



Harvard/MGH Trauma Programs:  
COVID-19 Crisis Toolkit for Self-Care

# ANIMAL METAPHORS

**Richard F. Mollica, MD, MAR**

**Emily Hermann, Trevor LaClair, & Fanny Y. Cai**

Design by: Christopher Schmitt

Harvard Medical School / Massachusetts General Hospital ©2021



# TABLE OF CONTENTS

HEALING POWER OF NATURE	3
ANIMAL METAPHORS	
– GREY WOLF	10
– BALD EAGLE	11
– ORB-WEAVER SPIDER	12
– RAVEN	13
– ELEPHANT	14
– CHAMELEON	15
– MOLE	16
– FROG	17
– BEAVER	18
– CHIMPANZEE	19
– SNOWY WHITE OWL	20
CUSTOMIZE YOUR TOOLKIT	
– URBAN ANIMALS	21
SELF-CARE PRACTICES	
– INTRODUCTION	24
– REFLECTIVE WRITING	25
– PRACTICAL APPROACH TO REFLECTIVE WRITING	27
– NATURE JOURNALING	28
– FOREST BATHING: A SUMMARY	30
– HOW TO FOREST BATHE: SENSORY REFLECTION	31
– JOY OF WRITING HAIKU POETRY	32
– A MEDITATION EXERCISE	33
BIO-SKETCHES OF AUTHORS	36
APPRECIATION	38



# HEALING POWER OF NATURE

Our Harvard/MGH Team offers this document as a journey into self-care for healthcare professionals and healthcare workers dealing with the COVID-19 pandemic. It builds upon the self-care protocol, toolkit and pocket card already fully developed and presented on this website ([www.hprtselfcare.org](http://www.hprtselfcare.org)). Our primary goal is to “care for those who care for others”. Tens of thousands of health care workers have been infected; many have died doing their heroic healing work with COVID-19 patients (1); Many have been persons of color. We are also in this document addressing the young persons who have spent tremendous time, energy and passion helping nursing home patients, the homeless, veterans and the many other vulnerable groups suffering from this pandemic. In our recent *Manifesto II: Healing the Healer*, “We sing of our healers and their clients who are the treasure of our world” (2).

Another goal is to help heal the rupture between human beings and our natural world. The current Coronavirus pandemic has arisen out of a terrible breakdown with our natural world. Out of the wildlife markets, a terrible virus has leapt out of bats and pangolins, to become a major scourge of human suffering. The dangerous destruction of our natural world must be addressed by healthcare practitioners. This goal is aligned with the new science of *One Health*. *One Health* asserts that wellness can only occur through the integration

of mind, body and spirit, and the environment (3).

We welcome you on this journey of self-care using the self-healing power of nature. This instrument focuses on animals as a metaphor for self-care and self-healing. We welcome you, your family and loved ones the opportunity to join us in this joyous experience of connecting with each other, the natural world and being united with those marvelous creatures and plants that share with us this beautiful planet earth.

## 1. A MOSAIC OF METAPHORS

A mosaic of animal metaphors (4) is used to offer a self-care approach to self-healing. Cognitive scientists, such as Lakoff and Johnson, believe that conscious thought is the tip of an enormous iceberg of unconscious thought that is manifested in everyday life through conceptual metaphors (5). As Lakoff and Johnson state, metaphors are directly delivered from the neural structures of the brain:

*“Metaphors provide subjective experiences with extremely rich inferential structure, imagery and qualitative ‘feel’ when the networks for subjective experience and the sensorimotor networks are neurally connected to them are coactivated.” (p. 59)*

## HEALING POWER OF NATURE

The extensive use of metaphors is the main manner in which we communicate with each other and understand the world in everyday life. A metaphor is defined by Oxford dictionary as:

*A word or phrase used to describe somebody/something else, in a way that is different from its normal use, in order to show that the two things have the same qualities and to make the description more powerful.*

Our Harvard/MGH team composed of a medical doctor/psychiatrist, a naturalist, and numerous contributing students, artists, birders, and neuroscientists have created these metaphors and presented the nature-based practices offered. The focus is always on making the metaphors and practices not only accessible to hospital specialists and mainstream healthcare workers, but also to young persons from all ethnic backgrounds working in urban and rural communities.

The Wolf Metaphor illustrates our method. Let us break this metaphor down into its components using the Lakoff and Johnson Model (p. 61-62). See below:

### **THE WOLF METAPHOR:**

#### **TAKE CARE OF YOUR FAMILY, FRIENDS AND LOVED ONES FIRST...**

##### THE WOLF AS THE IDEAL FAMILY METAPHOR

**Wolf** > Apex predator in the world

**Wolf Pack** > Family

**Natural Instincts** > Provide all pack members safety, protection, food, shelter, care for the youth, elderly, sick and disabled

**Outcomes in the Wild** > Survival, health, wellness, flourishing

**Moral** > Taking care of the family is a top priority



As can be seen, the wolf is a wonderful metaphor for the ideal family. Similarly, each of the other 10 metaphors have been specially chosen to represent each of our major self-care principles. The metaphors are biologically described with a brief embedded video that illustrates every animal in their wild state.



## HEALING POWER OF NATURE

### 2. FUNDAMENTAL PRINCIPLES

The following cultural and scientific principles here informed this work:

#### a. Symbolic Power of Nature and Animals

Since the beginning of recorded history, nature including animal symbols have been used to represent and record humanity's relationship to the natural world. The cave paintings of France and Spain are over 30,000 years old and may be an expression of early man's belief in the magical and spiritual power of animals. Recently in Asia, the oldest sculpture was found. It was an approximately 14,000 year old sculpture of a little bird.



A wonderful painting of animals from the Italian Renaissance is the strange and mysterious depiction of animals and nature in Piero Di Cosimo's painting "The Incendio Nella Foresta" (The Forest Fire).



This painting (1505) is one of the renaissance's earliest landscapes. In the painting can be seen real as well as fantastic animals. It was inspired by Book 5 of Lucretius' *On the Nature of Things*.

The rhythmic, graphic, and rich beauty of Rousseau's nature paintings displayed in his painting of the mandrill in the jungle, is emblematic of his love of natural beauty. The mandrill's magnificent and beautiful face is striking.



## HEALING POWER OF NATURE

© Bill Traylor

The modern and contemporary artists such as Bill Traylor who lived through slavery into the 1960s (6) and Elli Crocker (7) capture the humility as well as the heroic power of wild animals, respectively.

Of course, these small number of artistic illustrations only give a brief glimpse into the thousands of years of humanity's relationship with animals and the natural world. Everyone can reflect on the artistic crafts; jewelry, textile and clothing of nature and animals images and scenes that fill our everyday lives and bring us joy.



they overlap with fables from the Buddhist Jataka (9) and the ancient Hindu Panchatantra (10) stories. Aesop was believed to have been a liberated

slave and a storyteller living in ancient Greece between 620 and 564 BC. Everyone knows the great fable of The Tortoise and the Hare. How often do we say "slow but steady wins the race" and "never give up!" Aesop's Fables have entered modern life in our beloved stories such as Charlotte's Web (by E.B. White), Winnie-



© Elli Crocker

### b. Fables

No discussion of animal metaphors can be complete without a mention of fables. A fable is a complex metaphor that is a short story, usually with talking animals as the main characters, that conveys a moral message. Plants, rivers, mountains can also deliver the story-line. Certainly, Aesop's Fables (8) are best known in America, although

they overlap with fables from the Buddhist Jataka (9) and the ancient Hindu Panchatantra (10) stories. Aesop was believed to have been a liberated slave and a storyteller living in ancient Greece between 620 and 564 BC. Everyone knows the great fable of The Tortoise and the Hare. How often do we say "slow but steady wins the race" and "never give up!" Aesop's Fables have entered modern life in our beloved stories such as Charlotte's Web (by E.B. White), Winnie-

### c. Healing Power of Nature

In recent years, an extraordinary number of scientific studies have revealed the healing power of nature (11 - 12). These studies have focused on the impact of being in the natural world on stress-reduction and the relief of physical



## HEALING POWER OF NATURE

and mental suffering, wellness, and the promotion of spiritual rejuvenation and flourishing (13). The therapeutic value of animals as home-companions has been studied extensively (14). As well as the therapeutic value of spending time with wildlife (15). Natural healing environments that include plants, gardens, water features and nature scenes are increasingly being built into hospitals and clinics (16). The importance of green spaces including parks and trees for urban communities of color is becoming a priority of local environmental planning (17). It is now considered essential that all city dwellers, especially children, have easy access to the natural world (18).

