THE UNIVERSITY OF CHICAGO

The Call of the Wild: How playfulness influences our views of wild animals

By

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August 2023

A paper submitted in partial fulfillment of the requirements for the
Master of Arts degree in the
Master of Arts Program in the Social Sciences

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Abstract

The present qualitative study investigated the link between human playfulness as a personality trait, views of wild animals (wolves, crows, owls, and coyotes), and connectedness to nature. The link has not been previously investigated directly. Twenty-one participants deemed to be playful were interviewed about their playfulness, connectedness to nature, and views of wild animals. The link between the three was found to be tenuous at best, and connectedness to nature was established as a key mediator of playfulness regarding views of wild animals. Although not explicitly investigated, views of relationships to one's animal nature appeared to be an important influence on connection to nature and views of wild animals. The understanding of how playfulness connects us to our instinctual nature, to other animals, and to the natural world is likely much more complicated than originally hypothesized.

Keywords: Playfulness, Animality, Wolves, Crows, Coyotes, Owls, Shadow, Jung, Analytical Psychology, Psychoanalysis, Nature, Connectedness to Nature, Nietzsche, Winnicott,

Introduction

Many humans mentally separate themselves from the natural world and from non-human animals that might threaten their supposed best interests. Playfulness represents a fundamental means of processing the world in its entirety (Winnicott et al., 2016), including the natural world (Orlie, 2014; Orlie, 2017). Is there a correlation between human playfulness and human attitudes towards wild animals? I theorize that a human's capacity to *play in the world* can break down perceived boundaries in a way that is beneficial to human and non-human animals alike.

As a psychological personality construct, playfulness has been heavily studied in the fields of positive, personality, and social psychology because of its capacity to help people deal with life and relationships. While studies have been administered to participants in natural settings, an investigation of the link between playfulness and subjects' conscious relation to nature—let alone their views of wild animals—has yet to be conducted. Such a study requires a fundamental melding of the various perspectives on playfulness present in psychology, philosophy, and psychoanalysis. Several psychologists have identified a construct called "connection to nature," derived primarily from the concepts of Aldo Leopold's "land ethic" and Arne Næss's school of "deep ecology," as the feeling of being a part of the broader natural world. The goal of the present study is to assess whether one's degree of playfulness has any measurable relation to the ideas people have of nature, including their view of wild animals.

Part of the study will involve interviews of individuals who display high levels of creative aptitude. The participants will be prompted to share their views of wolves, crows, owls, and coyotes, and they will also be questioned on facets of their playfulness and their connection to nature. I hypothesize that playful people will be better connected to nature and have more favorable views of wolves, crows, owls, and coyotes.

Theoretical Framework

Play in Development

Donald Winnicott conceived of play as an exploratory process in which a child, with the facilitation of an adult, becomes accustomed to the things of the world (Winnicott et al., 2016). As young children explore the world around them, they create a subjective reality with the objects they handle. That reality reflects absolute love and warmth, or whatever else they

perceive about the object, so the child sees the object as "real" (Winnicott et al., 2016). Erwin Straus distinguished between the "pathic" response of being grasped by the subjective reality of an object and the "gnostic" reaction of grasping the objective existence of a plaything, where pathic individuals take in the world while those who are gnostic exhibit a desire to understand the world and control their lives (Brooke, 2000). In early play, the toy evokes a fantasy in the child that goes beyond its actual properties. Play is fundamentally pathic for children, as they allow the toy's meaning to come to them rather than attempting to control it (Brooke, 2000). They are grasped by objects and thereby merged with them, loving and caring for them as part of their inner psychic reality (Winnicott et al., 2016) A comfortable relationship dynamic is formed that allows for exploration with the plaything.

When children distance themselves and understand the items in their personal reality, they begin to play. But once they understand that object are merely objects, illusion is separated from reality—although they remain comfortable with those items. At first the child experiences a feeling of "omnipotence" from their seemingly magical control over the object in their subjective reality. Through the facilitation of the parent, the child relinquishes the sense of omnipotence over the thing, which then loses meaning over time and becomes an object devoid of life. Play is viewed as a pathic phenomenon because the sense of control is not derived from understanding but from an experience being projected onto the child. This projected experience is responsible for a child's belief in magic. Over time, play is necessary for a child's progression into a more "objective" reality. Winnicott refers to objects and beings that can facilitate this healthy transition from subjective to objective reality as *transitional phenomena* (Winnicott et al., 2016). Even as the child is finally able to interact with an item as a part of objective reality, it can still be employed for fantasy. That allows for children not only to play with objects, but also share a

fantastic reality with multiple individuals. As people cooperate in their activities, play can facilitate comfortable experiences and willing participation in a mutual reality.

Willingness to play allows for the birth of creativity, which enables people to be "alive" and thus inclined to participate with the world. Such engagement requires that we continue to do what children do—play. To live creatively is to constantly reconstruct the world: we can participate passively in reality, or we can recreate the world as if it has meaning, adjusting it to our needs and finding comfort in it. Play therefore relates to freely and willingly "being in the world" (Winnicott et al., 2016). Although such a definition distinguishes play and creating a work of art, Winnicott sees them as being connected, albeit not necessarily codependent. The creativity here is the action of simply playing with the world—or as Winnicott calls it, "playing with reality" (Winnicott et al., 2016). Living creatively leads a person to relate to inanimate objects, living creatures, or possibly the concept of life itself. When I approach an object creatively, I make it a part of my world and am comfortable with it as a component of my reality.

Playfulness in Philosophy

Play goes beyond the idea of a game, for anything can be considered play when someone finds enjoyment in it. Work can be turned into play if it is viewed as an end rather than a means (Nishitani, 1982). When the intrinsic nature of an activity comes to us, we can find it to be play. If there is passion or enjoyment in the activity, it can be play (Midgley, 1974). To turn an action into play is to turn it into an end unto itself. Therefore, to live a life of play is to live a life of ends.

The Kyoto School philosopher Keiji Nishitani draws on Friedrich Nietzsche's idea of *die Unschuld des Werdens* ("the innocence of becoming") (Nishitani, 1982), which is tied to the

notion of recreating the reality that one is accustomed to in the world (Nietzsche, 2003). The concept emphasizes manifesting the attitude of a child to feel comfortable with the world. Carl Jung likened Nietzsche's idea to the creative and catastrophic potential of the Hindu god Shiva's dance of destruction (Jung & Jarret, 1988). In some way, to be creative is to become god-like—at least to Nietzsche. Through play we can feel at home in the world.

In *Thus Spoke Zarathustra*, Nietzsche writes of the child acting as a god who creates new values in the face of rigid moralities, such as those found in Christianity. He mentions three metamorphoses: first into a camel, then a lion, and finally a child (Nietzsche, 1995). In line with his agenda to counter the strict moral and ascetic regimen of Christianity, Nietzsche uses the camel, which is burdened by the weight of the world and superseded by the lion, to represent a person's rejection of previous moral laws. This is a step on the way to Nietzsche's concept of the *Übermensch*, or "overman," where one transcends the state of saying "no" to life and instead says "yes" despite the suffering intrinsic to it. By saying "yes," the child creates new values (Nietzsche, 1995). Nietzsche argued that the key to human maturity is "rediscovering the seriousness we had towards play when we were children" (Nietzsche, 2002). As the final stage of human development that is inherently playful, the child (or "overman") constantly rejuvenates life in all its grandeur (Nietzsche, 2002; Nietzsche, 2003). One does not necessarily need to be playing a game, but simply "play with reality" (Winnicott et al., 2016). From the standpoints of both Nietzsche and Winnicott, reintegrating the playful childish side of our nature is imperative if we want to confront the world with gusto instead of life-sapping depression and nihilism.

Adult Playfulness in Psychology

Empirical psychological studies that include adults acknowledge *playfulness* as an attitude separate from the activity of play. Psychologists characterize playfulness as the ability to make situations amusing, which fits with the developing psychoanalytic and philosophical principle that play can turn boring or depressing circumstances into enjoyable conditions (Winnicott et al., 2016; Nishitani, 1982; Midgley, 1974, Nietzsche, 1995). Spontaneity, humorousness, unpredictability, sociability, and adventurousness are associated with playful people (Proyer & Ruch, 2011). Playfulness is an important character trait that can energize one's individual, social, work, and romantic life (Proyer, 2014; Proyer & Ruch, 2017; Demir, 2021; Yu et al., 2007).

