

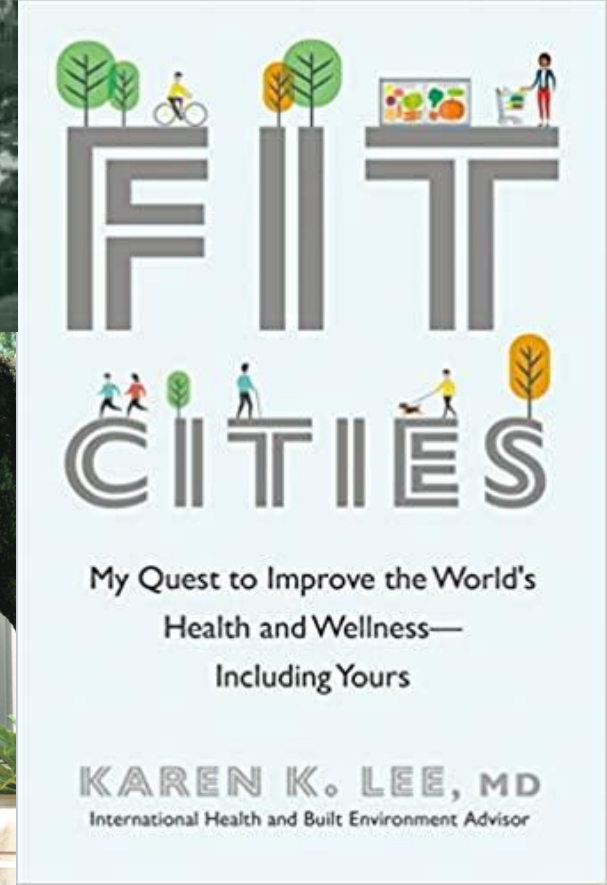
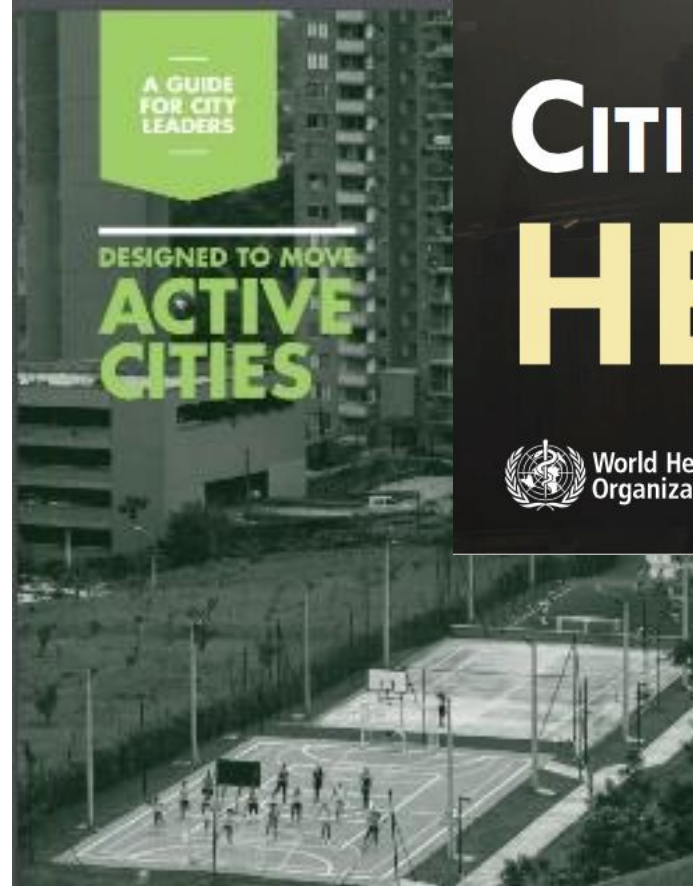


# Making Neighbourhoods and Buildings Healthier through the Healthy Community Guidelines

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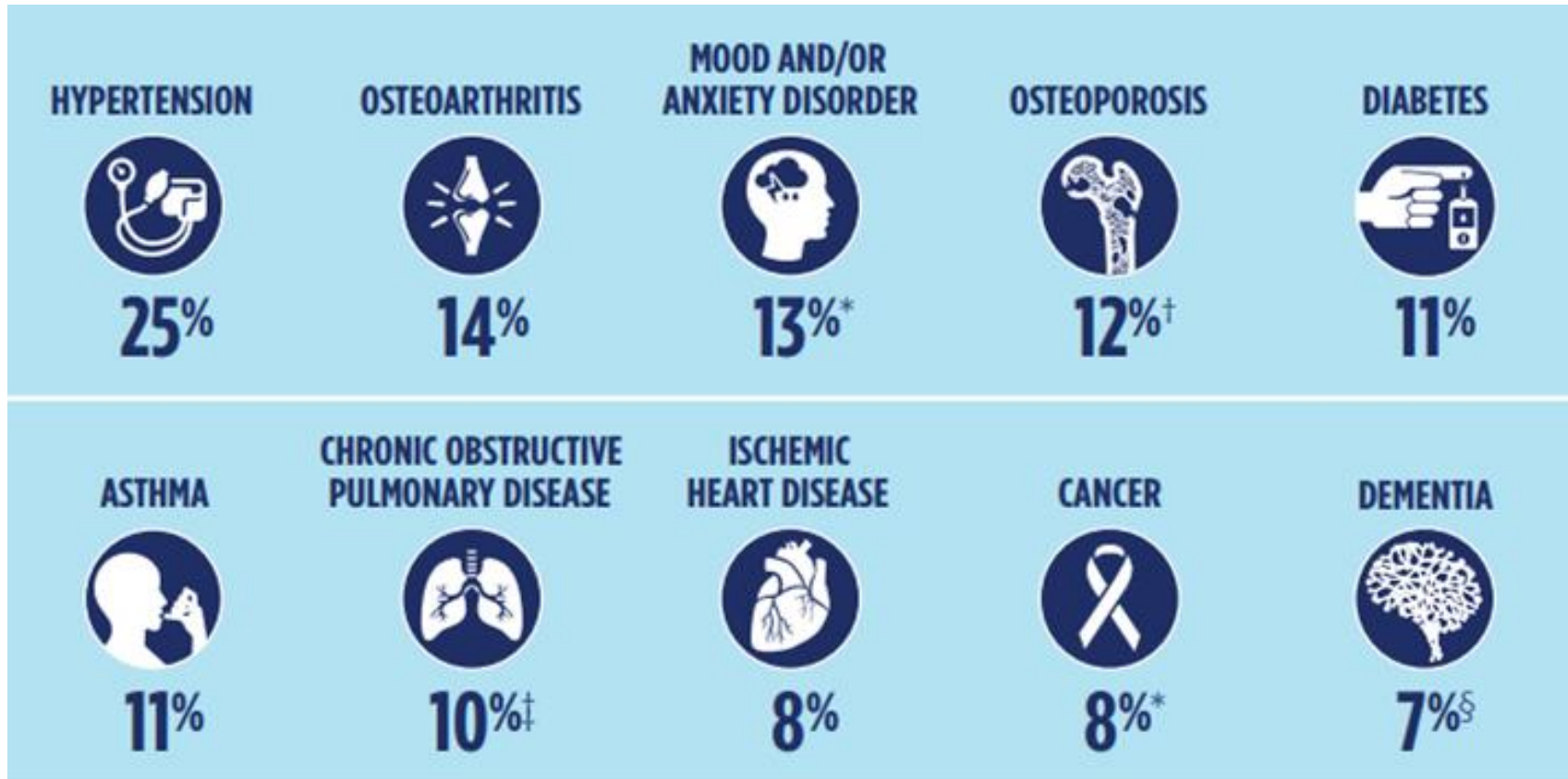
<http://www.uab.ca/h4h>

