AN EVALUATION OF THE PEDESTRIAN ENVIRONMENT OF PRINCESS STREET IN KINGSTON, ONTARIO, FROM THE PERSPECTIVE OF THE 'GREAT STREET' CONCEPT

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EXECUTIVE SUMMARY

Princess Street has many of the characteristics of a typical north-American main street. However, while many main streets and urban centers have lost their vitality in the past few decades as a result of suburbanization, this Kingston trademark has maintained an intense public life and a strong identity in its community. It is not clear how Princess Street compares to other popular vibrant pedestrian corridors. Various opinions stemming from specialty literature provide a range of definitions or particular principles attached to the concept of 'great streets', although this theoretical model remains to be defined.

Are the vitality and environment of lower Princess Street qualifying it as a 'great street'? What are the parameters and principles associated in literature with good urban thoroughfares? How does Princess Street compare with these theoretical benchmarks? Which streetscape aspects could be improved, based on such a comparative assessment, along Princess Street?

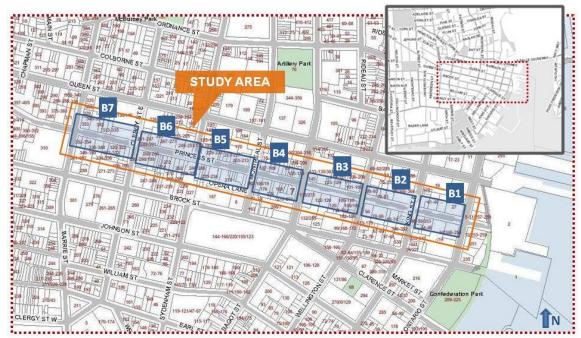
Guided by these questions, this study evaluated the downtown portion of Princess St. from the perspective of the 'great street' model, outlining those characteristics of the street that contribute to its pedestrian appeal, and those that can be improved. It also provided a better understanding of the character and unseen dynamics of this street, looking into the current policy guiding its transformation, as well as its 'social life'.

RESEARCH METHODOLOGY AND EVALUATION FRAMEWORK

The study focused on the downtown part of Princess Street, between the intersection with Ontario Street and Barrie Street, for an approximate length of 910 meters, encompassing 7 blocks. The methods that were employed to assess the pedestrian environment of Princess Street consisted of a literature review, direct observations, map consultations, photographs, and a review of policy related documents.

Drawing from the literature on 'great streets', an evaluative framework was established to assess the street life and the quality of the pedestrian environment along Princess Street. Within this framework, two different categories of evaluation criteria were identified to address each of these aspects. The second set of criteria pertaining to the street environment was also used in evaluating current policy and regulatory documents concerning the street. The street life observations consisted mainly of counts of pedestrians and counts of people engaged in stationary (optional) activities.

The evaluation of the street environment quality involved observing street attributes relating to 'protection', 'comfort', and 'delight'.



Key map and outline of the study area and street blocks along Princess Street

DATA ANALYSIS

The street life observations and pedestrian environment observations provided data about the pedestrian activity and the physical quality of each block in the study area. The data analysis permitted an overall evaluation of the vitality of the street and of the types of activities people engaged in within, on each block, during a weekday or a weekend day. Further information from the street environment assessment allowed for a qualitative evaluation of its pedestrian environment and provided a physical environment profile for each block.

Cross referencing data from each category of observation (i.e. physical activity and physical environment) in reference to each block permitted inferential observations regarding the relationship between the quality of the environment and its vitality. Finally, the evaluation of regulatory policy concerning Princess Street outlined existing guidelines supporting qualitative measures in concern to its current and future pedestrian environment.

Table showing a summary of street life and street environment observations.

Area	Street life				Positive aspects of the pedestrian environment (encouraging street life)
	Pedestrian activity (area %)	Total optional activities (area %)	Social activities (area %)	Duration of stay longer than 5	Nr of land-uses
B1	8.0%	10.0%	10.4%	8.1%	12
В2	10.5%	15.1%	13.0%	16.2%	19
В3	16.4%	14.7%	9.8%	16.2%	24
В4	17.9%	16.4%	16.5%	13.5%	20
B5	17.5%	19.4%	23.1%	5.4%	32
В6	17.4%	13.6%	16.8%	29.7%	26
В7	12.2%	10.8%	10.4%	10.8%	24
All Study Area	100.0%	100.0%	100.0%	100.0%	157

CONCLUSIONS AND RECOMMENDATIONS

Observations of pedestrian activity and traffic within the study area suggest that Princess Street is a popular destination, even in the colder season, based on the numbers of walking pedestrians and of people engaged in optional activities. Approximately double counts related to street life during the weekend observations appeared to consolidate the role of Princess Street as a preferred destination for social life. Other observations during the Santa Claus Parade provided further evidence of the street as an established community gathering place, as well, capable of supporting intense social events.

However, records showed that a small percentage of activities extended beyond 5 minutes. Some street blocks, in particular Block 1 and 7 appeared to be less energetic than others, most likely due to a lower number of destinations within or beyond them. The devitalization of these segments on each end of the study area suggests a slight fragmentation of the street from its context and outlines opportunities for improvement and integration of this thoroughfare in the downtown area. The existing policy framework supports integrative strategies in the area, promising positive future streetscape changes.

In regard to the quality of the pedestrian environment along Princess Street, the study outlined a number of positive aspects: consistent mixed-use character, provision of 'soft-edge' visibility and pedestrian interest, formal diversity including niches and awnings for bad weather protection, good pedestrian and street-oriented lighting, consistent use of sidewalk extensions for traffic

protection, occasional interim passageways for pedestrian access, universal accessibility, layout clarity, opportunities to stand or wait, some opportunities to sit along some blocks, including café/restaurant terraces in a few cases, and a relative aesthetic consistency based on heritage architecture throughout the study area offering significant visual interest. More particular criteria, related to pedestrian delight are addressed by the street's appropriate proportion and scale and the visual and cultural resources represented by the built environment.

A number of less favorable aspects were remarked on as well, as they pertain to the street's pedestrian environment: gaps in the physical frontage of the streets, traffic intensity, poor wind protection, narrow sidewalk widths on many segments - often reduced by a variety of obstructions, long blocks, and few landmarks. Formal sitting opportunities are missing along most blocks, while socially stimulating sitting choices (i.e. 'talkscapes') are poorly provided for. Other observations remarked on impeded views, across and along the street, aesthetic conflicts between historic and some modern buildings, the lack of opportunities for play or exercise, as well as the lack of natural elements or public art in the street.

Recommendations were made in regard to better opportunities for stationary and social activities, for better legibility, improved aesthetic and cultural dimensions of the street, as well as an increase in the available pedestrian linkages beyond the street exclusive space:

Recommendation One: Offer better opportunities for stationary activities and improve overall safety on all blocks, by restructuring curb extension space, integrating appropriate sitting areas, and encouraging late-hours land-uses.

Recommendation Two: Improve street legibility by providing landmark features or accentuating existing circulation nodes, and improving views along and across the street.

Recommendation Three: Improve aesthetic quality of the street by supporting consistent architectural expression, integrating natural elements and public art.

Recommendation Four: Increase pedestrian route network by encouraging the rehabilitation of existing mid-block passageways and the revitalization of internal courtyards.

Recommendation Five: Consider the improvement of safety due to traffic and criminality by potentially rerouting traffic and increasing visibility and maintenance along the street.