agricultural fertilisers. Before

these nitrates can be converted into atmospheric nitrogen, they are often carried off from the soil by rain or irrigation. These dissolved nitrates are carried to streams and rivers and even seep down to groundwater. In some parts of the world, water for humans and animals contains such high concentrations of nitrates that it is unsafe for consumption. These excessive amount of nitrates, when they reach rivers and lakes, cause too much algae to grow. This overabundance of algae uses up too much of the oxygen in the water. When oxygen levels fall, other forms of life in the water die off. In short, when we interfere with Nature's cycles without respecting the natural order, we are causing our own extinction.

To avoid a 6th mass extinction we must adapt to live within the limits and the cycles of Nature. This includes our own imagination as well as in the way we do things.

“Fashions may change, ideologies may come and go, but what remains certain is that Nature works as she has always done, according to these natural principles. If we work against the principles, nature will rid herself of us. She has done so with other life forms five times.”

The Prince of Wales (2010:6)

VALUES FOR CYCLES:

HOPE:

A feeling of expectation and desire for a particular thing to happen.

RESPONSIBILITY:

The state or fact of having a duty to deal with something.

COMPETENCY: ADAPTABILITY

Essence Statement: Maintaining effectiveness in different situations, environments and cultures.

DEFINITION:

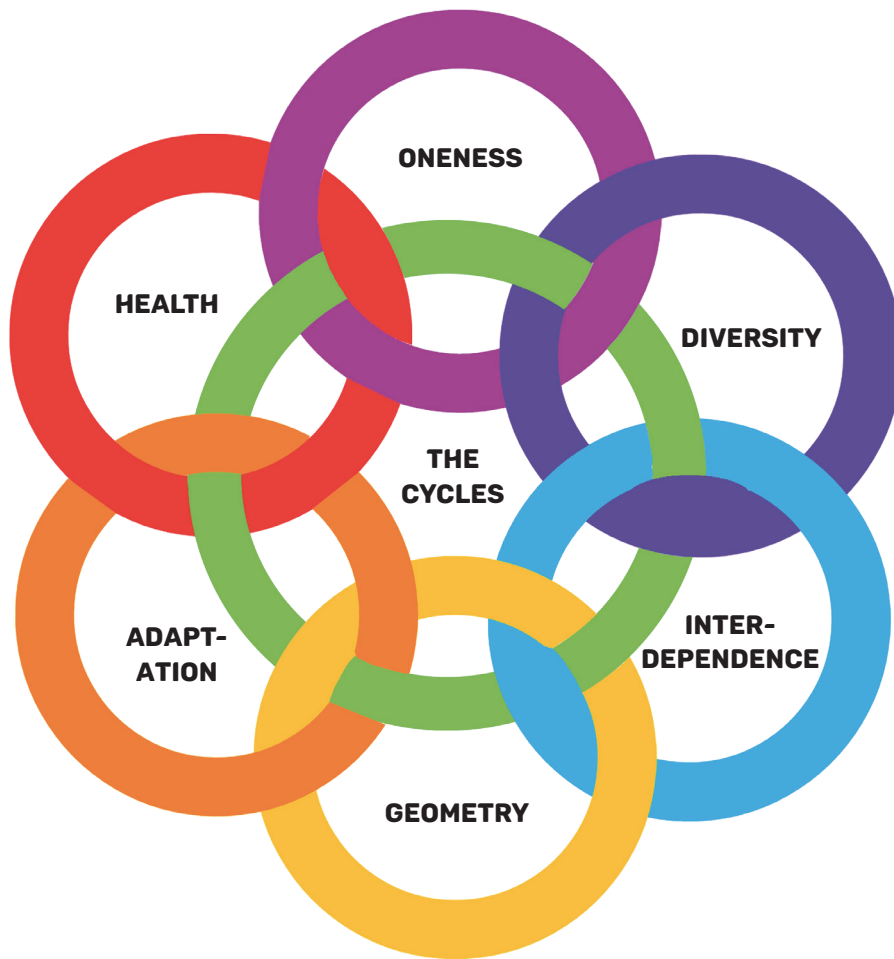
This competency relates to the ability to interact effectively with people from varying backgrounds, environments, and cultures to operate effectively under systems and procedures that vary from one culture to another: and to modify behaviour as culture and environments change through time. Adaptability differs from Flexibility in that it focuses on a person's ability to change behaviour in DIFFERENT cultures and changing environments. Flexibility relates to the ability to change behaviour within the SAME culture or environment.