FOOD  
RETAIL  
EXPANSION to  
SUPPORT  
HEALTH



# High Burdens of Chronic Conditions in Canada

44% of Canadian adults 20 years and over have at least 1 of 10 chronic conditions.



## Non-Communicable Diseases (including Heart Disease & Strokes, Cancers, Diabetes, Chronic Lung Disease)

Chronic Diseases - **#1 cause of death globally (41 million deaths/y; 74% of deaths).**

Leading Risk Factors accounting for large % of deaths:

- Tobacco
- Harmful use of Alcohol
- **Physical Inactivity**
- **Unhealthy Diets**
- **High Blood Pressure**
- **Overweight and Obesity**
- **High Blood Fats e.g., Cholesterol**
- **High Blood Sugar**



## Chekroud et al. (2018) - [10.1016/S2215-0366\(18\)30227-X](https://doi.org/10.1016/S2215-0366(18)30227-X)

- Individuals who exercised had **43.2% fewer days of poor mental health.**
- **All exercise types** were associated with a **lower mental health burden.**
  - largest associations were seen for team sports (socialization), cycling, and gym activities.

## Schuch et al. (2018) - <https://doi.org/10.1176/appi.ajp.2018.17111194>

- Compared with people with low levels of **physical activity**, those with **high levels had lower odds of developing depression.**
- Physical activity had a **protective effect** against the **emergence of depression** in **youth, adults, and elderly persons.**

## SOCIAL FACTORS CONTRIBUTING TO MULTIPLE HEALTH PRIORITIES: SOCIAL ISOLATION AND LACK OF SOCIAL SUPPORT

“...**belonging support** characterized by interaction with friends, family, and other groups was a **consistent predictor** of self reported disease outcomes (included **diabetes, hypertension, arthritis and emphysema**) in elderly populations”

Robin and Uchino (2008) found that “those who had **lower social involvement** were **1.5 times more likely to have a first MI [heart attack]**”

# Successes of Improving Environments to Address Health and Wellbeing in Other Jurisdictions



## New York City: Health-related Improvements in <1 decade of efforts

- Childhood obesity trends reversed (Philadelphia and San Diego also)
- Bicycle travel increased 126% (while traffic fatalities decreased ~30%)
- “No Physical Activity in Last 30 Days” - significant decline after no change in previous decade
- Life expectancy 2.2 years longer and increasing faster than the rest of the U.S. (due in large part to Improved Chronic Disease Outcomes)
- Improved retail sales and decreased retail vacancies

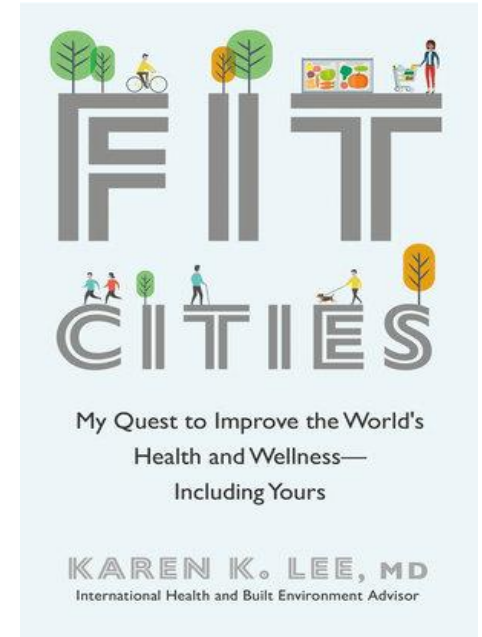
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[https://www.frontiersin.org/articles/10.3389/fpubh.2016.00060/full?&utm\\_source=Email\\_to\\_authors&utm\\_medium=Email&utm\\_content=T1\\_11.5e1\\_author&utm\\_campaign](https://www.frontiersin.org/articles/10.3389/fpubh.2016.00060/full?&utm_source=Email_to_authors&utm_medium=Email&utm_content=T1_11.5e1_author&utm_campaign) – see Table 1 for interventions

Sekhobo J, Edmunds L, Whaley S, Koleilat M. Obesity prevalence among low-income, preschool-aged children. *MMWR Morb Mortal Wkly Rep.* 2013; 62(2):17-22.

Li W, Maduro GA, Begier EM. Increased life expectancy in New York City, 2001-2010: an exploration by cause of death and demographic characteristics. *J Public Health Manag Pract.* 2016; 22(3):255-64.

