

The Health Benefits of Nature Contact: Implications for Land Conservation in King County

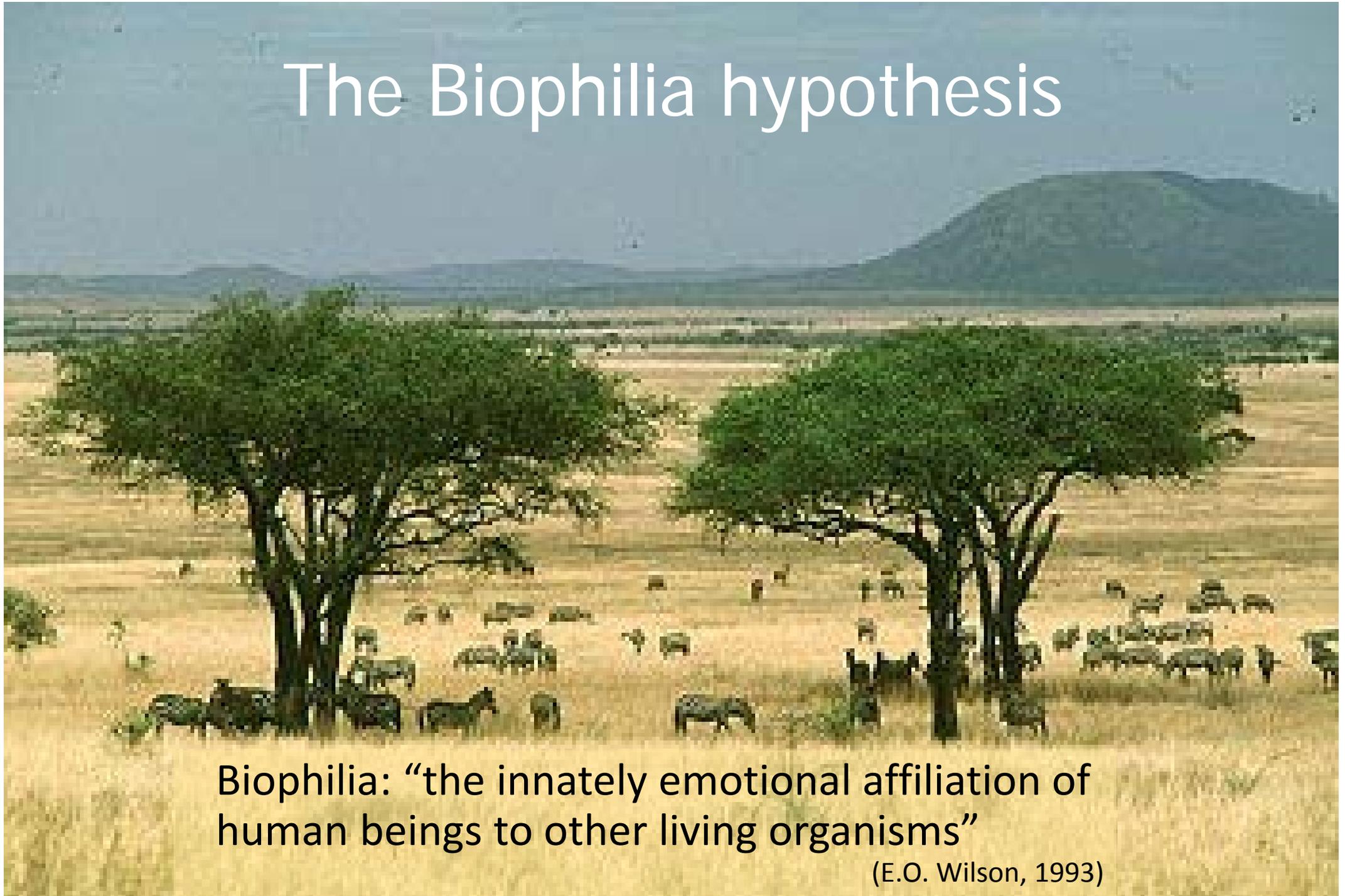
County Executive's Advisory Group on Land Conservation
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The Biophilia hypothesis



Biophilia: “the innately emotional affiliation of human beings to other living organisms”

(E.O. Wilson, 1993)

Health benefits of nature contact



REDUCED
STRESS



IMPROVED
SLEEP



REDUCED
DEPRESSION
AND
ANXIETY



GREATER
HAPPINESS

Health benefits of nature contact



REDUCED
AGGRESSION



REDUCED
ADHD
SYMPTOMS



PROSOCIAL
BEHAVIOR

Health benefits of nature contact



LOWER
BLOOD
PRESSURE



SMOOTHER
POST-
SURGICAL
RECOVERY



BETTER
BIRTH
OUTCOMES



IMPROVED
PAIN
CONTROL

Health benefits of nature contact



LESS
OBESITY



REDUCED
DIABETES



BETTER
EYESIGHT



+/-
ASTHMA &
ALLERGY
EFFECTS

Health benefits of nature contact



IMPROVED
HEALTH IN
CANCER
PATIENTS



BETTER
GENERAL
HEALTH



LONGER LIFE
EXPECTANCY

Children With Attention Deficits Concentrate Better After Walk in the Park

Andrea Faber Taylor
Frances E. Kuo
University of Illinois, Urbana-Champaign

ORIGINAL ARTICLE Green spaces and adverse pregnancy outcomes

Keren Agay-Shay,^{1,2,3} Ammatzia Peled,⁴ Antonia Valentin Crespo,^{1,2,3} Chava Peretz,⁵ Yona Amitai,⁶ Shai Linn,⁷ Michael Friger,⁸ Mark J Nieuwenhuijsen^{1,2,3}

ABSTRACT Objective The objective of this study was to evaluate the associations between proximity to green spaces and the surrounding greenness and pregnancy outcomes, such as birth weight, low birth weight (LBW), very LBW (VLBW).

