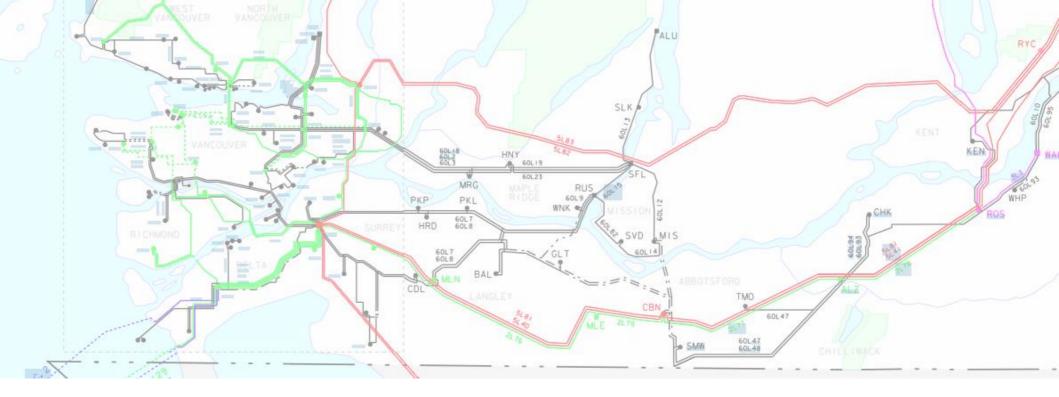


# **GREEN CONNECTIONS Building healthy urban corridors**

**Nancy Skipwith McLean** 

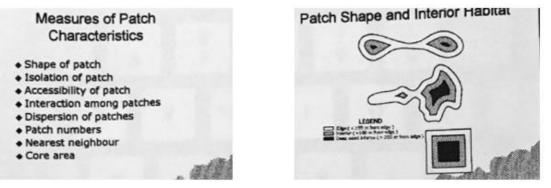


### **GREEN LINKS APPROACH** – understanding what to do:

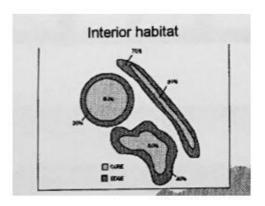
**Research** – biodiversity, connectivity, hedgerows, water quality, biophysical inventories

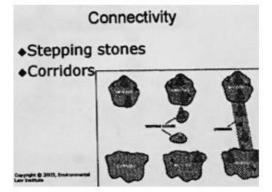
Stewardship – plantings, clean-ups, removal of invasive species, bird and bat boxes

Education – workshops, publications, podcasts, signage, murals, Earth Day, UN Sustainable development goals, art trails



# **OPPORTUNITIES FOR CONNECTIVITY**





### **Stream riparian corridors**

Utility right of way and grounds of treatment plants Hedgerows

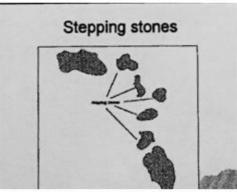
### neugerows

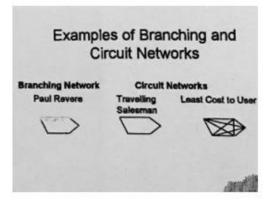
**Farm Fields** 

## **Cemeteries and golf courses**

Parks and land reserves Backyard and balcony habitats

School grounds







## **BENEFITS OF CONNECTIVITY**

- More robust food webs
- Larger breeding populations
- **Greater interbreeding of populations**

Improved nature's services (air quality, water quality and green space)