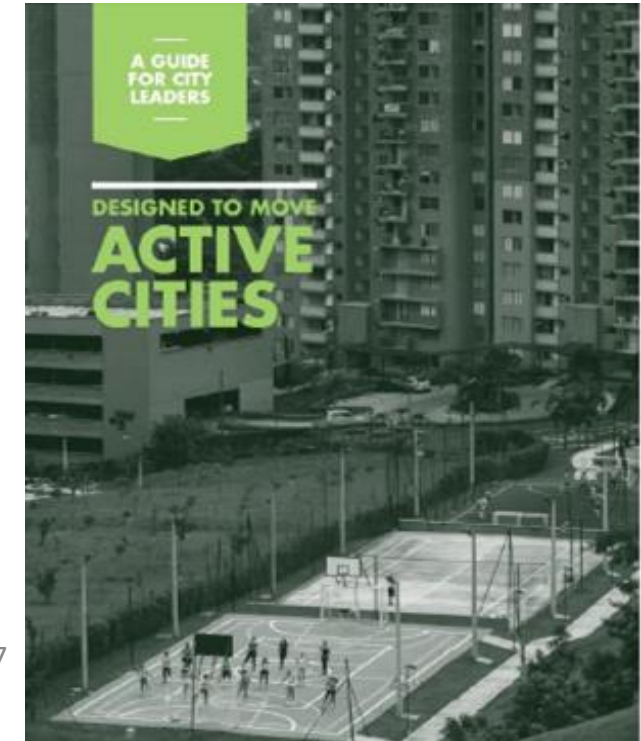
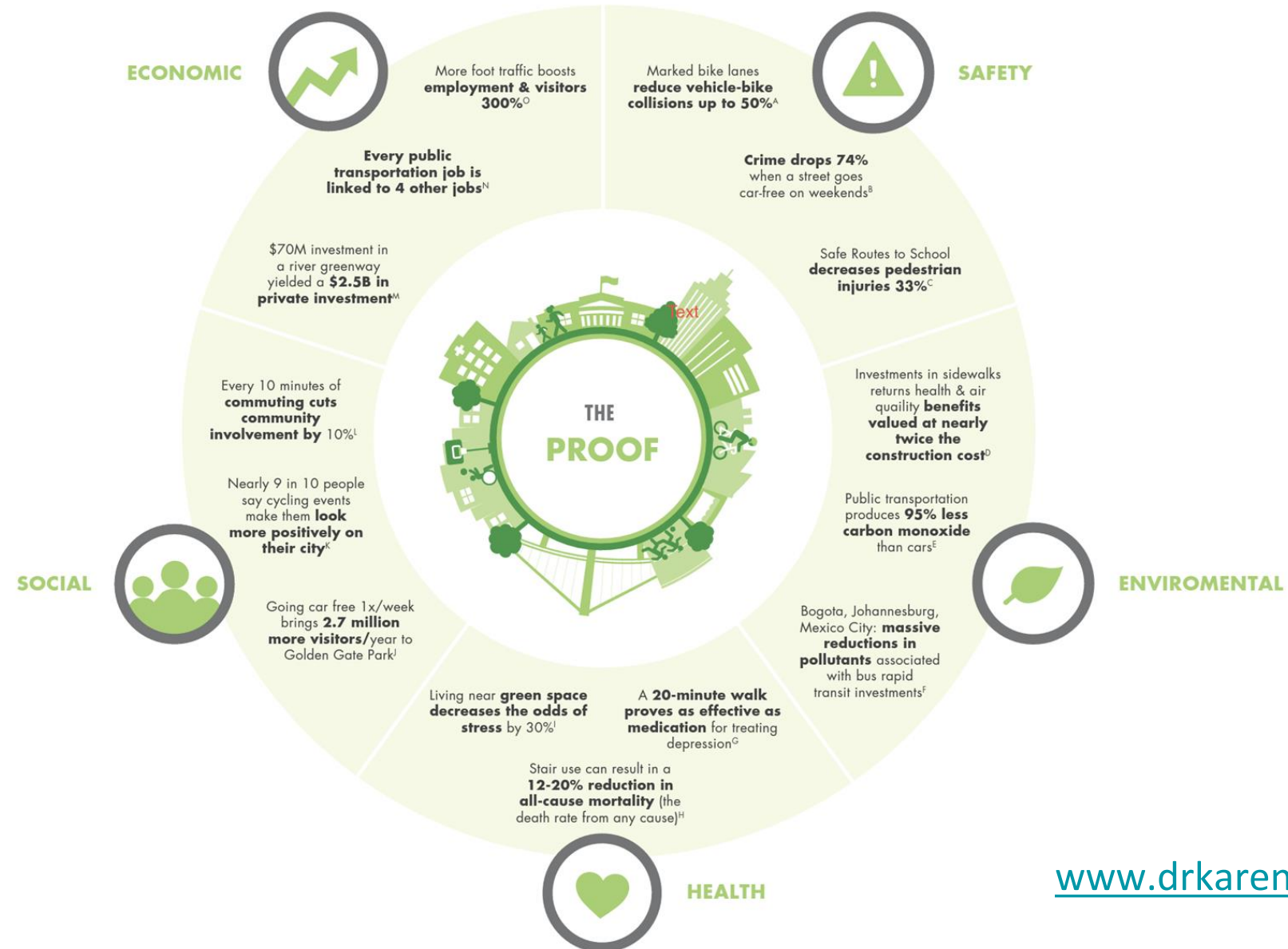
Bartley KF, Eisenhower DL, Harris TG, Lee KK. Accelerometer and survey data on patterns of physical inactivity in New York City and



**Columbia University  
(NYC) – *Designing  
Healthy Cities* (2day  
June course annually)**

[www.drkarenlee.com](http://www.drkarenlee.com)

# Co-Benefits of Healthier Communities



7



## Healthier Affordable Housing and Housing Neighbourhoods

The cost differences between the original and use of **Active Design Guideline strategies** ranged from a *savings* of **\$128,219** (a **0.5%** savings in development costs) to an increase of **\$280,064** (0.4% of total development costs).