What this paper adds
► There is scant information about the impact of

Richardson et al. BMC Public Health 2010, 10:240
http://www.biomedcentral.com/1471-2458/10/240



RESEARCH ARTICLE

The association between green space and cause-specific mortality in urban New Zealand: an ecological analysis of green space utility

Elizabeth Richardson¹, Jamie Pearce¹, Richard Mitchell², Peter Day³ and Simon Kingham⁴

Neighborhood Greenness and Chronic Health Conditions in Medicare Beneficiaries

Scott C. Brown, PhD,^{1,2} Joanna Lombard, MArch,^{1,2} Kefeng Wang, MS,¹ Margaret M. Byrne, PhD,¹ Matthew Toro, MA,³ Elizabeth Plater-Zyberk, MArch,^{1,2} Daniel J. Feaster, PhD,³ Jack Kardys, MSM,³ Maria I. Nardi, MArch,³ Gianna Perez-Gomez, PhD,¹ Hilda M. Pantin, PhD,¹ José Szapocznik, PhD^{1,2}

Introduction: Prior studies suggest that exposure to the natural environment may impact health. The present study examines the association between objective measures of block-level greenness

Research report

Morbidity is related to a green living environment

J. Maas,¹ R.A. Verheij,² S. de Vries,³ P. Spreeuwenberg,² F.G. Schellevis,² P. Groeneweg^{2,4}

ABSTRACT Background: As a result of increasing urbanisation, people face the prospect of living in environments with few green spaces. There is increasing evidence for a positive relation between green space in people's living environment and self-reported indicators of physical and mental health. This study investigates whether physical

These studies indicate that there is a relation between green space and self-reported general indicators of physical and mental health. Thus, people living in greener environments report better physical and mental health. The decrease in green space could therefore have health consequences. However, it remains unknown whether living in



Contents lists available at ScienceDirect
Environmental Research
journal homepage: www.elsevier.com/locate/envres

Green space and mortality following ischemic stroke
Elissa H. Wilker^{a,b,*}, Chih-Da Wu^{b,c}, Eileen McNeely^b, Elizabeth Mostofsky^a, John Spengler^b, Gregory A. Wellenius^d, Murray A. Mittleman^{a,b}

ABSTRACT
Background: Residential proximity to green space has been associated with physical and mental benefits, but whether green space is associated with post-stroke survival has not been studied.
Methods: Patients ≥ 21 years of age admitted to the Beth Israel Deaconess Medical Center

Contents lists available at SciVerse ScienceDirect
Journal of Affective Disorders
journal homepage: www.elsevier.com/locate/jad

Preliminary communication
Interacting with nature improves cognition and affect for individuals with depression
Marc G. Berman^{a,b,*}, Ethan Kross^b, Katherine M. Krpan^b, Mary K. Askren^b, Aleah Burson^b, Patricia J. Deldin^b, Stephen Kaplan^b, Lindsey Sherdell^c, Ian H. Gotlib^c, John Jonides^b

ABSTRACT
Background: Interacting with nature has been associated with improved cognitive and affective functioning. However, it remains unclear whether interacting with nature improves cognition and affect for individuals with depression.

NEW RESEARCH
Environmental Determinants of Aggression in Adolescents: Role of Urban Neighborhood Greenspace
Diana Younan^{1,2,3}, Catherine Turblad^{1,2}, Lianfa Li^{1,2}, Jun Wu^{1,2}, Fred Lurmann^{1,2}, Meredith Franklin^{1,2,3,4}, Kiroos Berhane^{1,2,3,4}, Rob McConnell^{1,2,3,4}, Anna H. Wu^{1,2,3,4}, Laura A. Baker^{1,2,3,4}, Jiu-Chuan Chen^{1,2,3,4}

Objective: Neighborhood greenspace improves mental health and long-term outcomes.

Diabetes Care Volume 37, January 2014
Is Neighborhood Green Space Associated With a Lower Risk of Type 2 Diabetes? Evidence From 267,072 Australians
Thomas Astell-Burt^{1,2}, Xiaojie Feng³ and Gregory S. Kolt⁴

Contents lists available at ScienceDirect
Health & Place
journal homepage: www.elsevier.com/locate/healthplace

The impact of children's exposure to greenspace on physical activity, cognitive development, emotional wellbeing, and ability to appraise risk
Jonathan S. Ward^{a,*}, J. Scott Duncan^b, Aaron Jarden^b, Tom Stewart^a

ABSTRACT
Introduction: The current study utilised objective techniques to investigate the relationship between children's time spent in greenspace (open land covered in grass or other vegetation) with various physical and psychological variables: parental relationship between physical activity and greenspace with study completion, emotional wellbeing, sensation seeking tendencies, ability to appraise risk, and cognitive development are investigated.

You need the TREATMENT to get the CURE





Implications for land conservation in King County: A Public Health perspective

1. Strategic selection of land to be conserved
 - Accessibility to people
2. Consider not just “hardware” but also “software”
 - Transportation, restrooms, safety
 - Programming
 - Integration with education
3. Partnerships
 - e.g. faith organizations, community organizations
 - e.g. medical organizations, health agencies
 - e.g. technology companies
4. Demanding accountability of conserved land
 - Measuring human health benefits
5. Communication



Seurat (*Sunday Afternoon at La Grande Jatte*)

Thank
you!