### **Vancouver Area Importance**

**On Pacific Flyway – 1.5 million waterfowl + shorebirds visit annually** 

Old field habitat on delta with voles for hawks, owls, and eagles

Fraser River supports world's largest salmon run

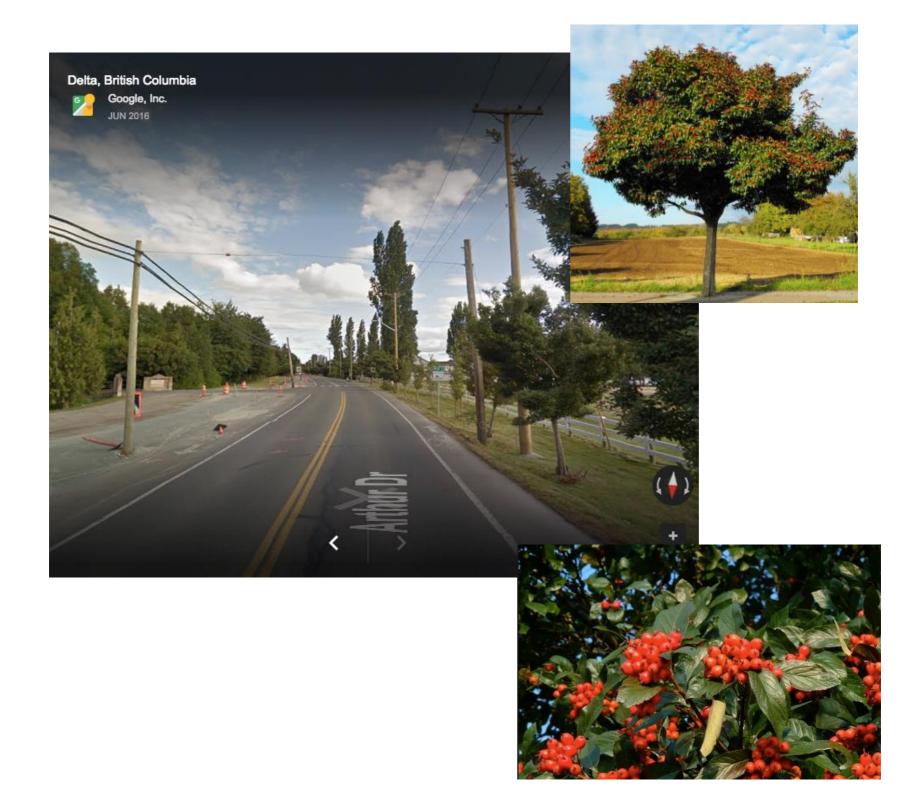
High ecosystem diversity supports high species diversity

# Lawrence and the Rain Garden











# **GREEN CONNECTIONS Building healthy urban corridors**

**Robin Clark** 

















# **GREEN CONNECTIONS Building healthy urban corridors**

Sylvia Grace Borda, founder C.A.R.E climatearts.ca **The Design Challenge** 

**landscapes + legacies** 



**The Design Challenge** 

# CONTEXT

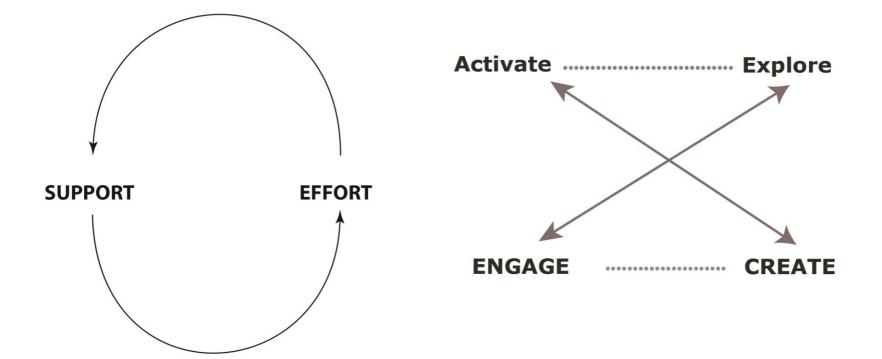
**Finding solutions** 







The Design Challenge Finding solutions Creating legacies



# ACTIVATE ENGAGE CREATE











Atklāj Latviju no jauna Like This Page · September 30, 2018 · 🔇

Aizputē āboli pat uz māju sienām aug! Gleznojums atrodas blakus mākslinieku rezidenču centram "Serde" un tas atspoguļo vienu no mazpilsētas vērtībām - ābeļdārzus un ābolus. #atklaj /Oto 😳 III Liena Grošteina See Translation