See <http://www.drkarenlee.com/resources/usa>

<http://www.drkarenlee.com/resources/peel>

<http://www.drkarenlee.com/projects/>





## Housing for Health

1. Knowledge Sharing – [Fit Cities Fit Towns Canada Conference \(FCFT\)](#) 2021, 2022, 2023.
2. Community Engagement - Workshops and events with community residents to create healthier environments together.
3. Pilot Housing Developments - Demonstrating healthier buildings, sites, and neighbourhoods:
  - Edmonton (pop. ~ 1 m; affordable)
  - Leduc (pop. ~35,000; mixed income)
  - Whitecourt (pop. ~10,000; market rate)
4. Partnerships >250 Multi-Sector Partners (AB, BC, SK, MB, ON and QC)



[Healthy Community Guidelines](#) ([www.uab.ca/hcg](http://www.uab.ca/hcg)) released July 2023

[Healthier Food and Beverage Guidelines for Public Events](#) released July 2022

5. Research and Evaluation - [Publications](#) available at: <http://www.uab.ca/h4h>

## 3 Pilot Development Interventions in Alberta, Canada

- Edmonton (pop. ~1 million) – affordable housing, urban
- Leduc (pop. ~36,000) – mixed-income housing, suburban
- Whitecourt (pop. ~10,000) – market-rate housing, small town

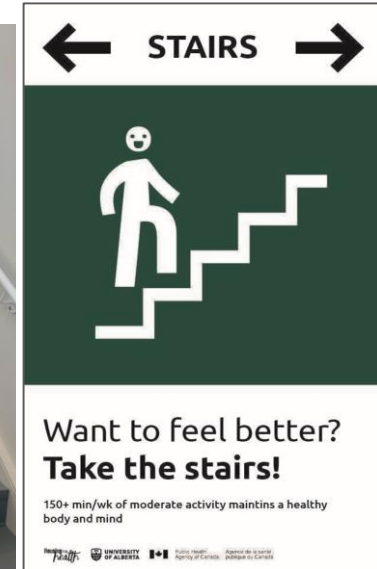
### The H4H team worked with:

- **Development and Architecture teams** – on healthy design and amenity features at the building and site scales.
- **Towns and Cities** – on healthy design and amenity features at the neighbourhood scale.



# Pilot Housing Development Interventions

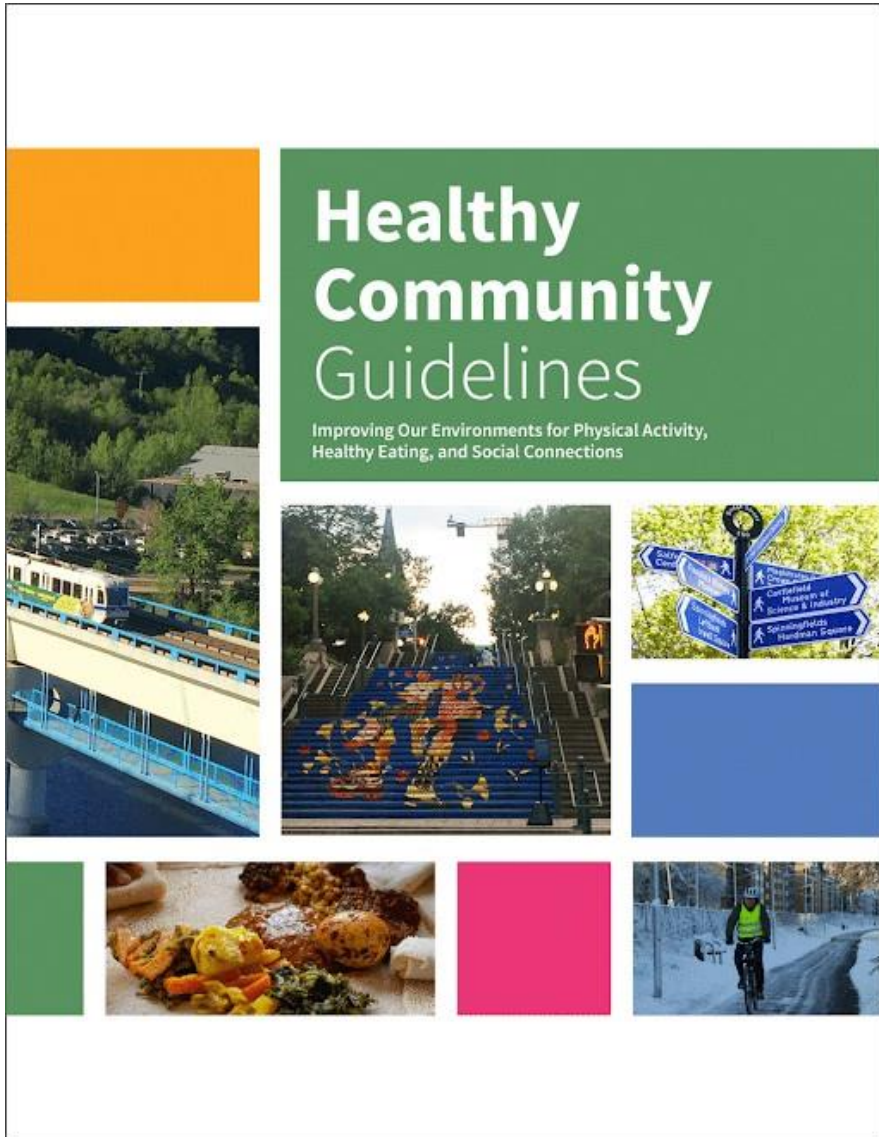
- Well-lit, pleasant, accessible, & visible stairwells (e.g., glass on stair doors, finished stairwells with art).
- Signage encouraging stair use at elevator lobbies and outside stairwells.
- Walking Maps onsite showing access to nearby neighbourhood healthy amenities.
- Gardening boxes and amenities.
- Looped walking trails onsite and nearby.
- Improving safety and supports for walking to healthy amenities in the neighbourhood (e.g., longer pedestrian crossing lights for seniors).





