

Nature is Good For You

With summer and beautiful weather finally here, we recommend you spend some time outdoors. Did you know the average Canadian spends 87% of their life indoors, and another 6% in enclosed vehicles?¹ That means the average Canadian only spends 7% of their life outside. Often when we read statistics like this what follows is a discussion regarding how to counteract the perils of pollutant exposure in an age of urbanization. Fair enough. But what happens to us when we spend that 7% of our time outside? What benefits do we gain by being in nature, and should we spend more time outside? The answer is a resounding “yes,” and the benefits are legion. There is a strong body of research that concludes nature offers one of the most reliable boosts to your mental health and physical well-being. In fact, simply having access to green space is an important predictor of mental health, regardless of age, socio-economic status or gender.²

Some of the many benefits of green space include, stress reduction, improved cognitive functioning, enhanced self-confidence and even an improved immune system.³ There is also research that demonstrates that by simply taking a 40 minute walk in the park you can experience improved mood, feelings of vigor, lower blood pressure and lower levels of the stress hormone cortisol.⁴ In other words, you can actually improve your health and well-being, and possibly your law practice vicariously, by simply taking a walk in the park. Moreover, there are no known side effects to what some call “nature therapy.” It is readily available, and it’s free!

The vanguard of nature therapy originated in Japan, where the approach is known as “Shinrin-yoku”, or “forest bathing.” It means “taking in the forest atmosphere through all of our senses.”⁵ Forest bathing has become a cornerstone of preventative health care and healing in Japan. The prescription is simple, visit a natural area, walk in a relaxed manner, and you will experience calming, rejuvenating and restorative benefits. Opening our senses to nature also encourages us to find new ways to connect to the world around us.

Reduced stress and improved cognitive functioning

Although it may be intuitive to many, there is empirical evidence that spending time in nature can also leave one feeling more centered and focused. In one study, 38 University of Michigan students participated in a cognitive based task. They were then randomly assigned to take a 50 minute walk, either

¹ Klepesis, N. E. et al. (2001). The National Human Activity Pattern Survey. Ernest Orlando Lawrence Berkeley National Library.

² Guite, H.F., Clark, C. & Ackrill, G. (2006). The impact of the physical and urban environment on mental well-being. *Public Health*, 120, 1117-1126.

³ Song, C., Ikei, H. & Miyazaki, Y. (2016). Physiological Effects of Nature Therapy: A Review of the Research in Japan. *International Journal of Environmental Research and Public Health*, 13, 781.

⁴ Shelhub, E, & Logan A. (2013). Your Brain on Nature: Forest Bathing and Reduced Stress. Mother Earth News.

⁵ Song et al. (2016).

on a tree lined path in a local park secluded from traffic and people, or downtown along a route lined with university and office buildings, surrounded by heavy traffic. The participants were then asked to repeat the cognitive based task after their walks. It was found that performance significantly improved when participants walked in nature, but not when they walked downtown.⁶ In fact, even looking at pictures of nature improves cognitive functioning. In another study, participants were given a mentally fatiguing sustained attention test, and then shown photographs of either restorative environments, nonrestorative environments, or geometric patterns. They were then asked to perform the mentally fatiguing sustained attention task again. The results showed that only those exposed to the restorative environments improved their performance on the final attention test.⁷ Other studies demonstrate that experiences in natural environments not only help mitigate stress, but can also prevent it by improving focus and attention, and restoring concentration potential.^{8 9}

Finally, a study evaluating the impact of park and forest visits on stress levels and headaches reported an 87% overall recovery rate from stress, and a 52% reduction in headaches following visits to the two settings.¹⁰ All of this is fine and good, but what about those occasions when you are having a stressful day at the office and cannot find the time to get outside? No problem. Research shows that office workers exposed to flowers experience physiological and psychological relaxing effects.¹¹ So, even if you are not able to get outside for a walk in nature, there is some value to bringing nature to you.

Improved immune system and cardiovascular health

You can also improve your physical health by being in nature. Research demonstrates that visiting a forest boosts your immune system by increasing the number and activity of the super cells that fight off cancer cells, suggesting that spending time in the forest may have a preventative effect on cancer.¹² However, it is important to be aware that field experiments evaluating the physiological benefits of forest walking have found that the benefits are not the same compared to walking in an urban setting. The results of a study comparing the physiological benefits of walking in a forest versus in an urban environment indicated that a forest walking program has the most significant positive influence on

⁶ Berman, M.G., Jonides, J. & Kaplan, S. (2008). The Cognitive Benefits of Interacting with Nature. *Psychological Science*, 19(12), 1207-1212.