### d. Empathy

The eco-feminists have strongly promoted the role of empathy in valuing and understanding the natural world, including all of its living creatures, i.e. the plants and animals (19). All human beings are biologically wired to be empathic with all other human beings and the natural world. Italian neuroscientists led by G. Rizzolatti discovered in the frontal and premotor cortex unique neurons called mirror neurons, in monkeys that allowed them to make sense of an action in another monkey firing in the same part of the brain without having experienced that action. The mirror neurons “mirror” the behavior and emotional experience of the other without having been through the experience itself. It is believed that these tens of thousands of neurons provide the basis of empathy since the organism already has pre-coded in its mind at birth the experience of others (20).

Mirror neurons have been found in human beings and other primates.

Birds, for example, have been found to be “emphatic” and to express a wide range of emotions (21). This [video on elephants](#) by the Wildlife Conservation Society (WCS) reveals the deep empathy expressed by these magnificent animals.

Miraculously we are biologically hard-wired to share our love, affection and deep appreciation for all living creatures in a reciprocal relationship. Mirror neuron research also gives us the opportunity to discover the deep ancestral knowledge in our minds (brains) that allows us to show empathy, respect and care. Decades ago, Carl Jung, the great Swiss psychoanalyst described this inherited, ancestral knowledge as the “collective unconsciousness”.

The eco-feminists have furthermore used the direct experiences of empathy with animals to establish the basic principle that all animals are sentient creatures. Sentient is defined by Merriam-Webster as responsive to or conscious of sense impressions sentient beings, aware, and finely sensitive in perception or feeling. They have thrown out thousands of years of intense philosophical arguing in Western philosophy about this issue, arriving at their basic position from the direct empathic connection with nature and the animal world (22). Recently, the British government arrived at the revolutionary and historic conclusion that all animals are sentient creatures and need to have their rights protected by law and the power of the state (23). With the passage of this law, and the U.K. action plan for animal welfare, the world is on the verge of a radical shift in its relationship to animals.



## HEALING POWER OF NATURE

### Welcome

Our Harvard/MGH team welcomes you to read, reflect, use and enjoy these metaphors and self-care practices. It is impossible in a brief document to present the thousands of years of human symbolic relationships with nature, including plants and animals. Similarly it is impossible to present a comprehensive biological and natural history review. The special and unique relationships of indigenous peoples to the natural world is noted and also deeply appreciated (24-25). We welcome, for example, our indigenous colleagues in Australia, Haiti and America to contribute their self-care insights based upon their own cultural and spiritual beliefs. Similarly, the recent contributions of Pope Francis, in his Encyclical Letter on our care for our common home 'LAUDATO SI', calls for all of us to become ecological citizens by protecting the earth and all of its living creatures. This is in line with the revolutionary teachings of Saint Francis of Assisi in the 13th century who spoke directly to animals and wanted all creatures on earth to be treated as equals. In spite of these limitations, the Harvard/MGH team believes strongly in the scientific basis of the healing power of nature and our biologically wired capacity to live in harmony with all living creatures and our natural world.

### References

1. Mollica R.F., Charles L.L. "Honor and Grief: The American Family is Essential to our Recovery from Covid-19". Southern California Psychiatrist. 2021. 69 (10); 8-9.
2. Mollica R.F., Agosin M. A Manifesto: Healing a Violent World. Kent, England: Solis Press; 2018.
3. Zinsstag J., Schelling E., Waltner-Toews, D, and Tanner, M. "From "one Medicine" to "one Health" and Systemic Approaches to Health and Well-being." Preventive Veterinary Medicine. 2011;101:148-156.
4. Hart, K.B., Long J.H. "Animal Metaphors and Metaphorizing Animals: An Integrated Literary, Cognitive, and Evolutionary Analysis of Making and Partaking of Stories." Evolution Education & Outreach. 2011; 4: 52-63.
5. Lakoff G., Johnson M. Philosophy in the Flesh: The Embodied Mind and Its Challenge to Western Thought. New York, NY: Basic Books, 1999.
6. Maresca F., Ricco R. Bill Traylor: His Art, His Life. 1st ed. New York: Knopf : Distributed by Random House, 1991.
7. Rooney E.A. The Contemporary Art of Nature: Mammals. Atglen, PA. Schiffer Publishing, Ltd, 2014.
8. Aesop's Fables Tr, VS Vernonn Jones Collector's Library CRW Publishing limited, London England. 2006.
9. N. Inayat. Twenty Jataka Tales. Pilgrims Publishing, New Delhi, India, 2003.
10. 101 Panchatantra Stories. Om Books International, Uttar Pradesh, India, 2012.
11. G.N. Bratman, C.B. Anderson, M.G. Berman, B. Cochran, S. de Vries, J. Flanders, C. Folke, H. Frumkin, J.J. Gross, T. Hartig, P. H. Kahn Jr., M. Kuo, J. J. Lawler, P.S. Levin, T. Lindahl, A. Meyer - Lindenberg, R. Mitchell, Z. Ouyang, J. Roe, L. Scarlett, J.R. Smith, M. van den Bosch, B.W. Wheeler, M. P. White, H. Zheng, G. C. Daily, Nature and mental health: An ecosystem service perspective. Sciences Advances 5, eaax0903 (2019).
12. Grinde B., Patil G.G. "Biophilia: Does Visual Contact with Nature Impact on Health and Well-being?" International Journal of Environmental Research and Public Health. 2009; 6(9): 2332-2343.
13. Berto, R. "The Role of Nature in Coping with Psycho-physiological Stress: A Literature Review on Restorativeness." Behavioral Sciences. 2014;4:394-409.