# Housing for Health Partnership Products:

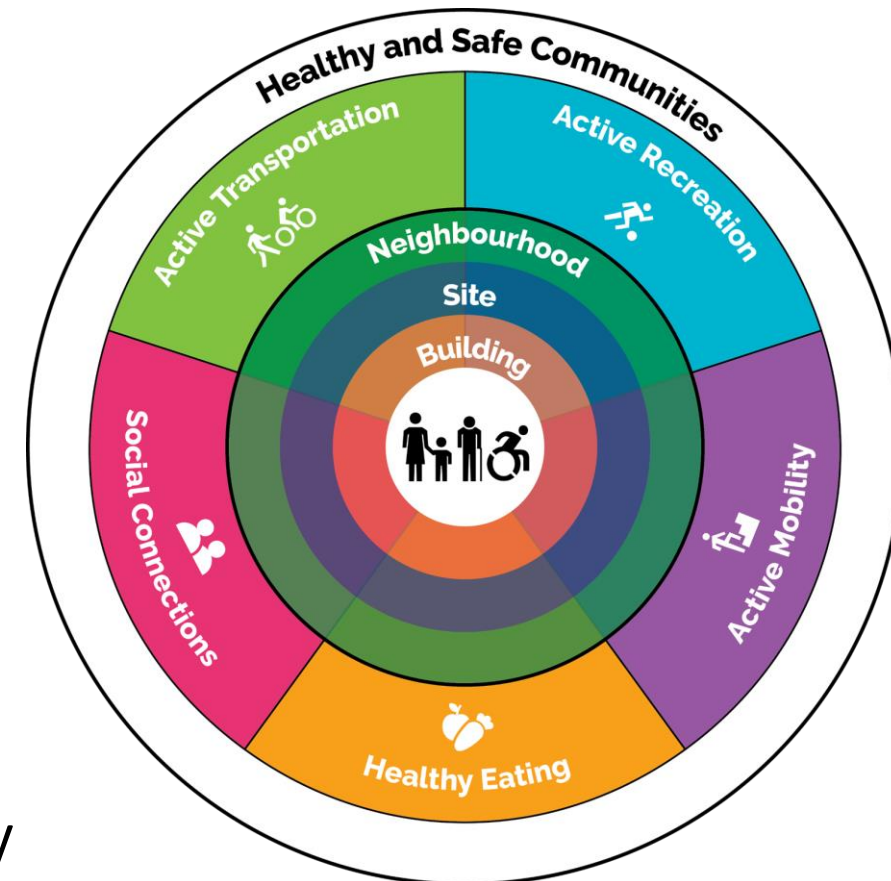
## Healthy Community Guidelines



- Created by 150+ Multi-Sector partners across Canadian provinces
- Strategies to support Healthier Neighbourhoods, Sites, and Buildings
- Available in English and French
- Available at [www.uab.ca/hcg](http://www.uab.ca/hcg)

# Healthy Community Guidelines (HCG)

- **Goal:** To improve **Physical Activity, Healthy Eating/Access to Healthy Foods and Beverages, and Social Connections** through healthier **neighbourhoods, streets, sites and buildings**.
- **Purpose:** Provide **evidence-based** and **practitioner-informed** strategies for planning, developing, designing, building, and maintaining communities, streets, buildings and building sites through a health and wellbeing lens.
- **Target Audience:** Municipal Officials, Policymakers, Developers, Homebuilders, Facility Operators, Planners, Architects and Designers, Health Professionals, Community Residents, etc.



## HCG Subgroups:

1. Neighbourhoods & Streets
2. Building & Interiors Spaces
3. Healthy Food Environments
4. Social Connections
5. Rural & Smaller Municipalities
6. Indigenous Health & Wellbeing
7. People of All Abilities

## Health-Protective Factors:

### Physical activity

including **active transportation**,  
**active recreation** and **active mobility**

**Healthy eating**/healthy food and  
beverage environments

**Social connections** and inclusion



Image link: <https://www.skillsyouneed.com/ips/teams-groups-meetings.html>





## Evidence-based and Practice-informed



Total Physical Activity



Active Transportation



Active Mobility



Active Recreation



Social Connections



Healthy Eating



Medical Conditions








Supported by  $\geq 50\%$  of Moderate-High Quality Systematic Reviews



Supported by  $< 50\%$  of Moderate-High Quality Systematic Reviews,  
or Only One Moderate-High Quality Systematic Review




Supported By Some Primary Studies  
(Mixed / Inconclusive in Moderate-High Quality Systematic Reviews)

- Ensure healthy mixed-use that promotes physical activity and/or social connections, including:
  - Have active transportation amenities including pedestrian, bicycling, and public transit infrastructure... to connect residential areas with community amenities for people of all abilities. 
- Food retail... carries produce... as well as other healthy foods and beverages... 
- Sidewalks or paths should: Ensure continuity of pathways that connect to each other and lead to destinations with gridded or modified grid patterns... on small block sizes. 
- Active recreation spaces from improved underutilized public or private spaces. 
- Other culturally appropriate physical activity and socialization spaces, including for different ethno-cultural groups such as indigenous peoples (e.g., space for powwow dancing). 

## On-Site Landscape Design:

The site should have all of the following:

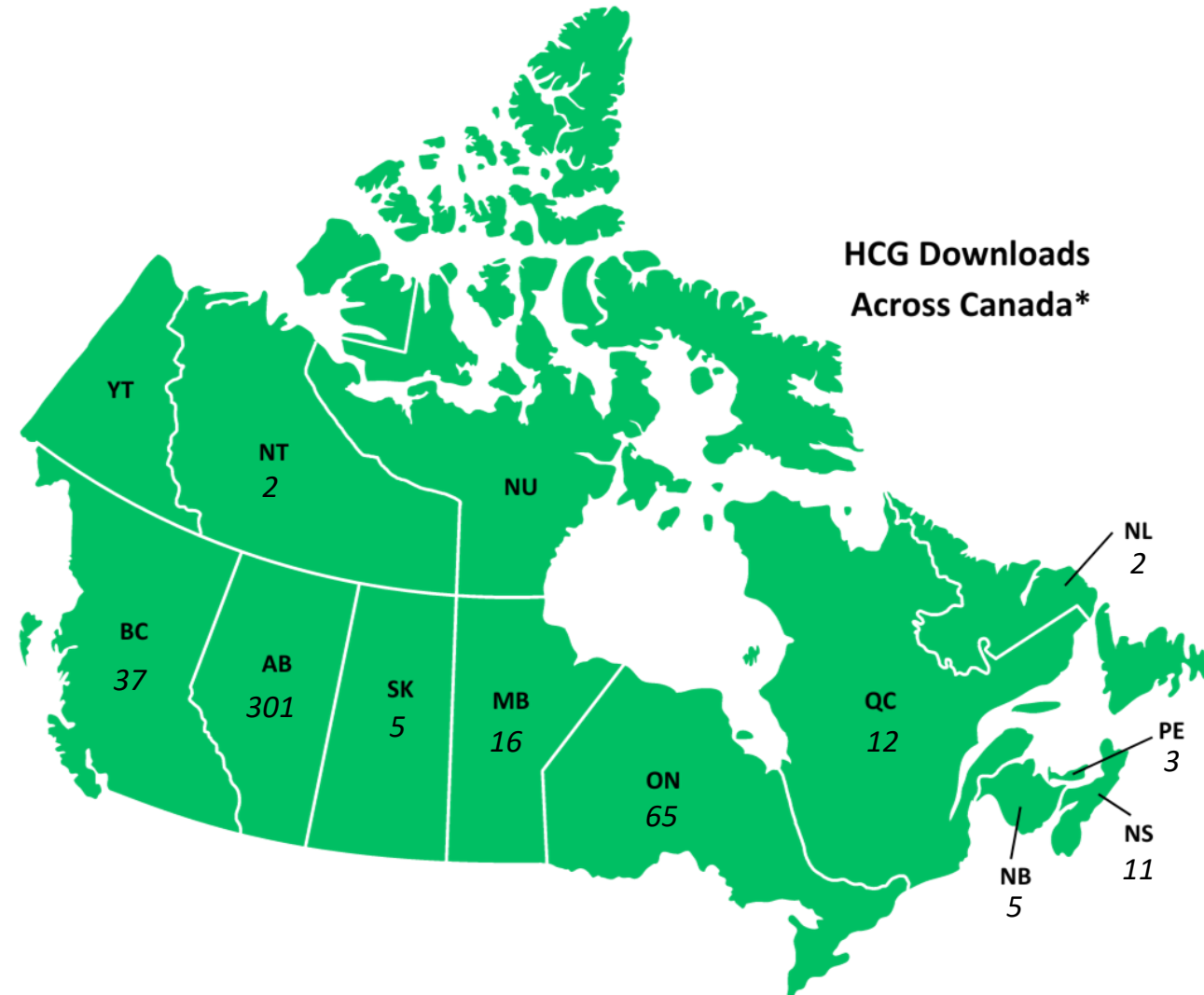
- Building setbacks that are minimized to increase transparency between street and ground floor building interiors, while ensuring sufficient space for accessibility... 
- Pedestrian lights at an appropriate height, brightness, orientation and colour, and placed at frequent intervals, to provide sufficient and safe illumination of pedestrian facilities while maintaining pedestrian comfort. 
- Provide community gardening space for public use by people of all abilities. 
- Place pedestrian and cyclist wayfinding signage at appropriate heights and angles, and in formats for people of all abilities to relevant healthy destinations onsite and in neighbourhood. 