Play in Non-Human Animals

Based on the work of Gordon Burghardt, we can see that the criteria for "play" in non-human animals are for the most part the same as what we see in humans: (1) play is non-instrumental and has no function on its own; (2) play must be done voluntarily, spontaneously, with enjoyment, and as its own end; (3) play must take place in a manner that differs from a serious variation of that behavior—such as the difference between play fighting and an actual duel between two animals; (4) play is repeated, but is flexible in how it is done, and therefore is a non-stereotyped form of behavior; (5) play must be done in a state of complete safety, outside of mild stress or boredom which could also lead to diversion (Burghardt, 2010). While Burghardt's definition is not going to give us a Nietzschean "Yes" to life, we can learn much about play from our animal brethren without denying the fact that demonstrations of playfulness in humans possess levels of complexity and functionality not exhibited in other animals (Burghardt, 2010).

From a neuroscientific perspective, there is evidence that play fosters a feeling of safety. When play is initiated, the parasympathetic nervous system is triggered to move animals away from the feeling of "fight or flight" and put them into a relaxed state (Kellman & Radwan, 2022). Winnicott contends that making our lives more playful allows us to be mindful in stressful situations and thus feel safe (Winnicott et al., 2016). The neuroscience of play provides tools that help us understand how to feel comfortable in the world.

Although play is usually a situated activity, it can lead to an attitude of openness. Play's ability to expose us to the world is observed in the exploratory behavior of animals, where the non-stereotyped nature of play dictates that some novelty be generated in the process. For example, a cat interacting playfully with a mouse comes close to consuming it, but then withdraws for the sake of fun. Remove the playful element, such as by damaging the hypothalamus, and the cat will be immobilized at the initial sight of a mouse. What the cat does to the mouse when the exploratory element is removed does not look playful (Pellis & Burghardt, 2017). This is similar to Winnicott's idea of the loss of creative living in humans, where life becomes mundane as a state of complacency is formed. Play serves as an important biological catalyst to making us comfortable with the world.

Psychologists such as Jung and Winnicott connect play to imagination, and there is a biological argument for the importance of our creative and imaginative functions in cultivating comfort toward the environment. The region of the brain known as the Default Mode Network is responsible for affective states, self-referential and narrative activities, and the creation of dreams. Our imagination and dreams are linked by one of the seven primary emotional systems described by affective neuroscientist Jaak Panksepp. The SEEKING system, found in the medio-temporal lobe, affects the way our outward desire for creating meaning from objects turns inward

to drive us to find meaning in our circumstances (Alcaro & Carta, 2019). It helps non-human animals survive by giving them a desire to explore outward for food, thereby allowing for an openness to novelty and uncertainty. In endotherms (birds and mammals), imagination is associated with the social primary affective systems CARE, PANIC, and PLAY, which link to our capacity for attachment to others. The rested imagination in these animals, including humans, is responsible for creative, cognitive, and social capacities such as the creation of complex bird songs (Alcaro & Carta, 2019). As Nietzsche said, we must take advantage of our animal instincts if we are to be happy and react to the world in a healthy way, including how we respond to nature (Nietzsche, 1995). It is through the general comfort generated by our animal instincts that we can find salvation and harmony with the wild world.

Play also leads to socialization in animals, thus allowing them to be more receptive to each other. Panksepp demonstrated that rats that do not grow up playing are prone to aggressive behaviors and less social overall (Panksepp, 2007). Although not necessarily true of all creatures, play in animals such as wolves helps them understand norms. When wolf pups play-fight, they are brought into a shared imaginary space where they are fantasy warriors dueling in the arena, but their bites are turned to nips to lessen the pain. Pups that do not “play fair” will likely not be played with the next time. Mary Midgley emphasizes that play has a regulated nature (Midgley, 1974) in which even animals learn about the ideals of cooperation and the creation of boundaries (Massumi, 2014). Shared rules establish the reciprocal nature for exchanges between individuals. Mutual play creates a space between individuals that not only encapsulates an outer and an inner reality, but also facilitates our relationships with others. Imagination works in coordination with play to socialize us with others. Play’s ability to make us feel safe, as well as its connection to

exploration and novelty, gives credence to the notion that we should be comfortable with “scary” wild animals and natural phenomena.

The sociality created through adult play in human and non-human animals also can be used as a method of building more tolerant societies. African wild dogs (*Lycaon pictus*) use play to decide if a migrant dog should be welcomed into their pack, thus showing how play facilitates cooperation and promotes openness (Palagi, 2023). Even more interesting is how such dogs act before, during, and after hunts. During hunts, they play with each other through unserious fights and chases, and when they finish playing, they collectively agree to start hunting and consistently reinforce that plan through playful interactions. After they have eaten, they play again. When play has such an intense symbolic meaning, it becomes a basis for collective decision-making not only for animals, but also in many hunter-gatherer societies. While hunter-gatherer cultures are generally egalitarian, they grant individuals full freedom to act as they please, such as with an individual who delivers most of food during a hunt joking about not doing that much work. However, if the same individual delivered less, it would be common sense for others to find more, thereby demonstrating how the collective operates seamlessly without disorder (Gray, 2014). Even children are able to function in these small democracies to help make decisions for their group (Gray, 2011). As demonstrated in wild dogs and hunter-gatherer societies, playful behavior can promote an increase in adult sociability.

Through Nietzsche’s notion of courage, playfulness can generate higher levels of adaptability. A psychology study that acknowledged the roots of play in animals found that students who were more playful tended to be more adaptable to novel situations (Shen et al., 2017). A mother’s playfulness will produce children who are more playful and adaptable (Shen et al., 2017), although Winnicott’s argument that mothers are always the ones to institute a

child's play with their transitional object is somewhat antiquated. When facilitated by mothers or any other child-rearing adult, play helps children interact with the world in a healthy manner (Shen et al., 2017). In general, the connection between play and the uncertain brings us back to Nietzsche's ideal person, who goes out into the world and courageously faces the unknown, embracing the lack of certainty. As playfulness exposes us to uncertain situations, it acts as a tool to introduce us to novel experiences, such as going out into the wilderness.

Defining Connection to Nature

Connection to nature is the quality where one's self-image is fundamentally relational to the natural world. When creating their Connectedness to Nature Scale (CNS), Stephan Mayer and Cynthia Frantz identified the foundational concept of environmental conservation. Their work emphasizes Leopold's sentiment of not viewing the world's resources as something to take advantage of, but rather seeing ourselves as part of a nexus of relations in the broader natural world (Mayer & Frantz, 2004; Leopold, 2008). Frantz and Mayer theorize that feeling connected to nature tends to make one want to protect the environment (Mayer & Frantz, 2004). Hunter-gatherer perspectives also highlight the significance of a reciprocal relationship with both the natural world and other wildlife (Kimmerer, 2013; Rose, 2017). The CNS is meant to measure one's affective relationship to nature, as opposed to a cognitive understanding of one's place in nature (Mayer & Frantz, 2004).

A Philosophical Link Between Playfulness and Connection to Nature

Nietzsche's ideal human being, Zarathustra, serves as a general model of how ecstatic and playful behavior connects us to nature. Depicted as a man who came from the mountains and

is surrounded by animals, most famously the eagle and the serpent, Zarathustra constantly dances and has great respect for animal life due to his free-spirited nature (Nietzsche, 1995).

Zarathustra's message of playfulness helps to connect people to nature as well. In a drunken fervor after the "Ass Festival" where Zarathustra awakened the people's child-like playfulness, a character declares, "I am for the first time satisfied that I have lived my whole life. And that I attest so much is still enough for me. Living on earth is worthwhile: one day, one festival with Zarathustra, taught me to love the earth" (Nietzsche, 1995). Zarathustra allowed people like this to feel like children, act in an animalistic way, and then stand silently as they collectively unite with the earth (Nietzsche, 1995). Aligned with their instincts, they take themselves back to their childhood and are further connected further with their point of origin: the earth.