## HEALING POWER OF NATURE

14. Brooks et al. The power of support from companion animals for people living with mental health problems: a systematic review and narrative synthesis of the evidence, *BMC Psychiatry*, 2018 Feb 5;18(1):31.
15. Wiens V, Kyngas H, Polkki T, The meaning of seasonal changes, nature and animals for adolescent girls' wellbeing in northern Finland: A qualitative descriptive study, *International Journal of Qualitative Studies on Health and Well-being*, 2016; 11(1).
16. Huisman E.R.C.M, Morales E., Van Hoof J., and Kort H.S.M. "Healing Environment: A Review of the Impact of Physical Environmental Factors on Users." *Building and Environment*. 2012; 58: 70-80.
17. Mitchell R.J., Richardson E.A., Shortt N.K., Pearce J.R., Neighborhood environments and socioeconomic inequities in mental well-being. *Am. J. Prev. Med.* 49, 80-84 (2015).
18. Maller C., Townsend M., Pryor A., Brown P., St Leger L. "Healthy Nature Healthy People: 'contact with Nature' as an Upstream Health Promotion Intervention for Populations." *Health Promotion International*. 2005; 2(1): 45-54.
19. Anderson E. "Animal Rights and the Value of Non-Human Life." In *Animal Rights: Current Debates and New Directions*. Sunstein CR, Nussbaum MC (Eds) Oxford: Oxford University Press. 2005; Chapter 13.
20. Corradini A., Antonietti A. "Mirror Neurons and Their Function in Cognitively Understood Empathy." *Consciousness and Cognition*. 2013; 22: 1152-1161.
21. Panksepp J., Panksepp J.B. "Toward a Cross-species Understanding of Empathy." *Trends in Neurosciences*. 2013; 36(8): 489-96.
22. Gruen L. *Entangled Empathy : An Alternative Ethic for Our Relationships with Animals*. Brooklyn, NY: Lantern Books; 2015.
23. Harvey F. Animals to be recognized as sentient beings in U.K. law. *The Guardian*. May 12, 2021.
24. Kutz S., Tomaselli M. "'Two-eyed Seeing' Supports Wildlife Health." *Science* (2019); 364: 135-137.
25. McGinnis A., Kincaid A.T., Barrett M.J., Ham C. "Strengthening Animal-Human Relationships as a Doorway to Indigenous Holistic Wellness." *Ecopsychology*; (2019): 162-173.



Watch: [Wolf Pack](#) ▶

# GRAY WOLF

1

## **Take care of your family, friends, and loved ones first!**


A wolf pack is a family unit. In every pack there is a dominant male and a dominant female. These two individuals are often referred to as the alphas. However, they're more than just the leaders. They are the parents and the rest of the pack members are usually their offspring. Occasionally, the pack will adopt lone wolves who become part of their family. By working together, they can survive dangers presented by the wilderness. As a family unit they will hunt for food, travel across vast landscapes, compete against invading packs, and care for new pups.

If an alpha is killed, then its mate must leave the pack to find a new mate. As a result, this can destroy an entire pack if one of their offspring doesn't step forward into the leadership position. For a pack of wolves, family is all about survival, whether they're all related or not. It is important to learn from the wolf and take time to be with your family. Like a pack of wolves, caring for and interacting with your loved ones can help you push through difficult times.

**Remember you are not alone:  
Stay connected.**





Watch: **Bald Eagles** 

# BALD EAGLE

2

## Know your personal and organizational ideals.

Birds are capable of creating intricate pieces of artwork which are known to us as nests. Bald eagles make some of the largest nests in the world, woven together by sticks, grasses, and other useful materials. This project can take up to three months to construct. If the nest proves to be a success in rearing young, then the pair will return to it each year to continue building upon it and raising eaglets. The largest known bald eagle nest was found in St. Petersburg, Florida. It was approximately nine feet in diameter, twenty feet deep, and weighed as much as three tons. It was large enough to fit a Volkswagen inside.

Bald eagles were not always successful in raising young. Historically, the bald eagle was an endangered species.

As a result of the pesticide DDT, the eagles' eggs had soft shells that cracked when the parents tried to brood them. With the help of captive breeding programs and the ban of DDT, the eagle nests became successful and the population grew. The bald eagle became a conservation success story and they were removed from the endangered species list in 2007. By being organized like an eagle, you can continue to build upon your ideas year after year as you continue to help those in need. If you don't put in the time and effort or take your job seriously, then the nest will fail and new chicks won't fledge. In addition, your partnership with others can determine the success of a project, like a pair of eagles building a nest.

**See the beauty around you; and be prepared to protect it and to make a difference, no matter how great the obstacles.**



Watch: [Orb-Weaver Spider](#) ▶

# ORB-WEAVER SPIDER

3

## **Achieve clinical and cultural excellence.**

Spiders are fascinating animals and proactive predators. Each species has a unique way of capturing prey. Some lay still and wait to ambush their target. Others may rely on trap doors to catch an unsuspecting invertebrate. There's even a spider capable of spitting liquid silk to capture insects. Each spider builds upon its strengths to be a successful hunter.

A commonly known group of spiders are the orb-weavers. These are the

arachnids capable of building delicate, wheel-shaped webs. They first create the frame by connecting strands to surrounding objects which serve as anchor points. Once the frame is built, they weave the sticky spiral that is used to trap flying insects upon impact. Each day or night, these spiders continue to thrive by utilizing their strength to build webs which are integral to their survival. Like a spider, you must use your own strengths to achieve excellence.

**Keep up the good work.**

**Build upon one's strengths while minimizing one's weaknesses.**





Watch: Ravens 

# RAVEN

4

## Engage in peer supervision and consultation.

Ravens, like other species of corvids, are intelligent birds. They have the ability to mimic sounds, recognize faces, and interact with other animals such as wolves. Perhaps most importantly, they also have the capability of problem solving. They are able to overcome obstacles or complete puzzles through trial and error in order to get food. Ravens study their environment to find ways to maximize their survival.

Ravens will also work together to increase their chances of success. If their teammate is an effective partner and shares the reward, they will continue to work together. However, if their partner tries to deceive them and steals all the rewards, then the bird that was cheated will find a new partner. Like a raven, it's important for you to successfully work with others as a team and build rapport with each other and the patients. This way everyone will be able to reap in the rewards.

**Be a team: "Lavoro di squadra"**





# ELEPHANT

5

## Monitor and regulate empathy.

When you think about emotions in the animal kingdom, elephants are often the first species that comes to mind. Because they are a social animal living in a matriarchal society, elephants often show levels of empathy toward each other making them one of the most empathic species in the world. They remain aware of the calves' emotional state, protect each other from danger, and mourn the death of others.

Unlike many other animals, elephants are one of the few species that are

capable of recognizing themselves in mirrors. Researchers discovered that after they placed marks on the animals, the elephants will use the mirror to inspect themselves and the mark. Like elephants, we show levels of empathy for the patients in our care. However, this job can be exhausting and overwhelming. That's also why it's important to be like an elephant and use the mirror to check in with yourself. Having empathy for yourself is as important as having empathy for others.

**Pay attention to your level of emotional empathy. Ask for help when the emotional overload reaches a breaking point.**





Watch: [Chameleons](#) ▶

# CHAMELEON

6

## Practice personal reflection: spiritual and artistic.

What's the first thing that comes to mind when you think of chameleons? Probably your answer was the ability to change color. Even though they can't become completely invisible, chameleons still have subtle color changes that help them camouflage. These lizards come in all kinds of shapes and colors based on where they live. As they maneuver around their environment, they can change the shade of their pigment to help them remain hidden from predators. Changing color also serves as a method of communication with other chameleons. During breeding season, males of some species will change their skin color to red, orange, or purple to help show off and attract females. These colors also serve as a warning to intimidate intruding

males in an attempt to prevent a fight.

Considering chameleons are ectothermic, or cold-blooded, they rely on their environment to help them remain warm and active. These lizards will bask in the sun to warm up. In order to speed up the process, they'll often change to darker colors to help absorb the sun's heat faster. While in a stressful environment, it is important to act like a chameleon and slow down. Take breaks to blend into your environment and reflect on the things that are important to you. Like a chameleon basking in the sun, find your warm, happy spot so you can have a moment of relaxation while harnessing positive energy to keep you motivated.

**Daily reflection provides a moral compass for harnessing all the positive energy that exists in the world.**



Photo: Galen Rathbun

Watch: [Moles](#) ▶

# MOLE

7

## Utilize deep breathing, mindfulness, and meditation.

Considering moles are a fossorial animal, a species that lives primarily underground, their eyes have little to no use. A mole is basically blind. In some species, their eyes are so small, it's difficult for biologists to locate them among the animal's fur. Many kinds of moles have weak hearing since the soil around their burrows muffle sounds. So, how does a mole successfully hunt underground? Most species have a sensitive nose that helps them feel vibrations and maneuver around obstacles. The common mole is able to use smell to locate prey, while the golden

mole is capable of feeling vibrations by sticking its head in the sand.