⁷ Berto, R. (2005). Exposure to restorative environments helps restore attentional capacity. *Journal of Environmental Psychology*, 25(3), 249-259.

⁸ Kaplan, S. (1995). The restorative benefits of nature: Toward an integrative framework. *Journal of Environmental Psychology*, 15, 169-182.

⁹ Berman et al. (2008).

¹⁰ Hansmann, R., Hug, S.M., & Seeland, K. (2007). Restoration and stress relief through physical activities in forests and parks. *Urban Forestry & Urban Greening*, 6(4), 213-225.

¹¹ Harumi, I., Komatsu, M., Song, C., Himoro, E., & Miyazaki, Y. (2014). The physiological and psychological relaxing effects of viewing rose flowers in office workers. *Journal of Physiological Anthropology*, 33(6), 1-5.

¹² Li, Q. (2010). Effect of forest bathing trips on human immune function. *Environmental Health Preventative Medicine*. 15(1), 9-17.

cardiovascular relaxation. These trends were comparable to results found with meditation or yoga therapies. Moreover, participants experienced less negative mood states such as tension, anxiety, anger, hostility, fatigue, and confusion. They also reported feeling more comfortable, natural, and refreshed after forest walking compared to those who walked in an urban environment.¹³ The benefits of nature are so powerful that even viewing images of nature can positively influence physical and mental health. At Uppsala University Hospital in Sweden, 160 patients who had undergone heart surgery were randomly allocated to a visual condition consisting of either pictures of nature, such as water and vegetation, an abstract picture dominated by either straight lines or curving forms, or a control condition with either a white panel or no picture. Results showed that individuals exposed to the view of water and vegetation experienced less post-operative anxiety than the control groups and those exposed to the other pictures. Furthermore, those patients with the water and vegetation views were able to transition from strong pain medication to moderate pain medication more quickly than the other groups.¹⁴

Improved mood

Depression is a common mental disorder, and the leading cause of disability worldwide.¹⁵ Spending more time in nature can be a preventative way to maintain mental health and proactively take charge of our physical well-being. This is because research has shown that stress levels fall within minutes of being in green spaces, particularly when active, such as walking, gardening or cycling. Moreover, being in nature not only improves our mood but also boosts self-esteem.¹⁶

Be a role model for our youth

There are many additional reasons why we should be spending more time outdoors. We are ruled by technology and our children are no different. Screen addiction is real. The average Canadian youth spends seven hours and 48 minutes a day in front of a screen.¹⁷ Note that this is the “average,” which means there are kids getting a lot more screen time. This adds up to more time over the course of a week than most parents spend at work. Carving out time with our families to get outdoors not only benefits our physical and mental health, and our relationships, but in doing so we become active role models for changing our children’s behaviour, and contributing to their health and well-being as well.

So, how much time will you spent outside today? If you feel it is not enough, be sure to make the time to go outside and reap the multitude of benefits offered by nature. Consider spending some time

¹³ Lee, J., et al. (2014). Influence of Forest Therapy on Cardiovascular Relaxation in Young Adults. *Evidence-Based Complementary and Alternative Medicine*, 2014, 1-7.

¹⁴ Ulrich, R. (1984). View through a window may influence recovery from surgery. *Science*, 224,420(2); Ulrich, R.S. (2002). Health Benefits of Gardens in Hospitals. Paper for conference, *Plants for People*.

¹⁵ World Health Organization, Media Centre, Fact sheet updated February, 2017.

¹⁶ Barton J. & Pretty, J. (2010). What is the Best Dose of Nature and Green Exercise for Improving Mental Health? A Multi-Study Analysis. *Environmental Science and Technology*, 44(10), 3947-55.

¹⁷ Active Healthy Kids Canada Report Card on Physical Activity For Children And Youth (2012).

walking in a forest or park every day. Go untethered, no phone, no camera, no goals, other than to wander. Be quiet. Be still and observe. Observe how wildlife changes as it becomes accustomed to your presence. Use all of your senses to bathe in the experience. In the hours after your walk, ask yourself if you notice any changes or lasting effects. If you decide the benefits of being in nature outweigh the effort it takes to get outside, then make the outdoors a regular part of your life. Nature. It's good for you.