The means by which we reconnect with the earth lies in our roots and animal heritage, which Zarathustra portrays as exemplifying the values of the strong, such as courage (Nietzsche, 1995). He models his playful courage on wild animals, noting that courage includes laughter, which is an element of playfulness (Nietzsche, 1995). Connecting with our animal instincts is essential if we are to playfully relate to nature. Nietzsche contends that people fear the wild because they inherently desire order. We fear wild animals, such as wolves, because we fear the wild animal in ourselves, or the "inner beast" that is our own animality—the animal part of the self (Nietzsche, 1995). Nietzsche argues that animality is the source of playful courage and creative living (Nietzsche, 1995). To be more in touch with the natural world is to accept "the inner beast" and the values that nourish it.

Views of Wild Animals

Wildlife Value Orientations

Any discussion of wild animals must establish the distinction between "mutualism" and "domination." According to the Wildlife Value Orientations framework and associated psychometric scale, people who value wildlife—such as wolves—will be "mutualists" who permit the presence of wildlife, even when it conflicts with human interests. They desire harmony between humanity and the natural world. On the other hand, people who only value domination—known as "traditionalists" due to an allegedly traditional relationship with nature—view certain forms of wildlife as nuisances that can get in the way of human interests (Teel et al., 2010). Traditionalists see other animals as resources to exploit, believing they should be exterminated if they are not helpful to human needs. An example of this are ranchers who believe wolves should be exterminated because they prey on livestock. Overall, the mutualist attitude is the preferable mindset toward wild animals.

Wolves, Crows, Owls, and Coyotes: The Uncontrollable and/or the Dark

To some degree, wolves, crows, and coyotes are predatory toward human property such as livestock, pets, or crops. Their predation is often associated with the uncontrollable wild (Jürgens & Hackett, 2021). Therefore, someone who tolerates the chaotic essence of these animals, or does not acknowledge them as such, will theoretically accept them as part of nature.

Wolves, crows, and owls are also associated with night and darkness, as there is an uncertainty in the night that their presence can signify. Different cultures see them as representing darkness and death or—in the case of crows and owls—bad omens. Such creatures are also related to Jung's concept of the *shadow*, an unconscious part of ourselves that we do not

accept (Jung, 1969). The ideas of night and darkness resonate with these repressed parts of ourselves, as both these animals and what happens in the darkness are not under our control.

Nietzsche states that animality, or "the inner beast," can itself be thought of as shadow that is repressed. The uncontrollable, dark nature of these animals corresponds to the wild, instinctual part of the self that responsible people try to subdue in their civilized lives (Egger, 2001). Therefore, following Nietzsche's admonition to accept our animalistic side helps us relate to animals most strongly associated with negative traits (Egger, 2001).

The shadow is also related to the notion of the trickster, a figure that is representative of the chaotic part of the self, such as what appears in certain medieval descriptions of the devil (Jung, 1969). People who dislike the uncontrollable wild could easily resent these animals. While coyotes appear in Native American culture as tricksters, they often have neutral to sometimes positive connotations (Flores, 2016). Crows in certain Native American traditions act in a similar fashion (Marzluff & Angell, 2007). Although wolves are not strongly tied to the trickster, especially in Native American cultures, they still relate to the figure. For example, the Big Bad Wolf in *Little Red Riding Hood* eats a young girl's grandmother and then disguises itself as the grandmother as a ploy to also devour the girl (Jürgens & Hackett, 2017). The phrase "wolf in sheep's clothing" refers to a predatory person who acts innocently (Bukowick, 2004). The animal least related to the trickster is the owl. Certain bands of the Cheyenne people would wear owl feathers and act in "contrary," "backward," or "foolish" ways, according to Cheyenne who did not participate in these practices (Forsythe, 2020). The figure of the "fool" in analytical psychology is also tied to the idea of the trickster. People who do not playfully accept the fool in their hearts might not have a fondness toward wild animals because they associate them with chaos.

How Animality Relates to Playfulness and Connection to Nature

The model of the free spirit that is connected to the earth can be found in more modern strands of analytical psychology. Brigitte Egger is an analytical psychologist and biologist who is interested in the way we view wolves and other predators through the lens of Jungian psychology. Incorporating Nietzsche's ideas, she maintains that "ecstasy" is a primitive way to connect with our animal instincts, eventually allowing them to take over. In a more modern landscape, however, our animality communicates with us through the unconscious in the form of dreams. We find ourselves constantly at war in our unconscious with the perception of a predator that in many ways is associated with the sinister elements of our human nature, such as greed, lust, and aggression (Egger, 2001). Yet Egger argues that there is also a positive side to the predator that leads to creativity and self-limitation. To reach a "balanced wolfishness" should lead us to be spontaneous, assertive, and creative in our lives, as well as locate ourselves in "larger contexts" (Egger, 2001). If the egotistical side of the repressed predator archetype is allowed to overtake the "self-limiting" side of the self, people's attitudes toward nature will be one of domination. But if we accept both sides of the animal, such as the archetype of the wolf, we can live creatively and be open to the world and the environment. By accepting the animal in ourselves, or at least by acting in an animalistically playful manner, we can be more in touch with nature and our fellow animals, thus living up to the Zarathustrian ideal of an individual.

The denial of our animality evokes Zarathustra's belief that failing to understand our animal nature was a sickness of humanity. While he initially stayed on his mountain, Zarathustra expressed "nausea" and "disgust" at a humanity "drunken with death" (Nietzsche, 1995).

Humans find themselves not able to live in this world, focusing instead on a perceived afterlife. We too often fixate on the inevitable nature of death, not on what is taking place in our lives.

Zarathustra's emphasis on humanity's reluctance to embrace the world elucidates this issue by promoting the integration of animals into our lives and recognizing that not channeling our animalistic playfulness can be destructive. To understand Zarathustra's plight, we must understand that Nietzsche is arguing against people who adhere to asceticism and pure rationality as they contemptuously view the earth and their animal instincts (Nietzsche, 1995). Zarathustra speaks on how mocking the animal in ourselves has consequences for how we view the earth:

> [Thus] says your lying spirit to itself—"to look at life without desire and not, like a dog, with my tongue hanging out. To be happy in looking, with a will that has died and without the grasping and greed of selfishness, the whole body cold and ashen, but with drunken moon eyes. This should like best"—thus the seduced seduces himself—her beauty only with my eyes.…For already she approaches, glowing; her love for the earth approaches. All solar love is innocence and creative longing.…Verily like the sun I love life and all deep seas. And this is what perceptive knowledge means to me: all that is deep shall rise up to my heights. (Nietzsche, 1995)

Ascetics look at life not with the playful exploratory desire of the dog but with "an evil eye for the passions" (Nietzsche, 1974). They do not know how to practice the kind of creative living that accepts all of life as being connected to them. Mocking animalistic playfulness is a denunciation of not only our inner animality, but also of life itself. To personify the sun's light to the earth is to illuminate all the perceived darkness in life. Jung held that human life is most valued when we accept the animal in ourselves, and that anyone who wishes to destroy life must face those who will rise up to stop them from violating a moral absolute (Jung, 1964). Embracing

the playful glance of the dog and the life-giving warmth of the sun brings understanding to our connection to nature. Both Nietzsche and Jung want us to retain our egos and liberate the animals in ourselves from the chains with which we bind them. The fact that we are separate individuals means that we are also fundamentally connected to—and should value—all life.

How Does Playfulness in Childhood Link Us to the Non-Human World?

Play's capacity to connect humans to nature does not require the presence of traditional wilderness, as human imagination can transform oneself into another animal. Studies of children's play in classrooms showed that when seeing their classmates again after a break, children created scenarios in which they acted like different animals: "When the participants 'became wolves,' they immersed their physical selves in the role, building caves out of book shelves, shoving chairs together to create blockades, and using clothes, coats and other materials as beds, leashes, food dishes, and later bandages (or magic potions) when their animal 'fights' had taken a turn toward injury and death" (Harju & Rouse, 2018). The means by which children find themselves free to act in animalistic ways that could be referred to as "wildness" is demonstrated in their physicality when pretending to be wolves. Such physicality returns them to the full use of their bodies and rich senses as they engage in play. One can act as an animal and still be connected to the natural world even when away from "natural" landscapes (Harju & Rouse, 2018). Children embracing their animality typify how adults can use play to connect to their bodies and understand the lives of other animals through fantasy.