Unlike the mole, humans rely heavily on sight to navigate their environment. However, it's important to find comfort in your own personal burrow so you can sit back, relax, and close your eyes. Focus on your other senses. Take deep breaths to be present in the moment. As kids, we often view darkness as a scary thing, but darkness can bring comfort. Be like a mole. Close your eyes and have a moment of peace in the dark.

**Living in the moment, one can find joy in life.**

**Learn to bring one's full attention to our thoughts and surroundings.**





Watch: [Frogs](#) ▶

# FROG

8

## **Conduct daily, personal self-care activities: caring for body and mind.**

A frog is great at changing its form as it goes from egg to tadpole to adult frog; truly a miracle of nature. The frog may be best known for its singing by lakes and ponds, especially around the springtime. Around the world, many songs of frogs have disappeared. It is an amphibian crisis. Frogs, like many other amphibians, have permeable skin that makes them sensitive to their environment. Due to changes such as pollution, habitat destruction, and climate change; different frog species are becoming extinct in many ecosystems around the world.

Frogs are considered an indicator species. These organisms are often the first to decline in population, if there is a factor negatively affecting the ecosystem. They're like a canary in a coal mine. Like the frog, you need to pay attention to the first signs of stress. Your mind and your body is like a frog in a pond. If the pond is polluted, the frog will die. If you don't take care of yourself (and the pond), then you will become polluted with negativity.

**Look after yourself.**

**Practice active daily self-care.**





# BEAVER

9

## Create beautiful, natural healing environments.

Beavers are known as ecosystem engineers. This is a title given to animals who completely alter their environment. By building dams, beavers can slow the flow of water creating a deep pool that floods the landscape. Due to their handiwork, beautiful ponds and marshes are born which then provide homes and food for other animals.

These large, aquatic rodents are also known as a keystone species, an

organism that benefits other organisms. If a keystone species is removed from the environment, then habitats can be completely changed or destroyed, forcing many other species to leave. Like a family of beavers, we need to work together to restore damaged environments so plants and animals can return to the ecosystem. Participating in conservation not only helps organisms, but can also benefit our well-being.

**Use the tremendous healing power of nature.**

**Promise to be a good steward of our natural world.**





Watch: [Chimpanzees](#) ▶

# CHIMPANZEE

10

## Evaluate self-care goals.

Primates have several ways to communicate with each other and bond within a group. One of these ways is through a behavior known as social grooming. Chimpanzees rely on this behavior to remain healthy and bond with other members in their community. Social grooming allows one chimp to remove unwanted debris from another. This behavior is often reciprocal as the apes take turns grooming each other.

Grooming also helps the chimps relax. Imagine how it makes you feel when you get a haircut, or when you have your back rubbed. How about taking a warm shower and feeling refreshed before laying in bed at night? Like a family of chimps bonding through social grooming, taking care of your-self and being aware of the well-being of your team can help reduce the stress in the workplace while maintaining personal health.

**Pay attention to the quality of your team, the precision of your materials and skills, and the strength and impact of your project.**



Watch: [Snowy White Owls](#)

# SNOWY OWL

11

## **Restore human dignity through kindness and compassion.**

Snowy owls are a northern species capable of living in the Arctic. They have thick feathers that help keep them warm during winter storms. Because of the extra insulation, snowy owls are the heaviest owl in North America. When you think of owls, you often think of a silent, nocturnal hunter. However, snowy owls are diurnal. This allows them to actively hunt during the continuous daylight hours of the Arctic summers. Like other owls, they have a flat facial disk that helps them pinpoint prey scurrying around in the deep snow; and small bristles on their wings creating silent flight. All of these are adaptations which help the owl survive

the blizzards of the Arctic.

Due to the owl's ability to survive such an extreme environment, they can be a symbol of perseverance during a stressful situation. Wildlife around the world have adapted to survive harsh conditions. During these unprecedented times, it's important to look toward nature for motivation to bring forth a sense of dignity, compassion, and kindness toward each other and the world around us. Each species has a message they can teach us. Discover one that relates to you and use it to help you find hope within yourself.

**Through your contemplation of the laws of nature and their spiritual meaning, you will emanate to others in your person a great sense of dignity, compassion, and kindness.**



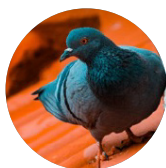
# CUSTOMIZE YOUR TOOLKIT

## Urban Animals

As humans face unprecedented times where being physically social and connected with each other is increasingly more difficult, there's a risk that we may also experience a decreased connection to nature due to your personal habitat being in the city or typically viewed as separate from nature. No matter where you live, whether in the country, suburbs, city, an ecosystem always exists that is filled with different animals and insects that connect to the human experience. In most cities, people will not encounter animals like owls, caribou, and wolves. However, there are many animals that have adapted to life in an urban setting and can be associated with the different aspects of our human existence and experience.

### PIGEON

The pigeon has beautifully adapted to many aspects of city life and is one of the most common birds you will see any many urban areas around the world. While they seem like pests, pigeons are an important seed spreading animal. Like birds, they successfully help many plants procreate throughout the city. Just like every other animal, they play a very important role in the urban environment, no matter how small or insignificant their behaviors may seem. While commonly thought of as dirty animals, the pigeon is able to clean up the mess of other city animals, including humans, and plays a significant role in the ecosystem when they spread seeds, which in turn creates food for other urban-dwelling creatures. The pigeon not only survives but also contributes, collectively, with other pigeons in a flock. They work together as a community to spread seeds and alert each other when good things, like food, are available.



### DRAGONFLY

Dragonflies are known for their good luck and speed while in flight. These beautiful big-eyed insects have been around for about 300 million years! They can be resilient to their surroundings and enjoy the beauty of their environment. Like many insects, they can survive and thrive in most environments whether it be the city or countryside. Over the course of their evolution, they have readjusted their survival skills many times, which have allowed them to survive and adapt to what they are today. This type of resilience is key, especially in a time where we as a community must keep changing, learning, and adapting to not only survive but also thrive.



## RACCOON

Often thought of as a mischievous creature that does nothing but eats trash and makes messes, the raccoon is family-oriented animals that make very useful contributions to cities. For example, during the mating season, raccoons will



break off into two groups, one male and the other female. Collectively, the males will protect the females during this period until their kits are born.

This family-oriented aspect of the raccoon can be observed in humans as well. While in most cases we do not need to fend off other humans to protect our young, there is a broader community that helps to raise a human child. This human community may include family and friends or school programs, and other people in the community involved in the upbringing and safety of our children.

## BEE

One of the most important insects to our ecosystem are among some of the smallest. Though the bee isn't the biggest, they are able to do amazing feats like pollinating our urban plant life, creating beautiful beehives, making honey, and working together as a colony. This community insect is driven to exist and work for the good of the whole and is a brave little creature that will stand against bigger animals or insects when there is a threat. This trait in the little bee can be seen in our own lives as we strive to protect those in our own relationship bubbles.



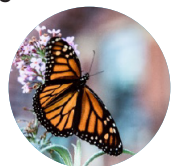
## COTTONTAIL RABBIT

The cottontail rabbit is a common furry friend that can be seen across cities and suburbs. The cottontail rabbit is a prey animal, who's skittish and careful demeanor leads to their survivor mentality. As they have litters, there are predators that come to snatch the young, however, while many may not survive there are many that do. This survival instinct is in all of us. Adversity makes its way into our lives and tests this survival part of us, where there is the need to protect ourselves and our friends and family.