00 841		1 Comment 210 Shares		
(	ப் Like	Comment	A Share	
Most	Relevant -			
4	Līga Ailt	īga Ailte How very very beautiful		
487	Like · Re	ply · See Original (Latvi	an) · 15w	
		Translate All Commen	its	
0	Write a	comment	00	

•••



**The Design Challenge** 

**Promoting wider land ideas + values** 

### Can you prescribe nature?

By Helen Briggs BBC News

() 8 July 2015



"Here's your prescription, walk in the forest five times a week for an hour."

A team at Stanford University compared the effects of taking a nature walk through a greenspace with a stroll in an urban environment - in this case beside a busy road in Palo Alto.

Brain scans showed reduced activity in an area of the brain linked to risk of mental illness in participants who took a 90-minute walk among oaks, birds and squirrels.

We evolved with nature and it's completely unnatural for us to be separated from it Nigel Dunnett,, University of Sheffield

They also reported lower levels of rumination.

Gregory Bratman of Stanford University, one of the researchers on the study, says moving to cities has "happened in a blink of an eye in terms of human evolution".

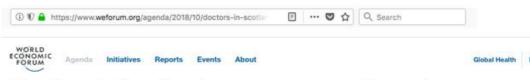
As he points out, never before have so many of us been removed from nature already 50% of the global population lives in towns and cities; a figure that is projected to rise to 70% by 2050.

Some cities and nations are already thinking about the mental health benefits of nature when designing urban areas.

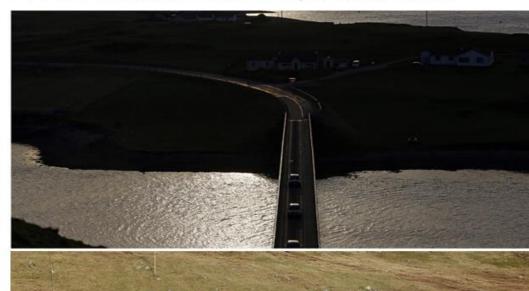
"There's an increasing body of evidence showing that natural versus urban areas benefit us at least emotionally with our mood and possibly also our cognitive development too," says Mr Bratman.

"You could think of these mental health benefits of nature as a psychological ecosystem service."

The Stanford University team is looking at ways to tease apart the "active ingredients" of the nature experience to find ways to bring nature into the city.



### Doctors in Scotland can now prescribe nature



CAPE Canadian Association of Physicians for the Environment Association Canadianne des Médecins pour l'Environnement ACME





CANADIAN ABBOCIATION PUBLIC HEALTH CANADISINNE DE ASSOCIATION SANTÉ PUBLIQUE

The Voice of Public Health La voix de la santé publique



URBAN PUBLIC HEALTH NETWORK

RÉSEAU POUR LA SANTÉ PUBLIQUE URBAIN



ASSOCIATION DES INFIRMIÈRES (T INFIRMIERS DU CANADA »

### Call to Action on Climate Change and Health: From Canada's Health Professionals to Canada's Federal Political Parties

February 5, 2019

This Call to Action comes from doctors, nurses, medical officers of health and public health professionals across Canada.

We are calling on all federal political parties in Canada to see **climate change** as we, and the World Health Organization, see it—as "**the greatest health threat of the 21**" **century**." <sup>1</sup> We are asking you to see **climate solutions** as we, and the prestigious medical journal, *The Lancet*, see them – as "**the greatest health opportunity of this century**".<sup>2</sup> Many of the policies needed to fight climate change will produce immediate health benefits, reduce healthcare costs, and improve social cohesion and equity in our communities.

We are calling on each of you to make meaningful and effective action on climate change a central theme of your party's platform as you prepare for this year's federal election.

Climate change is already harming the physical and mental health of Canadians.