Playfulness extends beyond the action of play to the ways children attribute life to thrombolites, structures formed in shallow water when microorganisms deposit sedimentary grains. In Perth, Australia, children participate in a curious practice of "enchanted animism"

where they attribute life to objects that do not have any real vitality: “Many of these ‘rocks but not rocks’ do seem to have faces and many are ‘cuddled up’ to each other, as another child puts it. It is hard for us adults to see the thrombolites in such terms because we carry with us lifetimes of resisting these so-called ‘childish’ ways of seeing and ignoring the wonder of ‘thing-power’ (Bennet, 2010) affected by the seemingly inanimate” (Gobby et al, 2021). What the children were able to do was add wonder to something that did not originally have it, as they created a narrative out of the essence of the thrombolites. When the issue of wanting to care for the thrombolites came up, the children decided that they could do that (Gobby et al., 2021). Through the act of “visiting” the thrombolites (Gobby et al., 2021) the children were able to bring them into their world and make them a valuable part of it. If this can be done by children with inanimate rock, then adults can display the same kind of playfulness toward animals by taking the perspective of non-humans.

How a Lack of Playfulness Can Detach Us from Nature and Wild Animals

What if people completely disconnected from their inner child? What if they trudged forward with the grind of life, isolating themselves and never looking back? Psychoanalyst Susan Bodnar wrote of a wealthy patient who was immersed in his work and addicted to drugs. He once liked animals and used to enjoy playing in the rain, but during treatment he did not want to think about the fact that there was no more rain or snow in his life. He had stopped playing, declaring that liking animals does not get anyone ahead in life (Bodnar, 2008). Although this is an extreme example, we nevertheless see a highly individualistic person so focused on business that he had abandoned creative living. Having lost that childlike imagination that loves animals, he had no desire to explore, dream, or even go outside. Many people who hold a similarly rigid worldview

find it annoying to consider other perspectives, as their lack of play distances them from the world. Without play to expose them to other dreams and possibilities, they are in a sense cut off from reality and cannot truly be "alive" (Winnicott et al., 2016). Retaining some level of playfulness in one's life is necessary to act in a manner that does not merely amass pleasure for oneself.

How Animalistic Playfulness Connects Us to Nature

In contrast to an acquisitive use of the world for one's pleasure, play can inspire people to treat others with dignity. We can thus transcend a simple love of life and find ourselves valuing life itself. The notion of "creating" and "destroying" is a process by which people can allow any entity to enter their world. Eventually, they find themselves comfortable with other life forms in that world—even a weed. If I look at a weed objectively by seeing it as interfering in *my* garden, I remove it. If I decide that it has a reason to be there, then I do not destroy it. The perception of the "threat" of the weed goes away, and instead the plant gains some sort of intrinsic value. When political philosopher Melissa Orlie heard honeybees buzzing near some weeds one day, her perception of the world fundamentally changed as she hesitated to remove the weeds: "Have I ceased to cut, hack, and brush mow that weed? Hardly. Letting be and doing nothing, as every gardener knows, is not facilitating care. However, what, when, and how I do anything to that weed, and much else, is deeply changed by that momentary experience" (Orlie, 2017). As Winnicott said, play causes us to lose our "omnipotence" over other things and empowers us to view other beings as ends in themselves (Winnicott et al., 2016; Orlie, 2014). Nishitani maintains that when humans employ a sense of playfulness, they no longer view others as means, but as

ends (Nishitani, 1982). Play has that beautiful factor where new can be created from old and make life something interesting rather than a soulless instrument.

Play teaches us to take in the moments of our lives and approach all things differently. Nietzsche states that we allow the world to be destroyed and then recreated, while Winnicott conveys the view that we should gain fresh perception in our lives rather than merely re-appropriating old ideas. That does not mean we rid the world of the old, but rather—as Jung would argue—revitalize the world with new life. People value life itself when they are playful.

Even when killing animals is necessary to sustain human life, hunter-gatherers who approach life in a playful fashion treat the animals they hunt with a sense of dignity They see themselves in a reciprocal relationship, viewing the animals as persons. All life has a sense of personhood and beauty (Kimmerer, 2013), so if it must be used for human benefit, it should be taken with thanks and respect toward the animal. Even though in reality the animal likely prefers to live, certain hunters believe that a hunted animal offers itself up to be killed, which is why deer stagger sometimes when being hunted (Nadasdy, 2007). Play is even a vehicle for teaching hunter-gatherer children about the natural world (Gray, 2011). This may be the opposite extreme of the person who is completely disconnected from nature and solely focused on self-advancement.

Methods

Sampling

A sample of 21 subjects was assembled based on their high degree of engagement in some sort of creative activity—that is, a tendency to be “playful”. There was no control group

used in the study. The sample included voice actors, documentary makers, musicians, artists, and even people who just write comedic social media posts. One participant was a graduate student in the Master of Arts Program in the Social Sciences at the University of Chicago, while the other 20 were sourced and contacted through Discord, a social media application where people can create communities based on different topics. Many of the participants were sourced from various voice-acting Discord communities, or "servers."

The researcher only approached participants who were known to engage in or aspire to be in some creative activity. None of the participants were absolute strangers to the researcher, as all of them were contacted through direct messages. However, the researcher had communicated very little with some of the subjects. While the closeness of the relationships between the researcher and the participants varied, he did not approach any of them with absolute certainty of the information they would give. There was always some level of surprise at the response no matter how close the relationship. The participants received no compensation for their time.

The majority of the participants were from the United States, but a few were from India, New Zealand, and Italy. Although 13 subjects were white, racial and ethnic representation was relatively diverse, with five Latino, three East Asian, one South Asian, and three Black participants. One participant (Participant 4) was part Cherokee, which she stated had an influence on her outlook. Thirteen of the subjects were male and eight were female. Every subject was cisgendered.

Interview Procedure

In-depth interviews lasted from 45 minutes to 2 hours and were conducted mostly online through Discord. Subjects were approached knowing that the research involved the concepts of

playfulness, connection to nature, and views of wild animals. Each interview began with open-ended questions about the participants' views of wolves, crows, owls, and coyotes, based on questions about wild animals sourced from Jürgens et al. (2022). The questions explored subjects' feelings about the animals and how they perceived the symbolism associated with each one. Participants were asked to rate how much they liked each of these animals on a scale of 1 (strongly dislike) to 4 (neither like nor dislike) to 7 (strongly like). Although the small sample size excluded these ratings and future ratings from being used statistically, the data were utilized to expand on and confirm other information gathered in the interviews. Following the ratings were questions about connection to nature that had been compiled from various psychological surveys. The interviewer had the freedom to follow up on any of these questions for more information if needed.

One interview was in person, 13 were conducted through Discord voice calls, and seven were done through Discord private messaging. The in-person meeting was taped with a voice-recording phone app, and the calls were recorded with a Discord application and later downloaded. The audio recordings were transcribed with a voice-to-text application known as Cockatoo, and detailed notes were kept of each interview. The Discord text interviews were copied and pasted from the application to be analyzed in their entirety. Two of the Discord voice-call interview recordings (Participants 4 and 9) were lost, but the notes from the conversations were still used and the researcher followed up with those subjects if any clarification was needed. The conversation with Participant 21 was not recorded, though most of his responses were submitted through a Google Doc with the survey questions.

Analysis

The interview notes and transcripts were analyzed in the coding application MAXQDA. Details from the interviews were coded to look for common themes. Each response received a code for a response of favorable, neutral, or unfavorable for each of the four animals, based on participants' ratings on how much they liked each animal. By the end of each interview, every individual was certified to be "playful" to some degree, so merely being playful was not coded for. A few of the playfulness questions were coded for each person: the question of whether life is a playground or a battlefield; the set of three questions related to free-spirited nature; and the two questions on secure attachment (one had to agree with the first of the two questions and disagree with the second, which, if quantified, would be reverse scored). Participants were also coded if they felt connected to nature, and those given such a label were given an additional code if they had a cognitive understanding of their place in nature. Participants who met the standards for connection to nature but had not reached a knowledgeable perspective of their place in nature were coded as both connected to nature and neutral. Participants who were disconnected to nature were noted as such as well.