## BUTTERFLY

Butterflies, come in different sizes, colors, and patterns, yet one thing they have in common is that they are all stunning to look at. As they flutter through the city, they can bring color to an otherwise dull pavement and are attracted to beautiful park flowers and planters of flowers on stoops of houses and apartments. This small and gentle insect is a key sign of biodiversity, so it is always a joy to see them flying about the city. Their individual beauty and softness can be seen in every single human being. The individuality in butterflies comes from a magical process that happens in the chrysalis that transforms the caterpillar to the adult butterfly. This process is mirrored in the human being as we are born and transform over time, developing and correcting, until we reach our truest form of individuality.





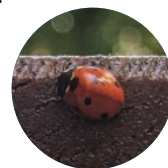
## SEAGULL



Found in cities close to the oceans and coastal towns, seagulls are always found in a colony, or group. They are known for their carefree attitude that allows them to go where the wind, and food, takes them. They have a loud squawk that allows them to communicate with each other, and make sure that they are heard no matter how large the group is. Sometimes as humans, being heard in a crowded or unfamiliar situation can be hard. Finding your individual voice amongst a crowd, like the seagull, is achievable, though must be worked towards.

## LADYBUG

Another lucky creature, who is known as one that lives limitlessly and untroubled. The ladybug is brightly colored and can spark a joy when observed. Being a solitary, mostly, ladybugs a great reminder of the beauty that can come with being on your own and being self-reflective. Channel this little friend as you walk down the street, and notice the beauty around you, even in cities, there are many beautiful sights just waiting to be taken in. Ladybugs are found everywhere, and in each setting whether it be the city or the countryside, they bring beauty and tranquility.



**Sometimes, it is hard to relate to an animal or insect that you've never seen before or it isn't present in your environment. However, you can use this approach to customize your toolkit and alter it to match your personal experiences and needs. Take a walk outside and see all the amazing living creatures that live around you. Every animal or insect can be valued in your life.**

# SELF-CARE PRACTICES YOU CAN USE EVERYDAY

Welcome to an exciting section of this self-care protocol. You will be engaging in learning activities presented by our fellow naturalists, artists, and neuroscientists that not only engage you in nature, but also can help you reduce your stress and daily work tension. So many healthcare practitioners are working extraordinary hours caring for very ill, and not so ill, persons with COVID-19. Work hours are long and exhausting. Others, some of them young, are also working hard in resource-poor environments, often with limited resources and supervision. They are caring for the most vulnerable people—the homeless, elderly, veterans, and the poor. The following nature-based activities will not only reduce stress and help offset institutional burnout but can also bring joy into the life of our courageous health care staff and our young activists. Joy, beauty, and a healing, nurturing environment are all elements of much-needed care as we care for those who are caring for others.

These nature-based self-care practices are supported by a solid body of research in the neurosciences. Each of our presenters offers additional scientific references for review.

For those who are very busy and have little time for self-care, I can suggest one practice that takes 5 minutes a day and is inexpensive but effective, called “Nature Self-Care Reflection Cards.” The basic idea is that you choose an animal or a nature scene that is moving and meaningful to you. You can use animal images, for example, from this Animal Metaphor site. You can print out this image in the size of a playing card and then have it laminated inexpensively at a local office supply store. You now have a beautiful, laminated nature image “pocket card” that can be carried safely anywhere in your pocket, purse, or bag.

Now here is the self-care approach. Whenever you feel you are experiencing a build-up of stress or heavy emotion, you can mentally step back from the situation; take out your pocket card; and

breathe slowly and deeply while turning your full attention to the image on the card. This reflection requires as few as 5 minutes to begin to calm down strong emotions and help you settle down, deescalating the intensity of feeling in your mind and body. After this brief period of reflection, you can get back to the heavy emotional demands facing you with greater energy, calm, and confidence. Over time you may find that you wish to make additional cards with different animal and nature scenes.

My pocket card is the hawk.





## SELF-CARE PRACTICES YOU CAN USE EVERYDAY

I have a great love for this bird, which I am privileged to see often in my neighborhood. Many times, when I have been in a serious state of distress with work or medical issues, the hawk image and all it represents seems to come to my rescue. Looking at this image, one can immediately feel a great joy: the image is uplifting, inspiring, and full of positive energy. Is this not the self-healing “medication” we need when we are bogged down with stress and empathically suffer the pain of others? Please take the time to reflect upon and choose those animal and nature images that have greatest meaning for you. There are plenty of tools and instructions on the Internet for making pocket cards that

feature animal and nature images, often called flash cards.

A quote from the American naturalist and philosopher, Henry David Thoreau:

*As a single footstep will not make a path on the earth, so a single thought will not make a pathway in the mind. To make a deep physical path, we walk again and again. To make a deep mental path, we must think over and over the kind of thoughts we wish to dominate our lives.*

Walden Pond

Enjoy the journey up ahead!  
Richard F. Mollica

# REFLECTIVE WRITING

By Eugene F. Augusterfer

Reflection on one's life is an important component of well-being, understanding, and wisdom. Confucius was to have said that “Reflection is the most royal road to wisdom”. Reflection can take many forms, including solitary thought, meditation and prayer (need not be religious), or interaction with a trusted friend or colleague. A useful tool for reflection is reflective writing. Writing, especially reflective writing, allows one to focus one's thoughts, feelings, and sensations in written form.

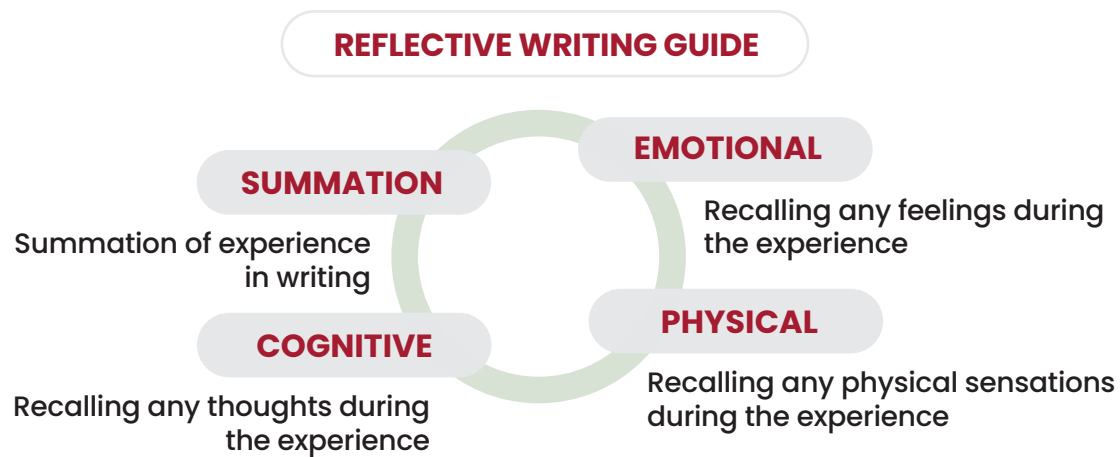
Two important scholars have helped document the importance of reflective writing, James Pennebaker and Richard Mollica. Pennebaker has spent most of his career studying the impact of reflective writing. He says that “it is not just venting one's feelings”, but rather,

“to tap writing's healing power, one must use it to reflect, better understand and learn from one's emotions” (1). Richard Mollica, who brought us “The Trauma Story” says the Trauma Story is a joint effort between the therapist and the patient which allows the patient to reflect on his/her story in the presence of an empathetic listener over a period of time (2). The act of thinking about an experience and expressing emotions in writing seems to be important by helping the writer organize thoughts and give meaning to a memory or a traumatic experience. Writing may also enable the writer to better regulate their emotions. It is also possible that writing about a traumatic event fosters an intellectual process through the act of constructing a story which aids emotional regulation (2).