- Facades should: Where ground floors of multi-family residential or office buildings are without main residential or office floor units, include healthy retail (e.g., supermarket or grocery store) or common uses (e.g., building gym or physical activity spaces) that also improves the pedestrian realm. ★★☆☆△
- Incorporate CPTED principles to promote safety (e.g., transparency between indoors and outdoors, pedestrian-scale lighting outdoors). ★★☆☆
- All school buildings must provide enough gymnasium space +/- gymnatorium space (auditorium convertible into an extra gymnasium) for daily physical education and recess for all students. ★☆☆★
- Use biophilic, greening, and other landscape elements. ★☆☆★
- Use outdoor spaces, including roof spaces, for active recreation including hydroponic or soil-based fruit and vegetable gardening. ★★☆☆★
- Provide everyday access to one or all stairs, including fire stairs, for all building users... ☆
- Have natural lighting in stairwells. ☆△

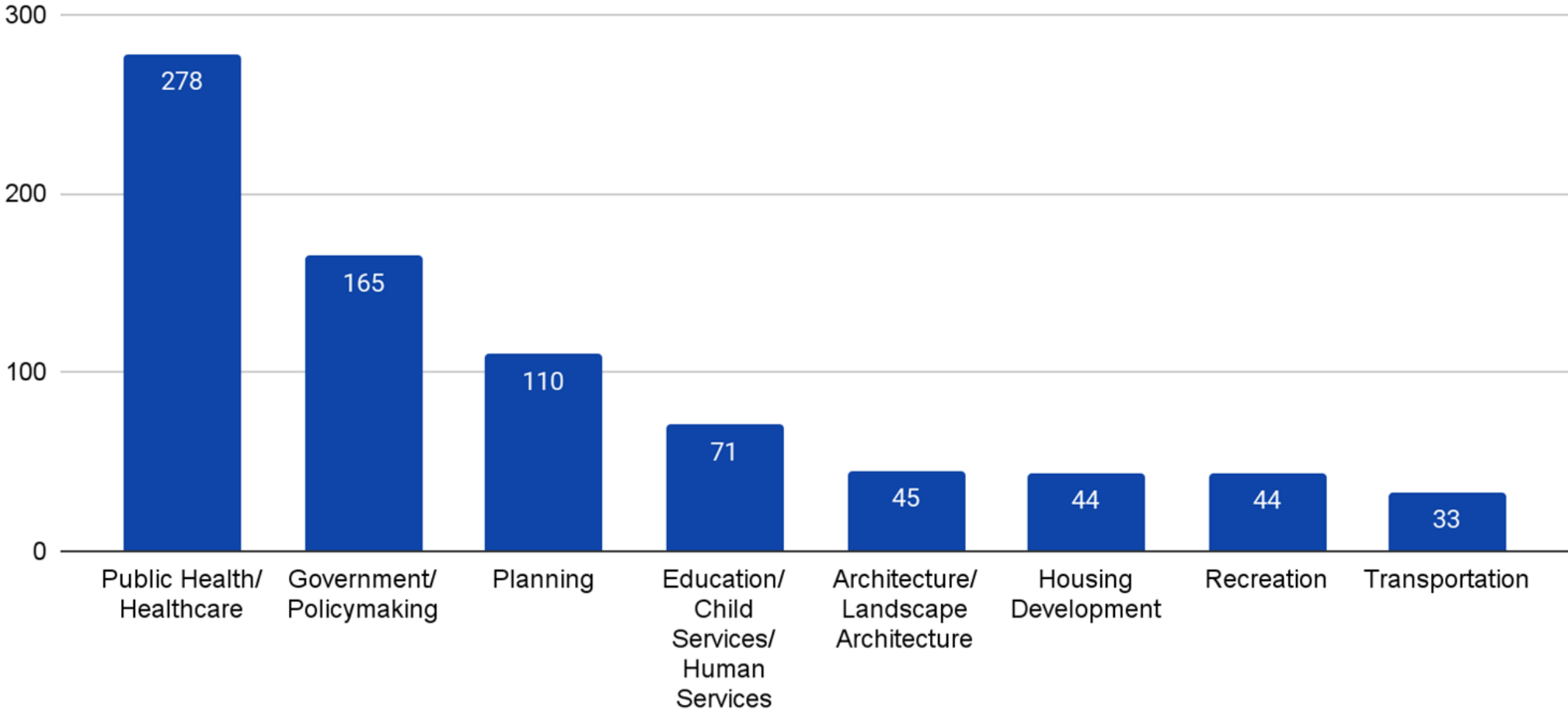
## Everyone should use the HCG to build a healthier community.