Results and Discussion

Playfulness

As expected, every participant was playful due to the focused sampling process. However, not all individuals demonstrated equal levels of playfulness. Participant 18 was rated as playful but primarily demonstrated playful behavior in his voice-acting work. He was capable of certain aspects of playfulness but scored low in imaginative behavior and other facets that showed his grounded nature. For the rest of the results, the individuals all scored as playful in

some way, so their relationship to being connected to nature and liking wild animals will be implicitly understood as being tested in relation to their playfulness.

Participant	Connected to Nature	Wolf Favorability	Crow Favorability	Owl Favorability	Coyote Favorability
P1	Yes	Favorable	Favorable	Favorable	Favorable
P2	Yes	Favorable	Favorable	Neutral	Favorable
P3	Yes	Unfavorable	Favorable	Favorable	Unfavorable (Jackals)
P4	Yes	Favorable	Neutral	Neutral	Unfavorable
P5	Yes	Favorable	Unfavorable	Favorable	Unfavorable
P6	No	Unfavorable	Unfavorable	Unfavorable	Unfavorable
P7	Yes	Favorable	Favorable	Favorable	Neutral
P8	Yes	Neutral	Neutral	Favorable	Neutral
P9	Yes	Favorable	Neutral	Favorable	Favorable
P10	Yes	Favorable	Neutral	Favorable	Neutral
P11	Yes	Neutral	Favorable	Neutral	Unfavorable
P12	Yes	Favorable	Favorable	Neutral	Favorable
P13	Yes	Unfavorable	Unfavorable	Neutral	N/A
P14	Yes	Favorable	Neutral	Favorable	Neutral
P15	Yes	Unfavorable	Favorable	Favorable	Favorable
P16	Yes	Favorable	Favorable	Favorable	Favorable
P17	Yes	Favorable	Favorable	Favorable	Favorable
P18	Neutral	Unfavorable	Favorable	Favorable	Unfavorable
P19	Yes	Favorable	Favorable	Favorable	Unfavorable

P20	Yes	Favorable	Unfavorable	Favorable	Unfavorable
P21	No	Unfavorable	Favorable	Neutral	Unfavorable

The Relationship Between Playfulness and Connection to Nature

Based on the way the study was carried out, no connection was demonstrated between playfulness and connection to nature. I determined that 18 out of the 21 subjects were connected to nature to some degree. Participant 18 was neither connected nor disconnected from nature and was labeled as neutral, while P6 and P21 were not connected to nature at all. The originally hypothesized relationship between playfulness and connection to nature grew blurry when P6 and P21 were found to be disconnected from nature despite their extremely high playfulness scores.

View of Wild Animals

Animal	#Favorable	#Neutral	#Unfavorable	#Not Applicable
Wolf	13	3	5	0
Crow	12	5	3	0
Owl	14	6	1	0
Coyote	7	4	9	1

The information demonstrates that the wild animals were generally tolerated. Coyotes were the only animal of the four to receive a majority of dislikes. (P3 spoke about jackals instead of coyotes because that is what is present in India, and P13 was exempt from these questions

because he lives in New Zealand, which has no native mammalian predators.) This meshes with the prediction that coyotes would be the animal least likely to be rated favorably because they are generally presented in a negative light. Owls stood out as what was predicted as the most favorable due to their positive standing in the United States. There is a chance that relating to the playful nature of crows led subjects to find them more tolerable than wolves. However, since owls are not thought to have a playful nature, that inference is by no means conclusive. Overall, the connection between playfulness and views of wild animals is questionable at best.

The Two Very Playful People Who Were Disconnected from Nature

The second to last participant interviewed (P6) radically changed how the relationship between playfulness and connectedness to nature was viewed. While he scored highly on most aspects of playfulness, he professed that he pitied the state of animal existence, and he was repulsed by the idea of anyone liking an animal. He found wolves "disgusting" and "barbaric," and he was the only participant to give a "1" (strongly dislike) to an any animal, that being coyotes. His dislike for coyotes was not even based on them being a nuisance—just their mere existence. He said in the debriefing that they are playful enough to smile after being punched. Therefore, the direct relationship between playfulness and views of wild animals has been called into question, as has the link between playfulness and connectedness to nature.

However, that same participant's fervent disdain and rejection of having an "animal nature" could offer insight into what leads to connectedness to nature. When asked in a follow-up question if he embraced his animal nature, he made this declaration:

> No—and I reject your wording of calling it something to "embrace." All "animal nature" really in my eyes is barbarism and unintelligence itself. I wouldn't even say that humans

> are that particularly special in nature, though because there are some human beings I would and *have* called and viewed as "animals" because I see there as being a set of responsibilities a human has to fulfill in order to earn the title of "human." I view the entire concept of "animal nature" as nonexistent in a human being and by extension myself….Animals are closer to plants than they are to humans in my mind. I feel no sympathy or kinship to them.

The researcher chose to study playfulness because it is a characteristic shared by many animals. However, P6 fervently distances himself from his animality, a likely factor in fondness for animals. Nietzsche argues that people dislike wild nature due to their hostility toward the "inner beast" (Nietzsche, 1995).

In contrast, the least playful participant (P18) embraced the natural connection between humans and animals: "We are animals. There's no denying it. We prioritize the survival of humanity, but animals are an essential part of the ecosystem we live in. With no other animals there is no life. This includes insects." The acknowledgment of being an animal or overtly relating to animality is necessary, such as with P4 wanting to act like a wolf as a child. Participant 6's contempt for hedonism and indulgence also contributed to an antipathy toward animality. Clearly, the effects of embracing one's animality and how that influences the way people view wild animals should be examined more closely.

Although the results do not guarantee it, there is some evidence that for one to like animals, playfulness must be mediated by connectedness to nature. Bases on a factor analysis of the survey items, one statement was most effective in measuring connectedness to nature: "Like a tree can be part of a forest, I feel embedded within the broader natural world." Participant 6 strongly agreed (7) with that statement, noting that he was no less natural than a tree. He talked

about being a force of nature and submitted his view of absolute truth by declaring that a falling tree does in fact make a sound even if no one is present to hear it. However, he also spoke of enjoying the idea of sheep being skinned, and he believed it is better to have more dead animals than living ones. His extreme amount of dislike for all four of the animals does likely correlate to some mediation by connection to nature. In contrast, P13 held strongly unfavorable views on wolves and crows, but said that he liked bunnies and penguins due to having played *Club Penguin*, an online videogame where people play as humanized penguins.

Participant 21 was extremely playful and displayed a sense of practical care for the planet. Although he viewed humans as clearly superior to animals, he did express appreciation for the intelligence of crows, for which he gave a like (6). This further demonstrates that some sort of connection to nature is a necessity for liking animals and accepting one's animality.

Playground or Battlefield—Does it Matter?

Taking inspiration from Winnicott, I considered the question of whether one thinks of life as a playground or a battlefield to be most important. The results did not demonstrate that to be the case, though. One could even argue that a more nuanced view of the world, or even viewing it as a "battlefield," would be more beneficial based on the data. That is true only if it is balanced with other aspects of playfulness, because the few people who viewed the world as more of a battlefield all liked two or more animals. To some extent, participants who had a neutral view of the world liked even more of the animals than those who viewed the world as a playground. Basically, it is an issue of balance, as those who are somewhat grounded can better understand the importance of what is going on around them. While discussing Zarathustra, Jung states that the person who is too playful will dance over every issue—something that is not desirable (Jung,

1988). Based on this knowledge, it makes sense that the playground/battlefield question ultimately did not matter as much as I anticipated, with neutrality on the issue perhaps being a beneficial perspective.

