

Abstracts: Nature, Love and Joy

1) Nature and Health

Terry Hartig, Richard Mitchell, Sjerp de Vries, and Howard Frumkin. Annual Review of Public Health 2014, 35:207-228.

Abstract: Urbanization, resource exploitation, and lifestyle changes have diminished possibilities for human contact with nature in urbanized societies. Concern about the loss has helped motivate research on the health benefits of contact with nature. Reviewing that research here, we focus on nature as represented by aspects of the physical environment relevant to planning, design, and policy measures that serve broad segments of urbanized societies. We discuss difficulties in defining “nature” and reasons for the current expansion of the research field, and we assess available reviews. We then consider research on pathways between nature and health involving air quality, physical activity, social cohesion, and stress reduction. Finally, we discuss methodological issues and priorities for future research. The extant research does describe an array of benefits of contact with nature, and evidence regarding some benefits is strong; however, some findings indicate caution is needed in applying beliefs about those benefits, and substantial gaps in knowledge remain.

2) Humans and Nature: How Knowing and Experiencing Nature Affect Well-Being

Roly Russell, Anne D. Guerry, Patricia Balvanera, Rachelle K. Gould, Xavier Basurto, Kai M.A. Chan, Sarah Klain, Jordan Levine, and Jordan Tam. Annual Review of Environmental Resources 2013, 38:473-502.

Abstract: Ecosystems provide many of the material building blocks for human well-being. Although quantification and appreciation of such contributions have rapidly grown, our dependence upon cultural connections to nature deserves more attention. We synthesize multidisciplinary peer reviewed research on contributions of nature or ecosystems to human well-being mediated through non-tangible connections (such as culture). We characterize these connections on the basis of the channels through which such connections arise (i.e., knowing, perceiving, interacting with, and living within) and the components of human well-being they affect (e.g., physical, mental and spiritual health, inspiration, identity). We found enormous variation in the methods used, quantity of research, and generalizability of the literature. The effects of nature on mental and physical health have been rigorously demonstrated, whereas other effects (e.g., on learning) are theorized but seldom demonstrated. The balance of evidence indicates conclusively that knowing and

experiencing nature makes us generally happier, healthier people. More fully characterizing our intangible connections with nature will help shape decisions that benefit people and the ecosystems on which we depend.

3) Biological Diversity and Public Health

Aaron S. Bernstein. Annual Review of Public Health 2014, 35:153-167.

Abstract: In the wake of a species extinction event unprecedented in human history, how the variety, distribution, and abundance of life on earth may influence health has gained credence as a worthy subject for research and study at schools of public health and for consideration among policy makers. This article reviews a few of the principal ways in which health depends on biodiversity, including the discovery of new medicines, biomedical research, the provision of food, and the distribution and spread of infections. It also examines how changes in biological diversity underlie much of the global burden of disease and how a more thorough understanding of life on earth and its relationships has the potential to greatly alleviate and prevent human suffering.