- Planners, architects, designers, developers and builders can routinely use strategies in projects
- Facility operators can make feasible retrofits
- Health and community organizations, and community residents can use HCG for a health lens for giving inputs to community and building projects
- Organizations, Municipalities, and Provincial and Federal Ministries can incorporate routine use of HCG into policies (e.g. RFPs for all projects and funding)
- Researchers can focus their research on strategies without consistent evidence (without stars).



- >700 total downloads so far, the majority in Canada
- International downloads also, including in:
  - Argentina
  - China
  - Denmark
  - Hong Kong
  - Indonesia
  - Iran
  - Jamaica
  - Netherlands
  - New Zealand
  - Portugal
  - Thailand
  - United Arab Emirates
  - United Kingdom
  - United States

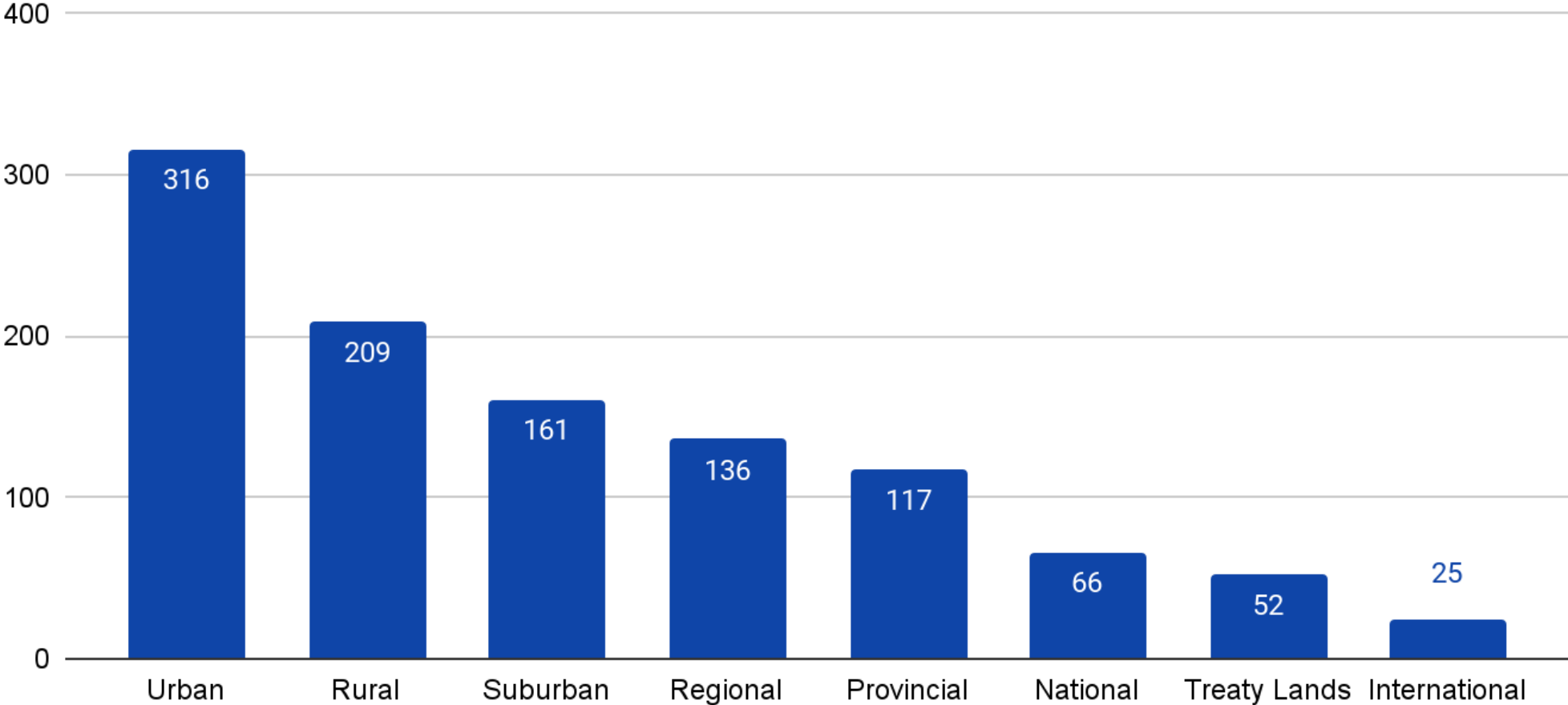
### Downloads by Primary Area of Work\*



\*Up to October 30, 2023



### Downloads by Geographic Focus\*



\*Up to October 30, 2023 22

# Partnership Products:

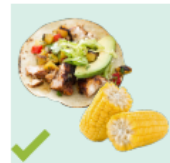
## Healthier Food and Beverage Guidelines for Public Events

Available in English and French

>1,100 total site visits

### Healthier Food and Beverage Guidelines for Public Events

Healthy food environments make healthy eating possible. Those providing food and beverages at public events can help by following these simple guidelines. A public event is any event open to the public where food and beverages are provided, including those for sale, catered, and provided for free.



#### CRITERIA TO MEET

**All meals must contain vegetables or fruit**



#### No sugary beverages

✗ **DON'T** serve pop, slushes, sports drinks, juice, energy drinks, and vitamin water.

✓ **DO** replace sugary beverages with water and/or sparkling water (can include unsweetened flavoured waters), low fat milk or unsweetened plant-based beverages, coffee or tea.

Note: Sugar substitutes and caffeine are **not** recommended for children and youth.



#### No deep-fried food items

✗ **DON'T** serve deep fried foods.

✓ **DO** serve foods that are baked, grilled, broiled, sautéed, and/or poached. Consider offering a vegetable or fruit side instead.



#### No candy or sugary foods

✗ **DON'T** serve candy, cookies, pre-packaged sweet snacks.

✓ **DO** consider fruit and nut bars that are higher in fibre and lower in sugar instead.



#### No high fat and salty snacks

✗ **DON'T** serve chips and crackers.

✓ **DO** consider unsalted nuts and popcorn instead.