Smaller Threads and Theoretical Speculation

As the capacity to be playful does not overtly link to connection to nature and views of wild animals, smaller threads and theoretical speculation can be derived from this study if done in a nonconclusive, non-generalized manner. All further analysis of playfulness, connectedness to nature, and views of wildness veers more into conjecture.

Does Belief in Magical Nature Contribute to Views of Wild Animals?

Based on the views of Winnicott and Straus that belief in magic originally arises from healthy transitional phenomena when the world is taken in a "pathic" manner, one's belief in magical nature should correspond to that person's playful capacities. Therefore, having some sort of magical resonance with nature and the experience of wild animals could lead to a positive view of those animals.

A comment supporting this idea came from P1, who stated that everything in the world is magical, although such a perspective does not necessarily make people like all animals. Participant 8 thinks nature is magical but does not resonate emotionally with animals, and P13 believes that viewing animals is a magical experience yet was even less favorable toward animals than P8. Thus, playfulness seemingly *can* lead to a view of magic in the world, but again we cannot be conclusive. The same applies to participants like P13 who see themselves as small parts of the natural world but do not relate much to animals.

However, participants who viewed nature as magical (P1, P3, P8, P10, P12, P14, P20) liked at least two of the animals (P1, P3, P10, P14, P20) or disliked none of the animals (P8). People who believe nature is magical will likely view the world in a pathic way that does not desire control. Therefore, they will tolerate or like animals that represent darkness and that which is uncontrollable.

Everyone who viewed nature as magical were also extremely playful as well. As there is no control group, this cannot be determined for certain, but there is a theoretical connection between a degree of playfulness and viewing the natural world as magical (even metaphorically).

Seeing self in the animal

Certain people were favorable toward wolves primarily because they did not see themselves as part of mainstream society. The figure of the wolf as an outcast is found in works such as Hermann Hesse's *Steppenwolf*, which portrays a figure who feels he is not the same as other people (Arnds, 2021). In Nietzsche's *Thus Spoke Zarathustra*, the wolf is spoken of as a free spirit that lives in the woods and is despised by dogs (Nietzsche, 1995). While this does not directly tie to playfulness, as Zarathustra is meant to be a playfully contrary figure, the connection to an aspect of his playfulness still applies.

Projecting one's self-view of being misunderstood onto other animals also applies to attitudes toward crows. Participant 3, despite living in a Hindu Indian society that views crows as auspicious, still viewed them as "imperfect" because she felt misunderstood and viewed herself as less physically appealing than other women—something she feels she shares with crows. As the symbology of wolves is only found in esoteric aspects of Hinduism, it would make sense that

she looked to another animal for this feeling. Ultimately, the playful contrary feeling of the self can make one relate to those animals that might evoke the same emotion.

In the same vein, a few participants (P3, P15, P18) saw themselves as playful in a similar manner to crows and appreciated the playfulness of both crows and coyotes. When P18 was asked about his affinity for the playfulness of crows, he mentioned that he views crows as playful in a "childish" way, though his attitude in a certain sense intersected with the crow's playfulness.

The last way in which the participants identified with animals was in their similarity to humans. Participant 21, who was anthropocentric, felt that the crow's intelligence makes it closer to a human and found it the only animal appealing to him. When asked about other intelligent animals like octopuses, he thought the same. Participant 18 noted that owls are the only bird that can directly look at you because of their front-facing eyes, which makes their faces look more human.

Embrace of Darkness

Playfulness helped influence participants' views of evil, an example of a correlation that could be explored further. The most prominent extreme was that of participant who noted that owls are a symbol of bad luck in her Hindu culture, although white owls are also associated with wisdom due to the goddess Lakshmi's owl mount, which is white. However, Participant 3 also likes to watch funny owl videos and told me, "My culture can't stop me from watching owl videos in my free time."

There also seemed to be some correspondence with the concept of darkness and evil for some participants. Although P3 shares the common Hindu view that the universe itself is playful,

she believes her own playful personality to be the reason why she adores owls while others view them as being bad omens. That also aligns with her understanding of the balance of good and evil and having an appreciation for animals viewed as "evil." That attitude also applied to P15, whose appreciation for darkness made him like crows partly because of the negative stereotypes ascribed to them. That could tie into Nietzsche's idea that the playful free spirit is able to embrace the dark parts of the self and go beyond what is perceived as "good" and "evil" (Nietzsche, 1995; Nietzsche, 2002).

Pretending to be an Animal

Although no questions were initially asked about animality, a few of the respondents raised the topic. All three such respondents were connected to nature and felt that nature is "magical." Participant 12 said that she wanted to be a wolf when she was young, often howling and pretending to be one. As an artist, she usually draws herself as a wolf and not as a human. Participant 14 also stated that he played as multiple animals as a child and attributed spiritual qualities to nature. It further came out that P10 has played the videogame *Stray*, where one plays as a non-anthropomorphized cat. When asked if she felt this connected her to her instinct, she agreed. As stated previously, P13 likes penguins because he played the videogame *Club Penguin*, which involves a community of anthropomorphized penguins. However, based on the data from P21 (which will be discussed later), this might not be what connects him to nature. It is unlikely that playing *Club Penguin* helped him connect with his animal instincts, which is why it must be non-anthropomorphized.

Follow-up interviews were conducted to further investigate whether any other participants pretended to be animals when they were children. Not every subject gave an answer,

though, so these data are still nebulous. Seven participants (P2, P5, P7, P9, P10, P15, P19) responded that they had played as animals and were also connected to nature. A few participants (P3, P6, P11) stated they had not played as animals yet were still connected to nature. They were not as emotionally connected as the other seven, although P3 is an exception. She still embodied some animalistic part of herself by not wearing clothes because that is what animals do. Therefore, she resonated with a form of animality that connected her emotionally to nature.

The case of people who were not connected to nature further demonstrates and adds nuance to the link between pretending to be an animal and connection to nature. Participant 6 disliked all animals, yet he had not pretended to be an animal as a child, and he would never play a videogame like *Stray* because he disliked the idea of playing as a non-anthropomorphic animal. Participant 21 has not played *Stray*, but he has played other videogames in which you play as animals that are more anthropomorphic. He did play as an animal when he was a child, but he stated that he does not currently have a positive feeling about that that childhood animal play. While it seems that a person needs to have a positive attitude on the experiences of being an animal, that does not mean that recognition of one's animality will not persist until adulthood. If a positive relationship with one's animality *does* persist until adulthood, then theoretically they should be connected to nature.

Perspective Taking

Participant 18 illuminates a pattern common to many of the participants: they separate their personal feelings towards wolves and acknowledge that blame cannot be put onto the animals themselves. A voice actor who also is a farmer that raises chickens in the Italian countryside, P18 expressed a dislike for wolves (which he said applied to coyotes as well), yet still felt a sense of fascination and mystery about them and said he would like to see one. For

him, the issue was more with that fact that wolves, which are being reintroduced in Italy, could attack his hens. Nonetheless, he said that the danger posed to his chickens should not dictate his moral stance toward wolves:

> Well, I wouldn't say fuck wolves or fuck coyotes. I wouldn't think along those lines—it's their nature. The point is it's not really the fox's fault if a chicken is available; it's my fault for not securing the chicken. I have to take the responsibility of the chicken to make sure it's safe from animals and these foxes, and if I'm unable to do it in an animal hunting, that's nature. *I can't push my moral guidelines onto a wild animal.* (Emphasis added)

The interviewer asked if the participant's ability to take different perspectives in voice acting influenced his capacity to understand the animal's point of view, and he agreed that was the case. Many other of the respondents (P1, P3, P4, P7, P10, P12, P14, P16, P17, P18, P19) also stated that no matter what their emotional stance was, wild animals were not at fault for their own behavior. Therefore, the capacity for playfulness *could* lead to the ability to understand the experiences of other animals.

Limitations

There are many limitations to this study that should be considered outside of its small sample size. Due to it being administered in a Popperian fashion, it was meant to see if there was evidence that disproved the hypothesis, rather than gave evidence for it. That is why there was no control group. However, this is a fundamental flaw in the study, so it can only be seen in an exploratory light rather than a conclusive one.

