

## Executive Summary

As the connections between the built environment and human health become increasingly clear, planners are realizing the crucial role they play in facilitating the creation of neighbourhoods that support physical activity, and walking in particular, to improve health outcomes. Walkability provides a measure of how inviting an area is to pedestrians, and can indicate an environment's supportiveness for active living. Improving walking conditions can increase transportation choice for neighbourhood residents, encourage more people to walk, reduce car dependency, and foster more complete, people-friendly communities.

Both urban form and neighbourhood socio-economic status (SES) have been shown to influence walkability and resident walking behaviours. Accordingly, this study examines the relationship between urban form and neighbourhood socio-economic status (SES) based on objective and subjective measures of walkability in four Ottawa neighbourhoods, purposely selected to provide contrasts on urban form (high street connectivity versus low street connectivity) and SES (higher versus lower). Employing a variety of research methods, including a review of existing literature, neighbourhood profile analysis, observational analysis, document review, and semi-structured interviews, this study answers two main questions:

- 1) How do walking conditions vary among four Ottawa neighbourhoods of contrasting built environment and socio-economic status based on objective and subjective measures of walkability?
- 2) How might these built environment and socio-economic status conditions influence walking behaviour within these four neighbourhoods?

Study findings revealed differences in rates of walking and built environment features across neighbourhoods, demonstrating an association between built form, neighbourhood SES, and walkability. Walking and public transportation use was more common in the low SES neighbourhoods compared to high SES neighbourhoods and higher in the high connectivity neighbourhoods versus low connectivity neighbourhoods. Each neighbourhood displayed built environments supportive of walking, but differed in terms of the absence or prevalence of certain features. While high connectivity neighbourhoods included a greater mix of land uses, more potential walking destinations, and more pedestrian street amenities, the low connectivity neighbourhoods had less traffic on residential streets. Comparatively the low SES neighbourhoods had more vehicle traffic, while high SES neighbourhoods were more aesthetically pleasing with greater perceptions of safety from both crime and traffic. Despite the variations in walking conditions, all neighbourhoods except the HILC

neighbourhood had similar levels of pedestrian protection, posted speeds, tree coverage, and access to public transit. Key differences may affect how and why people walk in the neighbourhood.

Improvements can be made in all four neighbourhoods to improve conditions for pedestrians by creating safer and more comfortable places for walking. Infrastructure upgrades, the introduction of supportive programming, improvements to public transportation, and increased funding, and are all recommended to enhance walkability in each of the four neighbourhoods and across all neighbourhoods.