## REFLECTIVE WRITING

Finally, when people write about a traumatic event or difficult situation, they are more likely to talk with others about it – suggesting that writing leads indirectly to reaching out for social support that can aid healing. Here are some practice tips to help with reflective writing (3).

- Write about an event, or events, that you have been thinking about, positive or troublesome...
- Write something that you feel is affecting your life in a positive or unhealthy way...
- Write about a special memory from the recent past or distant memory...
- If you have been avoiding something or someone, write about it as a way of developing a better understanding of the issue...
- Write something that you are dreaming about...



If you decide to try reflective writing, do not try to write the next great novel, rather, just jot down your thoughts and feelings. As you continue this process you will most likely delve deeper into your inner thoughts and feelings. Remember, this is for you and you alone (unless you chose to share it with someone). If you are planning to use this method with a patient/client, we suggest you use it yourself first and become comfortable with the method.

At a personal level, I have used this many times with patients/clients and I have found it very useful, especially when the process seems stuck. Ask the patient to use reflective writing as a tool, then bring their notes to the session to use as a springboard for discussion. Again, this can be very useful and therapeutic.

Lastly, this method can, and does, enhance the therapeutic process of L.U.D.A. (3)

- Listening
- Understanding
- (with) Deep
- Appreciation

### References

1. Mollica, R.F., *Healing Invisible Wounds: Paths to Hope and Recovery in a Violent World*, Harcourt, 2006.
2. Paparo, Franco, Unpublished manuscript, 2014.
3. Pennebaker, J.W., & Chung, C.K. (2007). Expressive writing, emotional upheavals, and health. In H. Friedman and R. Silver (Eds.), *Handbook of health psychology* (pp. 263–284). New York: Oxford University Press.



# PRACTICAL APPROACH TO REFLECTIVE WRITING

By Matt Daly

- 1 Start with a brief meditation or take a few deep breaths before you begin (at home find a quiet place where you will not be disturbed). Reflect on your sensory experience. (Awareness of senses helps keep one grounded).
  - 2 Prepare yourself with a conversation with your emotions and your spirit.
  - 3 There is no magic – just pick up the pen or pencil and put it on the page.
  - 4 Privacy is key, if you are going to write without censor.
  - 5 Begin anywhere and forget spelling and punctuation.
  - 6 Do not take your pen off the page; if you get stuck just keep your pen on the page and say to yourself and write “I will soon be ready to go!”
  - 7 Write quickly as this frees your brain from “should” and other blocks to successful reflective writing. If you feel stuck, zoom in on some detail and describe it fully – this can be very evocative and freeing.
  - 8 Do not listen to your EDITOR, whatever you write is fine! It is best not to go back and read over what you have written – it is hard not to edit yourself if you do.
  - 9 The most important rule of all is “there are no rules” – let go and write!
- Now, reflect on the Empathy Wheel as you begin this reflective writing exercise.
  - Write for 10 to 15 minutes.

\*This model was developed by Lara Tupper of the Kripalu Yoga Retreat Center with the assistance of Matt Daly and modifications by Richard F. Mollica.

For some writing prompts sent to your email, visit <https://www.writetothrive.net/event-details/writing-care-package-for-pandemic-response>

## References

Daly, Matt, and Lucy Flood. “Writing.” Write to Thrive, [www.writetothrive.net](http://www.writetothrive.net).  
Tupper, Lara. Lara Tupper – New Novel out Now, [www.laratupper.com](http://www.laratupper.com).

# NATURE JOURNALING

By Sandy McDermott

As a Natural Science Illustrator, Artist and Instructor since 1992, almost everything I know about the natural world comes from observing and taking notes in a sketchbook. Nature Journaling is one of the easiest and most enjoyable ways to discover the wild plants and animals around you. No special skill is required to start a nature journal. With only a pen or pencil and a sheet or two of paper anyone can begin journaling on their own. In addition to sketching, the journal can include a record of time, place, date, and weather conditions. Combining pictures, even stick-like figures if that is your comfort level, and words can be quite simple and informative. Numbers can be used in all sorts of ways to add to the developing story on the page.

An added benefit of Nature Journaling is mindfulness. Mindfulness leads to a calmness of the soul and a feeling of presence. Calmness of the soul leads to better mind and body health. Presence allows one to be in the moment without

distraction. I call this self-care. Nature Journaling is a beautiful and necessary technique allowing me to escape the concerns of daily life in a holistic way and keep my spirit balanced.



At first, Nature Journaling might feel overwhelming; many of us shy away because we “lack” drawing skills. It can also take a while to settle the brain and quiet one’s self to engage the journaling process. Fear not. Embrace the process. Find a quiet place to sit alone. Close your eyes. Breathe. Again. Slower this time. Listen for one full minute. Allow the surrounding sounds and scents to reach your brain. Now open your eyes. What do you see within arm’s reach? Flowers blooming? Ants or bees working? A chipmunk collecting nuts to cache for the winter? Feel the air? Can you feel the rain coming? How much daylight is present? Breathe. Draw. Take notes. No one is judging your skills.





## NATURE JOURNALING



Reaching that state of mind fills me with the sense that nothing else matters except that moment in that place I am sitting. If I use up all my time observing with only my eyes, ears or nose, it is still time well spent. My nature journaling goal is to learn about my environment, my backyard or neighborhood, by tapping into a childhood sense of curiosity: When do the leaves start turning color? Who made this stunning web in the wet grass while I was sleeping last night? Where do ravens gather to roost each night? Slowly and quietly make acquaintance with those “wild things” that share your neighborhood.

Nature Journaling is something you can do alone or with family and friends, for the wellbeing of all. The benefits to mind, body and soul are measurable and worthy to be shared. Please contact me if you wish to learn more about Nature Journaling as a means to mindfulness and connecting with the wilds of your backyard.

### References

McDermott, Sandy. Sandy McDermott, [www.sandymcdermott.com](http://www.sandymcdermott.com).



# FOREST BATHING: A SUMMARY

By Emily Hermann

The trees need us, just as we need them. In *Your Guide to Forest Bathing: Experience the Healing Power of Nature* by M. Amos Clifford, the reader is submersed in the great tool of forest bathing as a self-care strategy. Walking through nature, taking in the smells, sounds, and feelings of the world around you is the recognition of nature that leads you to this strategy that can be incredibly useful. The concept of current forest bathing came from the Japanese practice, Shinrin-Yoku which was established in 1982, but the concept of forest bathing has ancient roots that exist in most cultures.

There are many great benefits to forest bathing. Clifford makes separates the benefits into different sections that are dis-tinguished as: "Simple relaxation... Physical Health and Well-Being of Humans... Emotional and Mental Health... Activism in Action... Healthy Forest Ecosystems... Social Connection... Spiritual Practice and Mindfulness in Nature... [and] Authentic Relationship with Nature" (1, p. 15-39).

These different aspects of benefits, while may not be immediately obvious, will prove themselves to be actively beneficial. Simple relaxation will be the first and most obvious reward of forest

bathing, but, as it is practiced more, the other benefits will be more visible.