Because of the time required to conduct interviews with 21 people, I had to select participants with whom I have connections. Although the interviewees did not necessarily know each other, the potential that the information was skewed due to including only people that I was familiar with (even if I just met them) means that I missed out on the personal philosophies of people I do not know. Interviewing more people whose livelihoods are at risk from wolves (like ranchers and hunters) would be helpful as well, as I only interviewed one current livestock owner. Seeing how much playfulness factors into their attitudes toward nature would add layers to the relationship between playfulness, connectedness to nature, and views of wild animals.

The study's questions regarding connectedness to nature and views of wild animals could be expanded as well. The connectedness to nature questions could have been rooted in cognitive connection to nature. An additional question, sent to all respondents who had completed their interviews, may be the best measure of connection to nature. The four wild animals I picked were either mammals or birds, but other animals could be included, such as snakes—charged archetypal symbols associated with the SEEKING system (Goodwyn, 2012)—and spiders, another great fear of ours and the only one not included in the study by Jürgens and her associates (Jürgens et al., 2022).

Future Directions for Research

The most important piece of evidence for future research is for a study like this to be conducted with a control group of non-playful people for comparison. Additionally, there should be further exploration into how connectedness to nature, as well as playfulness, mediates people's views of wild animals. We find that the two together produce a likelihood that wild animals will be viewed favorably or at least with tolerance, rather than just playfulness alone.

The primary piece of data that deserves further examination is how people's overt embrace of their animality may influence both their connectedness to nature and their views of wild animals. The responses of P6 and P21 hinted at this, but more information should be gathered. How playfulness is involved in this relationship is also important. Perhaps it could be demonstrated by studying whether people who have played *Stray* are more connected to their animality and to nature than people who have not. It might also be possible to do an overt manipulated study to determine if individuals' connections to their animality and to nature increase after playing *Stray*.

Although a great range of animal archetypes were studied, further research investigating Jung's ideas of how people relate to their animality and such archetypes would be of significant interest. Participant 15, for example, was drawn to the negative symbolism ascribed to crows, indicating that how people relate to their archetype and how that affects their view of the broader natural world should be investigated.

Conclusions

This study has demonstrated that there is no direct link between playfulness and connectedness to nature. However, the potential of playfulness to open one up to the natural world is necessary in mediating an individual's views of wild animals. Connection to nature is necessary—though not a guarantee—for one to like wild animals that represent the outer natural world. However, the argument that a Zarathustrian embrace of pure instinctual playfulness will connect one to animals does not seem to hold. Nonetheless, P6 and P21, while highly playful, were still mainly rationalistic about how they went about things. Participant 21 liked crows only for their intelligence, and whatever connection he had to the natural world was fully pragmatic and rationalistic. Participant 6, though spontaneous and impulsive, still tried to plan his whole

day and loathed indulgence and hedonism. Therefore, Nietzsche's argument about a full instinctual embrace may have merit if further tested, but for now it is generally unsupported.

The question of how much playfulness leads to an implicit resonance with one's animality is also hard to answer. The reason for this study's inception was the belief that playfulness is animalistic. The animality of human playfulness is still a topic of research in animal behavior and neuroscience. What can be theoretically gained from this is that some of the subjects did play as animals when they were children, they were connected to nature in some way as adults, and they all liked wolves. Yet it seems, as Nietzsche posited, that this is more of a transformation of animalistic playfulness than a use of playfulness itself. The association of playfulness with adaptability, exploration, and openness allows one to adapt to situations and turn life into play. Many animals, outside of certain ones like African wild dogs, will likely not do that as much. Some people (P4, P6, P16, P21) who were asked about this point did not view their playfulness as animalistic. Unconscious correlation is hard to pin down, and therefore further exploration of this topic should be done.

The bigger question is the embrace of animality itself. What was found is that viewing a stronger continuity between humans and animals that transcends mere acknowledgment that humans are animals goes beyond unconscious connection. Instead, the role of an overt resonance with animality such as the enjoyment of pretending to be an animal is something that is necessary in connecting one to nature and having a positive view of animals. Research going forward should investigate this further, and possibly how playfulness relates to it.

Appendices

Appendix A: Questions on Wild Animals

Complete all questions for one animal, then go to the next. All questions will be asked for each animal going from the left to right with wolves, then crows, then owls, then coyotes.

1. Have you had any personal experiences with wolves/crows/owls/coyotes?
2. Which feelings arise when you think about wolves/crows/owls/coyotes?
3. What is it about wolves/crows/owls/coyotes that evokes these thoughts and feelings?
4. Could wolves/crows/owls/coyotes stand as symbols for something? If so, for what?
5. Other people might see wolves/crows/owls/coyotes in a different light. What distinguishes you from these people? Why do you like/dislike wolves/crows/owls/coyotes while others dislike/like them?
6. On a scale of 1 to 7 with 1 being strongly dislike, 4 being neither like nor dislike, and 7 being strongly like, what do you think of wolves/crows/owls/coyotes?

Appendix B: Playfulness Questions

From here on I will ask you questions about playfulness from a scale of 1 (strongly disagree) to 4 (neither agree nor disagree) to 7 (strongly agree). However, I wish for you also to tell me why you gave that number to each.

1. How much as a child would you agree to the statement "I like to play pretend"?
2. When I was a child, I sometimes created imaginary worlds involving myself or others.
3. Sometimes, I act, role play, or pretend to be someone else for fun.
4. Sometimes, I become so immersed in a fictional world (i.e., novel, movie, video game) that it feels as if I were there.
5. I am always looking for opportunities that allow me to exercise my imagination.
6. I am often lost in my imagination.
7. I am curious about many different things and often seek out new hobbies or topics that interest me.
8. In the final account, a discussion is nothing other than playing with and an exchange of ideas.
9. I think of life as more of a playground than a battlefield.
10. I think life is more like a comedy than a tragedy.
11. I am a lighthearted person.
12. I like to smile and laugh as much as possible during the day
13. I appreciate fun things started by others.
14. I am usually one of first people to initiate fun activities when I'm with my friends.
15. I would much rather accept a job that is personally enjoyable than one with a high salary.

16. If one has a concrete task to perform, there is no room for playfulness. This only detracts from the work.

17. If one has a concrete task to perform, there is no room for playfulness. This only detracts from the work (Reverse scored).

18. I like to “swim against the stream.”

19. If I want to do something, I usually don’t let what other people may think stop me.

20. I like to act wild and crazy at times.

21. I often do things in the spur of the moment.

22. I often act on my impulses.

23. I am at ease in close or emotional relationships.

24. I get nervous when anyone gets too close (Reverse scored).

Appendix C: Questions on Connection to Nature

I will now ask you questions regarding connection to nature using the same scoring scale:

1. I think of the natural world as a community to which I belong.
2. When I think of my life, I imagine myself as a part of a cyclical process of living.
3. I often feel like I am a small part of the natural world around me, that I am no more important than the grass on the ground or the leaves on the trees.
4. I believe all beings share a common “life-force.”
5. I recognize and appreciate the intelligence of other living organisms.
6. I find watching birds and animals at natural parks to be a magical experience.
7. We should strive for a world where humans and fish and wildlife can live side by side without fear.
8. My personal welfare is independent of the natural world (Reverse scored).
9. Humans should make decisions on wildlife so that only humans benefit (Reverse scored).
10. Like a tree can be part of a forest, I feel embedded within the broader natural world.

References

Alcaro, A., & Carta, S. (2019). The “instinct” of imagination. A neuro-ethological approach to the evolution of the reflective mind and its application to psychotherapy. *Frontiers in Human Neuroscience*, *12*, 522.

Arnds, P. (2021). *Wolves at the door: Migration, dehumanization, rewilding the world*. Bloomsbury Publishing USA.

Bekoff, M., & Byers, J. A. (Eds.). (1998). *Animal play: Evolutionary, comparative and ecological perspectives*. Cambridge University Press.

Bennett, J. (2010). *Vibrant matter: A political ecology of things*. Duke University Press.

Bodnar, S. (2008). Wasted and bombed: Clinical enactments of a changing relationship to the earth. *Psychoanalytic Dialogues*, *18* (4), 484-512.