BEHAVIOURAL INDICATORS

1. Behaves consistently with local norms and values.
2. Adopts means of communication and interaction that suit different cultures.
3. Maintains effectiveness when dealing with people from a variety of backgrounds.
4. Decides courses of action in ways that take account of different environments and cultures.
5. Pursues policies and procedures consistent with local norms and values.
6. Adjusts strategies to changes in the environment.

SELF-DEVELOPMENT ACTIVITIES

1. Before suggesting strategy to others, discuss it with some one with knowledge of the local/global culture in question and explore the implications.
2. When a change is being implemented locally, ask yourself 'What do I need to do now that is different'.
3. Picture what it is you want to do and practice thinking and talking in those terms.

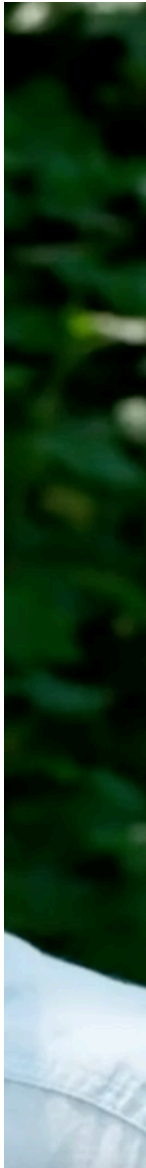


“Life is a repeated cycle of getting lost and then finding yourself again. There are many smaller cycles within that cycle where you get lost to a smaller degree and then remember yourself again. Sometimes you do it to yourself on purpose, consciously or unconsciously. Every time you get lost it is so that you can learn something or experience something from a different perspective.”

Jay Woodman



SIR DAVID. A screenshot from a BBC video. (2020)



“The fundamental attitude we need to have is that the world is not a bowl of fruit from which our desire can just take what we wish.