#### ADDITIONAL GUIDELINES TO CONSIDER

- **For Full Meal Deals** – a vegetable or fruit side dish and an unsweetened beverage
- **Whole grains** instead of refined grains
- **Condiments and dressings** served on the side or in portion-controlled containers
- **Signage** promoting healthier options
- **More prominent display** of healthier options
- **Pricing** of healthier options match or beat less healthy options



Scan this QR code to access a copy of these guidelines.

For more information about marketing healthy food and beverages at events, visit [How to Market Healthy Food & Drinks](#)

For more information about selling healthy food options, take the [FREE Healthy Eating in Recreation Settings eCourse](#)

For more information about healthier food choices for meetings, visit [Eat Smart. Meet Smart planning guide](#)

For more information about improving health and wellbeing of communities in Alberta and across Canada, visit [Housing for Health](#)



### **Key Publications**

1. [Uche UI, Stearns J, & Lee KK. Capabilities, opportunities, motivations, and practices of different sector professionals working on community environments to improve health. Canadian Journal of Public Health. 2023.](#)
2. [Lee KK. Need for continued improvements to our communities and buildings for health. Interdisciplinary Nursing Research. 2023:10-97.](#)
3. [Ren H, Strickfaden M, Spence JC, Stearns JA, Jackson M, Avedzi HM, Lee KK. 'We are developing our bubble': role of the built environment in supporting physical and social activities in independent-living older adults during COVID-19. Cities & Health. 2023 8:1-4.](#)
4. [Stearns JA, Avedzi HM, Yim D, Spence JC, Labbaf F, Lamboglia CG, Ko F, Farmer C, Lytvyak E, Kennedy M, Kim YB. An Umbrella Review of the Best and Most Up-to-Date Evidence on the Built Environment and Physical Activity in Older Adults ≥ 60 Years. Public Health Reviews. 2023;44:1605474.](#)
5. [Kouritzin T, Spence JC, Lee K. Food intake and food selection following physical relocation: A scoping review. Public Health Reviews. 2023;44. doi: 10.3389/phr.s.2023.1605516.](#)
6. [Stearns J, Ren H, Spence JC, Avedzi H, Lee KK. Protocol for an evaluation of the Designing Communities to Support Healthy Living in Aging Residents Study. Archives of Public Health. 2021;79\(172\):1-10.](#)
7. [Lee K. Planning and public health: the need to work together – again! PLAN Canada \(Centenary Ed\). 2019;59\(1\):202-208.](#)

# Acknowledgements:

## U of A Housing for Health (H4H) Team



UNIVERSITY  
OF ALBERTA

Housing FOR  
health

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Healthy Community Guidelines:

<http://www.uab.ca/hcg>

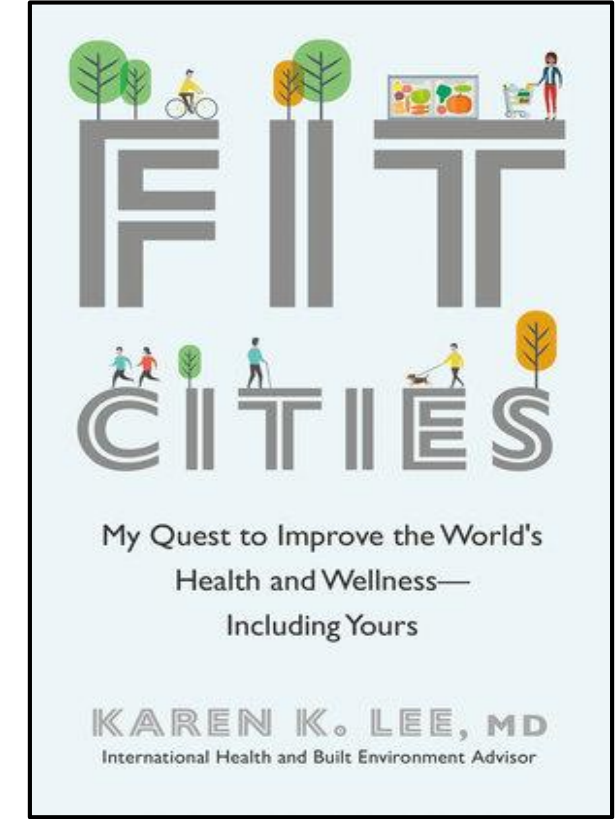
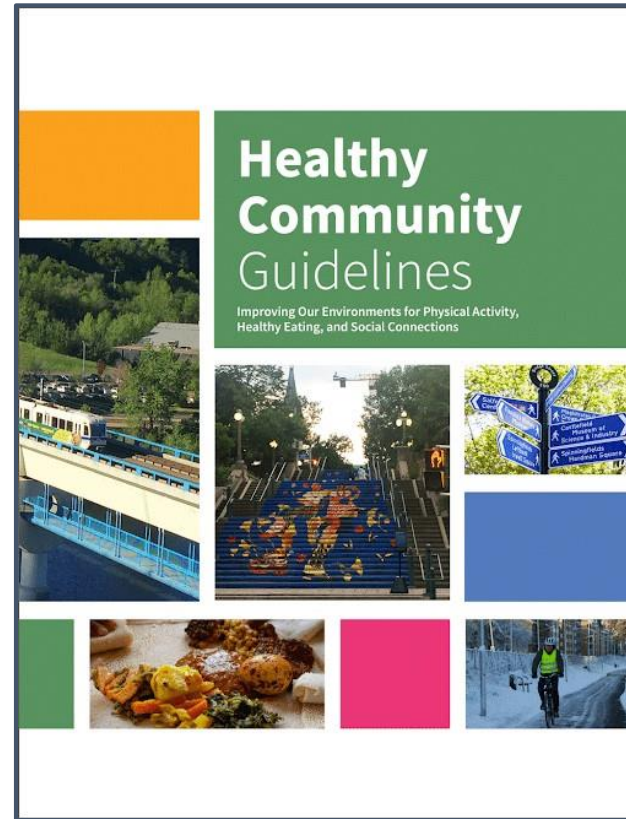
Housing for Health website:

<http://www.uab.ca/h4h>

Dr. Karen Lee website:

[www.drkarenlee.com](http://www.drkarenlee.com)

Fit Cities book: [www.penguinrandomhouse.ca/books/258495/fit-cities-by-dr-karen-k-lee/9780385685320](http://www.penguinrandomhouse.ca/books/258495/fit-cities-by-dr-karen-k-lee/9780385685320)



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