Cardiorespiratory impacts from worsening air pollution due to wildfires left many Canadians coughing and cooped up inside in recent summers.<sup>3</sup> <sup>4</sup> Emergency evacuations and population displacement from wildfires and floods have been associated with trauma and post-traumatic stress disorder.<sup>1</sup> <sup>a</sup> In the Canadian Arctic, where temperatures have increased by up to 3°C from the 1950s,<sup>2</sup> health risks are increasing from food insecurity resulting from decreased access to traditional Indigenous foods.<sup>a</sup> Meanwhile, Lyme disease has spread into new regions in Canada<sup>a</sup> and more intense and prolonged pollen seasons have the potential to exacerbate hay fever and asthma.<sup>10</sup>

Over the last two decades, Canada has seen a dramatic increase in the costs of extreme weather events such as hurricanes, floods, and wildfires. The Insurance Bureau of Canada reports that claims for natural disasters such as floods and wildfires have grown from \$400 million per year in previous decades to approximately \$1 billion per year today, while government funding for flood damage and other disasters has increased steadily from about \$100-million per year two decades ago to \$2 billion per year in 2013-14.<sup>11</sup>



CAPE Canadian Association of Physicians for the Environment

Association Canadienne des Médecins pour l'Environnement ACME



HEALTH

# Canadian Doctors Are About to Start Prescribing Art For Patients' Health

CARLY CASSELLA 3 NOV 2018

An unconventional new initiative in Canada will soon allow doctors to literally prescribe art to their patients - by giving them free access to a local museum.

Wandering through the Montreal Museum of Fine Arts (MMFA), these patients and their loved ones will be able to feast their eyes on the soothing properties of art.

The initiative is the first of its kind in the world. And while you certainly can't replace a conventional treatment with a couple of paintings, the idea is for such 'prescriptions' to assist a person's current treatment plan.

It may look a lot like a marketing effort for the museum (and it's possible there's an element of promotion in this) but there's also increasing evidence that the display of visual art, especially if it's depicting nature, can have positive effects on health outcomes.

In some ways, the benefits of looking at art appear a little similar to physical activity. A systematic review of clinical art therapy found that visual art has significant and positive effects on depression, anxiety, mood, trauma, distress, coping ability, and self-esteem.

Findings like these are slowly gaining traction in the medical community, making artwork a higher priority in hospitals around the world.

In the US, <u>nearly half</u> of all health care institutions have reported including art in health care programming, such as art therapy and the placement of visual art in hospitals.

With spaces dedicated to art therapy and also a medical consultation room, the MMFA already provides services for people with mental health issues, eating disorders, <u>autism spectrum</u> disorder, epilepsy and Alzheimer's disease, just to name a few.

So far over 100 doctors from MFdC have signed up to the pilot program.

Nicole Parent, head of the MFdC, <u>said</u> these numbers just go to show that even physicians have "a sensitivity and openness to alternative approaches."

# **SUSTAINABLE G**



# **GREEN CONNECTIONS**

# **Building healthy urban corridors**

- **1.** Contextualizing the land use challenge
- **2. Introducing the tools**
- 3. Designing solutions, researching options
- 4. Discussing next steps community and regional engagement

5. Partnering - Neighborhood residents, stakeholders, designers, artists, solar installers/experts/companies, architects, landscape architects, university partners, developers, climate change advocates, municipal government representatives, regional land bodies and garden groups contribute add to the project's development

# 6. Building processes

- 7. Creating legacies
- 8. Launching the site

9. Training communities, educators, students, regional bodies to maintain, care, evolve the project outcomes

# Nancy Skipwith McLean, ASLA, BCSLA, CSLA Landscape Architect and Planner

https://ca.linkedin.com/in/nancy-skipwith-mclean-65a5a086

Robin Clark, RPF, ATE, QEP Natural Resource Management Consultant www.rbc.bc.ca



Sylvia Grace Borda, MFA, Women4Climate Change Founder || C.A.R.E – Climate Arts for Resilient Environments climatearts.ca