“The Power of Awe: A Sense of Wonder Promotes Loving-kindness” CHRISTOPHER BERGLAND (2015)

<https://www.psychologytoday.com/us/blog/the-athletes-way/201505/the-power-awe-sense-wonder-promotes-loving-kindness>

A new study found that experiencing a sense of **awe promotes altruism, loving-kindness, and magnanimous behaviour.**

The researchers describe awe as **“that sense of wonder we feel in the presence of something vast that transcends our understanding of the world.”**

People commonly experience awe in **nature,** but also feel a sense of awe in response to **religion, art, music, etc.**

Awe may **encourage people to forgo strict self-interest to improve the welfare of others.** When experiencing awe, you may not, egocentrically speaking, feel like you're at the center of the world anymore.

Awe would trigger tendencies **to engage in prosocial behaviors** that may be costly for you but that benefit and help others.

Marghanita Laski found that the most common triggers for **transcendental ecstasies** come from nature. In particular her survey revealed **that** **water, mountains, trees, and flowers; dusk, sunrise, sunlight; dramatically bad weather and spring were often a catalyst for feeling ecstatic.** (*Laski classified an experience as an “ecstasy” if it contained two of the three following descriptions: unity, eternity, heaven, new life, satisfaction, joy, salvation, perfection, glory; contact, new or mystical knowledge; and at least one of the following feelings: loss of difference, time, place, of worldliness... or feelings of calm, peace.”)*

Peak experiences are described by Abraham Maslow as “especially **joyous and exciting moments** in life, involving sudden feelings **of intense happiness and well-being, wonder and awe**, and possibly also involving an awareness of transcendental unity or knowledge of higher truth (as though perceiving the world from an altered, and often vastly profound and awe-inspiring perspective)."

John Muir, Ralph Waldo Emerson, Henry David Thoreau, and William James have all found inspiration in the **transcendent power of nature.**

In his 1836 essay Nature, which sparked the Transcendentalist movement, Ralph Waldo Emerson wrote: “In the presence of Nature a wild delight runs through the man in spite of real sorrow. Not the sun or the summer alone, but every hour and season yields its tribute of delight; for every hour and change corresponds to and authorizes a different state of mind, from breathless noon to grimmest midnight. Crossing a bare common, in snow puddles, at twilight, under a clouded sky, without having in my thoughts any occurrence of special good fortune, I have enjoyed a perfect exhilaration.”

In his essay, Walking, Henry David Thoreau (who was Emerson’s neighbor) said that he spent more than four hours a day out of doors in motion. Ralph Waldo Emerson commented of Thoreau, **“The length of his walk uniformly made the length of his writing. If shut up in the house, he did not write at all.”**

When John Muir was thirty, he visited **Yosemite** for the first time and was **awestruck**. He described the awe of being in Yosemite for the first time writing : “Everything was glowing with heaven’s unquenchable enthusiasm…I tremble with excitement in the dawn of these glorious mountain sublimities, but I can only gaze and wonder. Our camp grove fills and thrills with the glorious light. Everything awakening alert and joyful. . . Every pulse beats high, every cell life rejoices, the very rocks seem to thrill with life. The whole landscape glows like a human face in a glory of enthusiasm. The mountains, the trees, the air were, effused, joyful, wonderful, enchanting, banishing weariness and a sense of time.”

<https://www.nps.gov/yose/index.htm> (Visit this link to know more about Yosemite)

Muir’s ability to experience the awe of nature and sense of oneness with the **mountains and trees,** led to a deep **mystical appreciation**, and eternal devotion to "Mother Earth" and conservation.

Conclusion from Bergland

I reside in Provincetown, Massachusetts now. The **quality of light** and the **ever changing sea and sky** surrounding Provincetown elicit a constant sense of wonder. Living close to the National Seashore and wilderness on Cape Cod makes me feel **connected to something bigger than myself** that puts the human experience in perspective in a way that makes me feel humbled and blessed.

As the father of a 7-year-old, I worry that growing up in a digital "Facebook age" might lead to a disconnection from nature and a sense of wonder for my daughter's generation and those to follow. **Will a lack of awe cause our children to be less altruistic, prosocial, and magnanimous?** If left unchecked, could a dearth of awe inspiring experiences result in less loving-kindness in future generations?

Piff and colleagues summed up their findings on the **importance of awe** in their report saying: **“Awe arises in evanescent experiences.** Looking up at the **starry expanse of the night sky**. Gazing out across **the blue vastness of the ocean**. Feeling amazed at **the birth and development of a child**. **Protesting at a political rally** or **watching a favorite sports team live**. Many of the experiences people cherish most are triggers of the emotion we focused on here—awe. Our investigation indicates that awe, although often fleeting and hard to describe**, serves a vital social function.** By diminishing the emphasis on the individual self, awe may encourage people to forego strict self-interest to improve the welfare of others. Future research should build on these initial findings to further uncover the ways in which awe shifts people away from being **the center of their own individual worlds, toward a focus on the broader social context and their place within it.**

“Experiencing versus contemplating: Language use during descriptions of awe and wonder” Darbor, K E, Lench, H C, Davis, W E & Hicks, J, A. (2016)

<https://www.researchgate.net/publication/278330828_Experiencing_versus_contemplating_Language_use_during_descriptions_of_awe_and_wonder/download>

**Awe was related to observing the world.**

**Wonder was related to trying to understand the world.**

Language used for both emotions reflected an **environmental focus.**

(p.1188)

Awe involves feelings of **vastness and need for accommodation of novel stimuli.**

Promotes openness to incredibly **positive experiences** (e.g. panoramin views) as well as incredibly **negative experiences** (e.g. exploding volcanoes).