Brooke, R. (2000). *Pathways into the Jungian world: Phenomenology and analytical psychology.* London: Routledge.

Bukowick, K. E. (2004). *Truth and symbolism: Mythological perspectives of the wolf and crow* [Doctoral dissertation, Boston College]. https://dlib.bc.edu/islandora/object/bc-ir:102331/datastream/PDF

Burghardt, G. M. (2010). The comparative reach of play and brain: Perspective, evidence, and implications. *American Journal of Play*, *2*(3), 338-356.

Burghardt, G. M. (2015). Play in fishes, frogs and reptiles. *Current Biology*, *25*(1), R9-R10.

Cojocaru, M. D., & Cochrane, A. (2023). Solidarity with wild animals. *Ethics, Policy & Environment*, 1-19.

Demir, M. (2021). Perceived playfulness in same-sex friendships and happiness. *Current Psychology*, *40*(5), 2052-2066.

Egger, B. (2001). Raubtiere, mythologisch und tiefenpsychologisch betrachtet. *Forest Snow and Landscape Research*, *76*(1/2), 53-90.

Flores, D. (2016). *Coyote America: A natural and supernatural history*. Basic Books.

Forsythe, A. J. (2020). Owls and owl feathers in Native American culture. *Whispering Wind*, *48*(2), 16-24.

Gobby, B., Merewether, J., & Nykiel, A. (2021). Extinction, education and the curious practice of visiting thrombolites. *Environmental Education Research*, *27*(2), 217-233.

Goodwyn, E. D. (2012). *The neurobiology of the gods: How brain physiology shapes the recurrent imagery of myth and dreams*. Routledge.

Gray, P. (2011). The evolutionary biology of education: How our hunter-gatherer educative instincts could form the basis for education today. *Evolution: Education and Outreach*, *4*, 28-40.

Gray, P. (2014). The play theory of hunter-gatherer egalitarianism. In D. Narvaez, K. Valentino, A. Fuentes, J. J. McKenna, & P. Gray (Eds.), *Ancestral landscapes in human evolution: Culture, childrearing and social wellbeing* (pp. 192–215). Oxford University Press.

Harju, M. L., & Rouse, D. (2018). “Keeping some wildness always alive”: Posthumanism and the animality of children’s literature and play. *Children's Literature in Education*, *49*, 447-466.

Jung, C. G. (1964). Civilization in transition. In G. Adler (Ed.), R. F. C. Hull (Trans.), *The Collected Works of C. G. Jung* (Vol. 10). Essay, Princeton University Press.

Jung, C. G. (1969). The Archetypes of the Collective Unconscious. In G. Adler (Ed.), R. F. C. Hull (Trans.), *The Collected Works of C. G. Jung* (Vol. 9 Part 1). Essay, Princeton University Press.

Jung, C. G., & Jarrett, J. L. (1988). *Nietzsche's Zarathustra: Notes of the seminar given in 1934–1939*. Princeton University Press.

Jürgens, U. M., & Hackett, P. M. (2017). The big bad wolf: The formation of a stereotype. *Ecopsychology*, *9*(1), 33-43.

Jürgens, U. M., & Hackett, P. M. (2021). Wolves, crows, and spiders: An eclectic literature review inspires a model explaining humans' similar reactions to ecologically different wildlife. *Frontiers in Environmental Science*, *9*, 593501.

Jürgens, U. M., Hackett, P. M., Hunziker, M., & Patt, A. (2022). Wolves, crows, spiders, and people: A qualitative study yielding a three-layer framework for understanding human–wildlife relations. *Diversity*, *14*(8), 591.

Kellman, J., & Radwan, K. (2022). Towards an expanded neuroscientific understanding of social play. *Neuroscience & Biobehavioral Reviews*, *132*, 884-891.

Kimmerer, R. (2013). *Braiding Sweetgrass: Indigenous wisdom, scientific knowledge and the teachings of plants*. Milkweed Editions.

Leopold, A. S. (1949). *A Sand County Almanac and sketches here and there...illustrated by Charles W. Schwartz*. Oxford University Press.

Marzluff, J. M., & Angell, T. (2007). *In the company of crows and ravens*. Yale University Press.

Massumi, B. (2014). *What animals teach us about politics*. Duke University Press.

Mayer, F. S., & Frantz, C. M. (2004). The connectedness to nature scale: A measure of individuals' feeling in community with nature. *Journal of Environmental Psychology*, *24*(4), 503-515.

Midgley, M. (1974). The game game. *Philosophy*, *49*(189), 231-253.

Nadasdy, P. (2007). The gift in the animal: The ontology of hunting and human-animal sociality. *American Ethnologist*, *34*(1), 25-43.

Nietzsche, F. (1974). *The gay science: With a prelude in rhymes and an appendix of songs* (Vol. 985). Vintage.

Nietzsche, F. W. (1995). *Thus spoke Zarathustra* (W. Kaufmann, Trans.). Penguin Books.

Nietzsche, F. W. (2002). *Beyond good and evil* (J. Norman, Trans.). Cambridge University Press.

Nietzsche, F. (2003). *Nietzsche: Writings from the late notebooks* (K. Sturge, Trans.). Cambridge University Press.

Nietzsche, F. (2023). *The birth of tragedy: from the spirit of music*. Weimar Press.

Nishitani, K. (1982). *Religion and nothingness* (J. Van Bragt, Trans.). University of California Press.

Orlie, M. A. (2014). For the love of earthly life: Nietzsche and Winnicott between modernism and naturalism. In N. Kompridis (Ed.), *The aesthetic turn in political thought* (169-187). Bloomsbury Academic.

Orlie, M. A. (2017). The psychoanalytic Winnicott we need now: On the way to a real ecological thought. In M. Bowker & A. Buzby (Eds.), *D.W. Winnicott and political theory: Recentering the Subject* (pp. 87-109). Palgrave MacMillan.

Palagi, E. (2023). Adult play and the evolution of tolerant and cooperative societies. *Neuroscience & Biobehavioral Reviews*, *148*. https://doi.org/10.1016/j.neubiorev.2023.105124

Panksepp, J. (2007). Can PLAY diminish ADHD and facilitate the construction of the social brain? *Journal of the Canadian Academy of Child and Adolescent Psychiatry*, *16*(2), 57.

Pellis, S. M., & Burghardt, G. M. (2017). Play and exploration. In J. Call, G. M. Burghardt, I. M. Pepperberg, C. T. Snowdon, & T. Zentall (Eds.), *APA handbook of comparative psychology: Basic concepts, methods, neural substrate, and behavior* (pp. 699–722). American Psychological Association.

Proyer, R. T. (2014). To love and play: Testing the association of adult playfulness with the relationship personality and relationship satisfaction. *Current Psychology*, *33*, 501-514.

Proyer, R. T., & Ruch, W. (2011). The virtuousness of adult playfulness: The relation of playfulness with strengths of character. *Psychology of Well-Being: Theory, Research and Practice*, *1*(1), 1-12.

Rose, D. B. (2017). Shimmer: When all you love is being trashed. In A. L. Tsing, H. A. Swanson, E. Gan, & N. Bubandt (Eds.), *Arts of living on a damaged planet: Ghosts and monsters of the Anthropocene* (pp. 51-63). University of Minnesota.

Shen, X., Chick, G., & Pitas, N. A. (2017). From playful parents to adaptable children: A structural equation model of the relationships between playfulness and adaptability among young adults and their parents. *International Journal of Play*, *6*(3), 244-254.

Teel, T. L., Manfredo, M. J., Jensen, F. S., Buijs, A. E., Fischer, A., Riepe, C., ... & Jacobs, M. H. (2010). Understanding the cognitive basis for human-wildlife relationships as a key to successful protected-area management. *International Journal of Sociology*, *40*(3), 104-123.

Winnicott, D. W., Caldwell, L., & Robinson, H. T. (2016). *The collected works of D.W. Winnicott*. Oxford University Press.

Yu, P., Wu, J. J., Chen, I. H., & Lin, Y. T. (2007). Is playfulness a benefit to work? Empirical evidence of professionals in Taiwan. *International Journal of Technology Management*, *39*(3-4), 412-429.