Clifford breaks down the different elements of forest bathing, to better show how one can best experience nature. He first talks about the pace, when forest bathing. Where walking is "slow and relaxed". Next, in order to forest bathe, the walk doesn't have to be far, he said that less than a quarter of a mile is a good amount. Being cognizant of one's senses and receive, which is a part of communication, the information and nature. Also, there has to be reciprocity where "we don't just take from the forest... it is about a partner relationship... let your forest bathing practice be a continual inquiry" (1, p. 42)

Through this book, the reader can not only receive information about what forest bathing is, but also how to have the optimal experience while forest bathing. The different areas of forest bathing are not limited to this summary, but instead are expanded and grown on through *Your Guide to Forest Bathing: Experience the Healing Power of Nature*. The greatest way to forest bathe is to fully immerse oneself in the experience and allow the influx of nature awareness that wouldn't normally be recognized on an everyday level. Nature is waiting to be understood, appreciated, and explored.

## Reference

1. Clifford, M. Amos. *Your Guide to Forest Bathing: Experience the Healing Power of Nature*. Red Wheel Weiser, 2020.

# HOW TO FOREST BATHE: SENSORY REFLECTION

By Matt Daly

Our physical senses engage us in direct relationship with the natural world. Sensory awareness allows us to more skillfully reflect on the value of our experiences of the natural world and its necessity in our lives. Although we are always having sensory experiences, we may not regularly focus on the complex ways what we sense makes us feel. Here are a few suggestions for how to develop skillful sensory awareness while in the natural world:

First, move through the natural environment quietly. It can be helpful to move vigorously enough to feel like you are making an effort. Beginning to feel an increase in your heart rate and breathing can be good indicators that you are physically engaged with your experience of nature. Now slow down and begin to become aware of your senses. Look around remembering that “around” includes up and down. Take a deep breath in through your nose and be aware of all of the scents and smells that come in. Listen with both ears to the full range of sounds, and then focus on what your left ear hears and then your right ear. Keep walking while you do this. Smack your lips to notice any tastes. Open your hands and extend them until they touch branches, grasses, boulders, and whatever natural objects surround you. Keep moving slowly while you focus on each sense individually.

Now that you have given a little attention to each sense, expand your awareness to the ways your senses work together. Keep moving while you experience the sensory symphony that surrounds you. Keep doing this until a particular sensory experience naturally draws your focus to a particular sense. Stop moving when

you feel yourself drawn to a process or object that focuses your experience through a particular sense. If you can sit down close to the object or process that focused your experience, sit down. If not, remain standing and try to still. Let your focus on the sense that drew you intensify.

Slowly expand your sensory experience while remaining focused on the object or process that drew your attention. Let the senses work together to provide a fuller awareness of the object or process and the web of other objects and processes in which it is a part. Rest in this expanded sensory noticing of a particular object or process.

When you feel ready, take out your journal and pen or pencil. Start by drawing lines to separate your page into six rows. Dedicating one row to each sense, write as much as you can about each sensory experience. It may be helpful to title each row with each of the senses. If something you write in one row makes you notice another sense, jump to that sense’s row and write the description of that sense. You may have already realized that there is one more row than there are physical senses. That row is for what we might think of as your sixth sense, your intuition, and/or how you feel emotionally in concert with your physical senses. Make sure to dedicate some time to reflecting on and writing about this sixth sense.

## Reference

Daly, Matt. *Wild Nature and the Human Spirit; A Field Guide to Journal Writing and Nature*. Art Work by Murie, Olaus J. Grand Teton Natural History Association, 2004.



# JOY OF WRITING HAIKU POETRY

By Marjorie Agosín and Richard F. Mollica

Writing poetry requires its own unique rhythm. It is impossible to write a poem quickly; each line requires the reader to write slowly and carefully, to take the time to pause and contemplate, to discover the interior rhythm that deepens the poetic experience. The experience of writing a poem is enriched because of those pauses, that are themselves like enchanting rhythms. Like the silver belt of the alchemists, the poetic experience transforms us. Recent neuroscientific studies reference important discoveries regarding how listening to music or reading poetry affect the brain, even producing therapeutic benefits for certain ailments.

Since the sixteenth century, the Japanese, with their contemplative spirit and their skill at *kintusi*, the art of repairing broken poetry with incredible delicacy, have been composing a marvelous poetic form, the haiku, which, in its traditional form, is comprised of three lines and a total of 17 syllables. Traditionally it is written in 3 lines, in 5-7-5 syllables.

This is the age-old tradition of the haiku. It is a contemplative form of poetry, keen in its feeling and its observation of nature's great miracles and sublime beauty, like the vastness of the sea, the changing seasons, as well as the trees, plants, and animals. The haiku poet tries to share with their reader their direct experience of the natural world. It is

written in clear, simple descriptive words with no similes or metaphors. Haiku also has the ability to capture the smallest elements in the vastness of nature as well as ordinary and everyday things. As such, the haiku has the extraordinary ability to name the world with a rhythm that is gentle, deceptively simple, and most importantly, contemplative. Here is an example of one of Japan's most famous haiku poems, by the great poet, Matsuo Bashō:

***Furu ike ya  
kawazu tobikomu  
mizu no oto***

***The old pond  
A frog jumps in  
The sound of the water***

*Translated by R. H. Blyth*

Haiku can revoke the world. The poet is simply the agent who endeavors to name it and feel it in order to share it with another reader. Through its enlightening form of expression, the haiku transforms what we see without obstructing anything, only gently indicating our surroundings in a delicate and deep way, like the mere poetic expression of a feeling.

Many Japanese poets who are masters at composing haikus, like Bashō, have managed to awaken our senses. Nevertheless, haikus are composed today throughout the world, wherever benevolent feelings and expressions

# JOY OF WRITING HAIKU POETRY

By Marjorie Agosín and Richard F. Mollica

about the natural world that surrounds us are universal. And while adherence to the original syllabic count is not always followed, the sentiment of the haikus remains the same.

As suggested in the self-care manual, you can focus on a bee, butterfly, deer, raindrop, or anything else you find in the natural world around you. It is best to write your haiku poems and read it to others.

**Here are a few examples that we have written:**

*A bird trills and sings,  
Teaches us to see the mirage of the sky,  
Whispers messages on the wind.*

*A willow moans in the night and the stars listen.  
The trees carry the sorrows of the world.  
The rain accompanies the willow in its sadness.*

*All the wayward birds alight at my window.  
Some have lost their wings and the rhythm of flight,  
Others return dead and ask me not to forget them.*

*Autumnal leaves bid farewell and fall  
With the slowness of a rainy Sunday,  
Winter returns with its dark light.*

## References

Higginson, William J., and Penny Harter. *The Haiku Handbook: How to Write, Share and Teach Haiku*. Kodansha International, 1985.



# A MEDITATION EXERCISE

By Gregory Lewis Fricchione, M.D.

This meditation approach grew out of my experience as a neuropsychiatrist working as a consultant on the medical and surgical units at MGH. It was clear that severely ill patients anxious and weary and sometimes bereft from their struggle against illness needed a non-pharmacological approach to attaining a respite from their “caged” inpatient existence. Patients often felt refreshed and freed up after learning to elicit their own sense of attachment and solace. This kind of meditation that combines relaxation response breathing, mindfulness and visual imagery with a tincture of loving kindness, was enhanced with what I have learned as Director of the Benson-Henry Institute for Mind Body Medicine at MGH from many experts in meditation (1 – 5).

Let's start with helping you focus your attention while you relax. Now get comfortable in your chair. Raise your eyes up into your head and slowly relax

your eyes and close your eyelids. Take a deep cleansing breath, expanding your belly on the in-breath. If it's hard for you to expand your belly, bend over a little bit and that may help. You will get into a good pattern with your breathing, breathe deeply in through your nose and out through your mouth. You can feel the in-breath, and it is cool, on the out-breath it is warm as it passes your lips. Now empty your mind of every day thinking and just focus on a single point; it may be your breath, a word or phrase, or even a prayer. Don't get upset if every day thoughts return to your mind just gently push them aside and return to your focus. You may say the word peace on the in-breath and count backwards from 10 to 1 so you can say on the in-breath peace and on the other breath 10 and with your next deep breath say the word peace and on the out breath nine and so forth down to one. Once you have gotten into a good pattern with your breathing you will feel more relaxed.