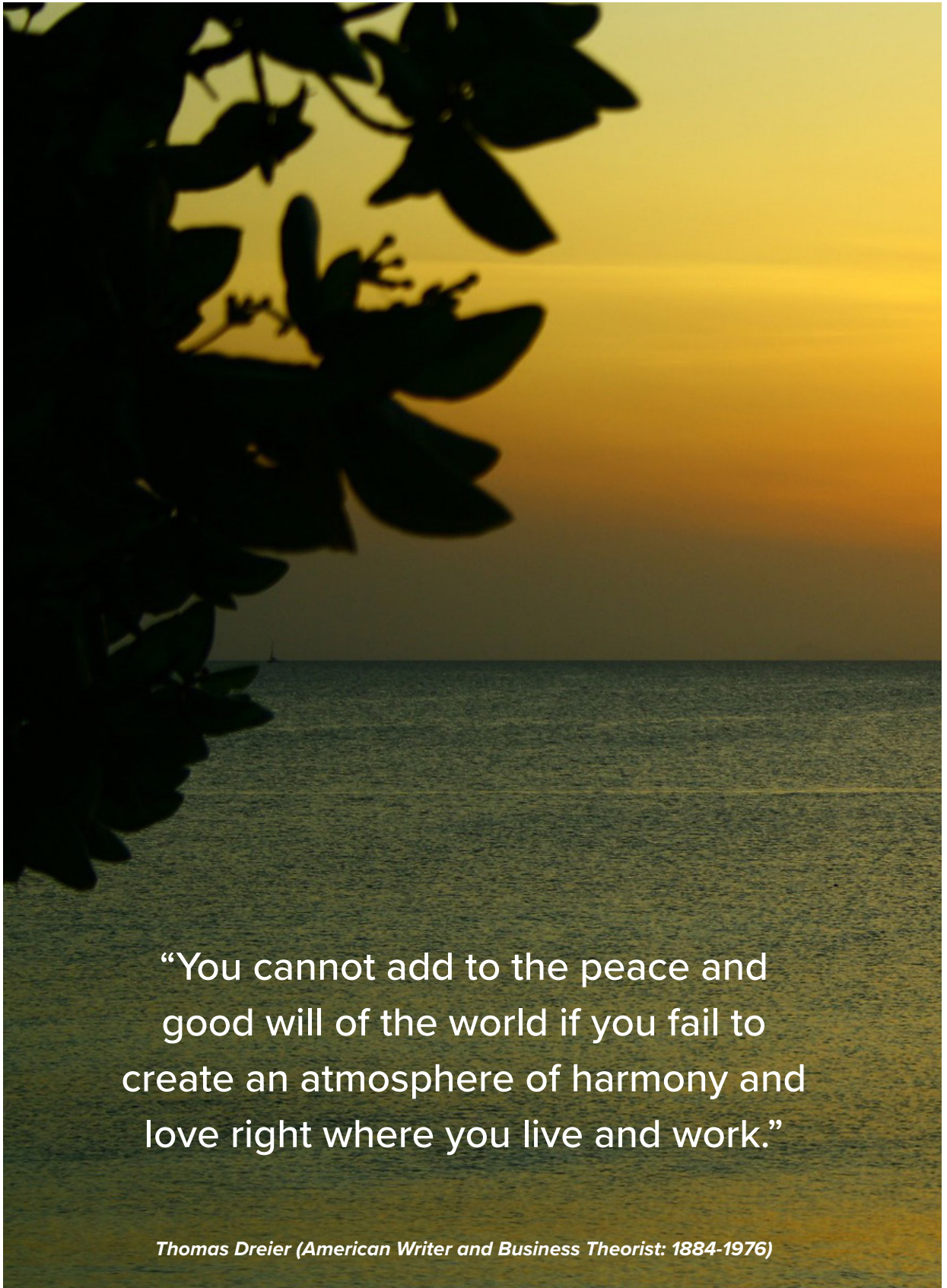
We are part of it and if we destroy it we destroy ourselves.

We must start this by looking at the younger generation who are actually going to save this planet because they will be able to see the consequences of what they do. My lot are dying off.

We are the ones that caused the problem. The message to everyone is this: We must all live in a more modest economic way as an ambition:

1. Don't waste things
2. Think this world is precious
3. Think your time is precious
4. Think the rest of the natural world is precious
5. And all those things need cherishing.”

Sir David Attenborough: Natural Historian, Biologist, Broadcaster and Author



“You cannot add to the peace and good will of the world if you fail to create an atmosphere of harmony and love right where you live and work.”

Thomas Dreier (American Writer and Business Theorist: 1884-1976)



SUNSET IN ZANZIBAR PHOTO FROM PIXABAY. BY VINCIO.

ACTING ON THE MESSAGE

These lessons were first piloted online for a duration of eight weeks to a group of sixty eight Tanzanians (Ambassadors) from all backgrounds and areas. Age ranged from 21 to 60 years.

There are many testimonials about how the eight lessons have changed their perception in a positive way, but most important is the renewed commitment to spreading the harmony message in their communities.

Those ambassadors who are farmers have moved towards organic farming in order to “walk the talk.”

Others are discovering the hidden “treasures” (madini) in the elders in their communities and incorporating this wisdom in their lives, families, workplaces and online.

WHAT NEXT?

It is clear that this model of learning can inspire diverse individuals to form harmony networking groups and act on the urgent message by involving others. Further research on how to spread the harmony message to as many people as possible is ongoing.



“The Decade provides key opportunity for UNESCO to convene its Member States, partners and all stakeholders under its mandate in education, in natural, social and human sciences, and in culture to:
Change people’s mindset for living together in peace on Earth, and Move towards harmony between humans and nature.”



The 68 Tanzanian Harmony Ambassadors who have completed the first course of the eight lessons



WILDFLOWERS - BURFORD, COTSWOLDS, UK - JUNE 2022

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