Such experiences are generally associated **with passive receptivity and a sense of smallness**.

(p.1189)

Although research is limited, early theories proposed that **wonder is associated with curiosity,** and involves an **impulse to approach and contemplate.**

This would suggest that the experience of **wonder is more cognitive in nature than the experience of awe** and reflects a **need to understand something in the environment.**

(pp.1189-1190)

Perception – focus on the environment should mean people are **using their senses to gather information.**

(p. 1190)

Awe and wonder are unique in that they **encourage people to disengage from their normal focus on the self and the social world, and instead take in the world around them.**

(pp. 1193-1194)

How to wonder are awe compare?

**When describing awe,** people focused mainly on **perception and observing** novelty in their environment. This conception of awe as a perceptual emotion **may enable people to change their existing views of the world, and better adapt to new experiences.**

**When describing wonder,** people focused on **understanding** the novelty in their environment. This conception of wonder as an emotion concerned with causation **may enable people to better understand reasons behind new experiences and thus optimise their interactions with the world.**

(p.1194)

Relation to recent findings -

**Awe increases perception of time by bringing people into the present**.

**Awe decreased tolerance for uncertainty**, and consequently **increases supernatural beliefs and judgements of intentional design.**

**Wonder was associated with uncertainty,** consistent with the idea that people experiencing awe might attempt to reduce or downplay any uncertainty.

(p.1194)

“All About Awe” ANNA MIKULAK (2015)

<https://www.psychologicalscience.org/observer/all-about-awe>

Keltner and Haidt proposed two essential aspects shared by experiences **of awe: vastness and need for accommodation.** Gives us a sense of vastness, seeming much larger than us and the things we are used to, whether physically or metaphorically. Doesn’t conform to our existing way of thinking about the universe.

Awe isn’t signalled by smiling but rather **by raised eyebrows, widened eyes, a dropped jaw, and visible inhalation.**

**Evolutionary perspective** – awe may reflect the fundamental emotional response that low-rank group members have in the presence of a powerful group leader.

Awe may **alter how we evaluate the persuasiveness of an argument**. **Should dampen our reliance on cognitive shortcuts when making judgements.**

Rudd, M, Aaker, J, and Vohs, K, hypothesized in 2012 that if a feeling of awe enables us to process rich information from our environment, it should focus our attention on what is happening in the present moment, **thereby expanding our sense of time.**

Research indicates that it also prompts us to think in more **self-transcendent ways**, shifting our focus from **inward concern to an outward sense of universality and connectedness**.

Research has revealed a unique association between feeling **awe and religiosity or spirituality**. Awe may be linked to religiosity and spirituality through another form of appraisal**: uncertainty.**

Awe is a very powerful trigger of **prosocial behaviour**. In an experiment, students were asked to look up at either a tall building or a huge stand of eucalyptus trees. The experimenter then purposefully tripped over and dropped his things. The students who looked up at the trees helped the experimenter much more when he dropped his things, than the students who looked up at the building, which was considered less awe-inspiring that than the trees.

Awe-inspired participants in their study reported feeling **less impatient and more willing to volunteer their time** to a charity than did participants who were induced to feel happy.

Awe may boost our individual **well-being and amplify the savouring of pleasurable moments**.

**Alice Baker - My analysis of the research –**

We may be able to induce a feeling of our and wonder for our players if we’re able to create assets that show a vast landscape. By showing mountains in the distance, a vast open ocean, tall towering trees, waterfalls and any other environmental features, this could immerse the player into the environment with a feeling of connectedness.

By having features in the game that transcends the players understanding of the natural world, this can create a sense of awe when they discover something they’ve never seen before, e.g. colourful patterned seeds and shells, unusually shaped trees, unique creatures, etc.

We can explore how we can use religiosity/spirituality, art and music to induce feelings of awe and wonder.

Things in nature such as water, mountains, trees, and flowers; dusk, sunrise, sunlight; dramatically bad weather and spring were often a catalyst for feeling ecstatic. We may not be able to induce ecstasy in our game but if we use these features, we can create awe and wonder.

We can use reward systems to create a joyful and exciting experience, which is a part of feeling ecstatic.

We can attempt a constant state of wonder by having assets change regularly, this may happen with the change of seasons and weather – the sea may become rougher or calmer, clouds may appear, etc.

In a rising digital age, we may become less altruistic, prosocial, and magnanimous without awe-inspiring experiences. Our audience who may be missing out on nature and awe, can get involved with our game to reconnect with nature.

We can explore different senses to encourage players to perceive the environment in a particular way. Flowers may have a particle effect or artwork that shows it radiating with a pleasant smell that insects are attracted to.