## A MEDITATION EXERCISE

When you are relaxed you can focus your attention on feelings or sensations or thoughts that are passing through your mind and you can do so in a non-judge mental way. These feelings, sensations or thoughts will pass through your mind like leaves passing by in a river. You can stay in that awareness for a few minutes. Now I'd like you to think about people who are close to you, your loved ones, your family. Let yourself feel that sense of connection of attachment to those people who are so important in your life, who give you solace and strength. After you've done that you can move to people who are your friends. Think about your connection to them and feel for them and the challenges they are facing in their lives wishing them well. Then you can move to acquaintances and coworkers. Finally, the people who you find it hard to connect with expressing in your mind compassion for them in their lives.

Now, I'd like you to transport yourself to a place where you would most like to be. A place of maximum relaxation and peace, perhaps it is to the beach. Today let's go to the park. It is a beautiful spring day. The temperature is starting to get warmer; you have a blanket with you, and you lay it under a maple tree, with the bright green leaves of spring. You look up through the leaves and see the blue sky with the light shining through the leaves. You look off to the side and you see bright white clouds passing through the blue sky. You lay your blanket down in the grass soft on your back. You were starting to feel very comfortable and off to the side you notice the first daffodils of spring starting to sprout. They line a path to a small lake, and you hear the ducks as they float by on the lake. Now wind picks up and you feel the lake's spray on your

forehead. The cool water spreads down your cheeks, neck, and shoulders. It is refreshing and with that comes a deep sense of tranquility, peace, and a sense of connectedness to all the beauty around you. The air is sweet, and you feel as light as a feather. You recognize that you can always return to this place of peacefulness simply by following this path. When you open your eyes, you will feel refreshed calm and full of reverence for the gift that life gives us.

### References

1. Aspy DJ, Proeve M. Mindfulness and Loving-Kindness Meditation. *Psychol Rep.* 2017 Feb;120(1):102-117. Epub 2017 Jan 6. PMID: 28558524.
2. Bhasin MK, Denninger JW, Huffman JC, et al. Specific Transcriptome Changes Associated with Blood Pressure Reduction in Hypertensive Patients After Relaxation Response Training. *J Altern Complement Med.* 2018;24(5):486-504.
3. Dusek JA, Otu HH, Wohlhueter AL, et al. Genomic counter-stress changes induced by the relaxation response [published correction appears in *PLoS One.* 2017 Feb 21;12 (2):e0172845]. *PLoS One.* 2008;3(7):e2576. Published 2008 Jul 2.
4. Hilton L, Hempel S, Ewing BA, et al. Mindfulness Meditation for Chronic Pain: Systematic Review and Meta-analysis. *Ann Behav Med.* 2017;51(2):199-213.
5. Jensen CG, Lansner J, Petersen A, Vangkilde SA, Ringkøbing SP, Frøkjær VG, Adamsen D, Knudsen GM, Denninger JW, Hasselbalch SG. Open and Calm--a randomized controlled trial evaluating a public stress reduction program in Denmark. *BMC Public Health.* 2015 Dec 16;15:1245.

# BIO-SKETCHES

## RICHARD F. MOLLIKA, MD, MAR

Dr. Richard F. Mollica is a Professor of Psychiatry at Harvard Medical School and Director of the Harvard Program in Refugee Trauma (HPRT) at Massachusetts General Hospital. Since 1981, Dr. Mollica and HPRT have pioneered the medical and mental health care of survivors of mass violence and torture in the U.S. and abroad. Under his direction, the HPRT conducts clinical, training, policy, and research activities for populations affected by mass violence around the world. He is currently active in clinical work, research, and the development of a Global Health curriculum, focusing on trauma and recovery. The Global Mental Health: Trauma and Recovery certificate program is the first of its kind in global mental health and post-conflict/disaster care. Dr. Mollica has published over 160 scientific manuscripts, published his first book called *Healing Invisible Wounds: Paths to Hope and Recovery in a Violent World* (2006), and his most recent published book is *A Manifesto: Healing a Violent World* (2018).



## EMILY HERMANN

Emily Hermann is an undergraduate student at Lesley University, where she majors in Psychology. Her expected graduation is in the spring of 2022. She is interested in mental health education in urban settings and being an effective change leader to influence curricula that better reflect the experiences of disenfranchised students. She is interested in working with populations with developmental disabilities, specifically children who require behavioral and developmental services. She also is looking forward to exploring the educational paths that she can take after graduation to continue learning about this field. Currently, Emily is doing an internship with the Harvard Program in Refugee Trauma, where she is a research assistant.



## TREVOR LACLAIR, MA

Trevor LaClair is an explorer who is passionate about wildlife. He has spent many years working with and around animals of all kinds, both in captivity and in the wild. After growing up in Missouri, Trevor ventured across the country guiding in different places, including the Greater Yellowstone Ecosystem where he spent his free time tracking grizzlies and watching wolves. Currently, Trevor works as a wildlife photographer and guide, leading people on photo trips to beautiful places with amazing animals. He is a certified Wilderness First Responder and is certified to scuba dive. After receiving his Bachelor's in Fisheries and Wildlife from the University of Missouri, Trevor obtained a Master's in Biology from Miami University. During the past few years, Trevor has had epic adventures exploring places such as Komodo National Park, Serengeti, and the Great Barrier Reef. He loves playing outside and going on epic adventures. His mission is to inspire people around the world to appreciate nature and conserve this planet's natural wonders. Through entertainment and education, Trevor uses the power of media to bring viewers on global adventures and up close to amazing animals. Follow Trevor's adventures by checking out his website: [trekkingwithtrevor.com](http://trekkingwithtrevor.com)



## FANNY Y. CAI

Fanny Cai is a Tufts University graduate, Class of 2021, where she received her Bachelor of Science in Clinical Psychology. Since September 2019, Fanny has joined the Harvard Program in Refugee Trauma team as a research and project assistant. In the summers of 2017 and 2018, she participated as a traveling scholar with the Salem State University Center for Holocaust and Genocide Studies in Europe to build her knowledge in understanding human violence and tragedies of the past and present day. In her academic communities, Fanny serves as a championing voice as an active student leader, taking up multiple positions and causes in order to become an asset to the student body. Her devotion to student empowerment includes peer mentorship, initiatives for student leadership, and self-advocacy. She has earned scholarships and awards throughout her undergraduate experience, with her most recent academic achievement of being inducted into Phi Beta Kappa, the oldest prestigious academic honor society in the United States. She hopes to get her foot into psychological research and clinical experience, and she plans to continue her post-graduate studies in Global Mental Health and Neuropsychology.





# APPRECIATION

**Marjorie Agosín, PhD**

Professor of Spanish at Wellesley College, a poet, human rights activist.

**Eugene F. Augusterfer, LCSW**

A senior psychotherapist and deputy director for Harvard program in Refugee Trauma at Harvard Medical school.

**Matt Daly, MA**

A poet, naturalist, and teacher. Resides in Jackson Hole Wyoming.

**Makeda Daniel**

Harvard Program in Refugee Trauma research assistant, from Roxbury, MA.

**Gregory Lewis Fricchione, MD**

Professor of Psychiatry at Harvard Medical School. Director of the Benson-Henry Institute for Mind Body Medicine at Massachusetts General Hospital.

**Sandy McDermott**

Artist, instructor, writer, located in New Hampshire.

**Christopher Schmitt**

Creative director and visual designer based in Boston.

