Tackling Tactical Urbanism: Exploring the Potential for Improved Social Spaces on Queen’s University Campus

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Executive Summary

Overview

This report explores the opportunity for improving public social spaces on Queen’s University campus. It compares six sites on campus against a set of evaluative criteria developed from literature on the design of public spaces. This report applies the concept of tactical urbanism as a method of better understanding how effective these social spaces on campus can be, if provided. The intent of this study is to better understand how tactical urbanism can engage students, faculty, and visitors on campus. The research questions addressed in this report are:

1. What sites present suitable conditions for other temporary and permanent set-ups on Queen’s University campus?
2. What is the potential for the successful implementation of a ‘pop up’ cafe at Stauffer Library?

The six sites chosen for evaluation in this report are: Library Square at Stauffer Library, the Agnes Etherington Art Centre, the Tea Room, the Grad Club, the existing bike rack area located adjacent to the John Deutsch University Centre, and two spaces located outside of the Khao Restaurant in the John Deutsch University Centre. Of these spaces, Stauffer Library presented itself as the most ideal site to host a pilot project displaying key elements of tactical urbanism.

Research Methods and Evaluation Criteria

This report relied heavily upon a set of criteria that were developed to evaluate the potential for successful social spaces on campus. These criteria were developed primarily from initiatives led by Project for Public Spaces, Jan Gehl’s book, Cities for People and Reid Ewing’s book, Identifying and Measuring Urban Design Qualities Related to Walkability. This report combined these resources and adapted them to address specific objectives. Several methods were employed to determine the suitability of these spaces as potential permanent social spaces on campus. These methods included a literature review and direct observation. Once a site for the pilot project was determined, a video camera was used to further monitor the success of the installation.

The evaluative criteria that were developed for the purposes of this report were grouped into the following categories:
1. Accessibility, Access, and Linkages;
2. Activities and Uses;
3. Comfortable and Good Image; and
4. Sociable

Each of these criteria looked at a number of sub-criterion which were assigned grades ranging between “does not satisfy criteria” to “excellent”. A summary of these findings is provided on the next page.
Data Analysis

These sites were evaluated based on the criteria developed specifically for this report. Grades were assigned as a result of direct observation.

The results presented Stauffer Library as having the greatest potential to host a pilot project.
Pilot Project

From October 16th-18th, 2014, a pop-up cafe was implemented in Library Square at Stauffer Library. This initiative required extensive pre-planning and the development of crucial partnerships with the Queen’s University Head Librarian, Martha Whitehead. Ms. Whitehead provided library staff to help set up and take down the cafe each day. During Homecoming, which fell on the 17th and 18th, a tent serving coffee and baked goods was set up, further emphasizing its use as an outdoor cafe. October 16th was used as a control day, allowing us to analyze the space with seating and furniture on a weekday afternoon. The results on this day showed approximately forty people per hour enjoying the space, as contrasted with approximately four people per hour on a weekday afternoon without the provision of outdoor seating. This confirmed the results of our evaluation, making Stauffer Library a successful pilot project.

Recommendations

A number of recommendations were developed as a result of the evaluation conducted for each individual site. These recommendations were formed to address various shortcomings that have prevented these sites from being successful social spaces on campus. The recommendations provided for Stauffer Library were a direct result of the findings from the pilot project. These recommendations are as follows:

Stauffer Library

1. Provide clear signage for entrance options. Unlocking all doors will allow for through-access and help improve readability of the space.
2. Adding movable chairs, tables, and umbrellas that are comfortable, accessible, and visible will provide greater opportunities for students and faculty to stay in the space rather than simply passing through it.
3. The inclusion of way-finding markers at the corner of Union Street and University Avenue will make the space unique and bring people to the site, but will also allow people to use the Library as a primary benchmark on campus.
4. Chain furniture during the evening or set up an appropriate schedule for take-down crews.
5. The addition of planters and moveable seating around the trees will capture the changing shade throughout the day and would make a positive addition to the space.
6. If there was outdoor seating on the west side of the entrance by the indoor café, the space will have a greater sense of stewardship. The introduction of an outdoor seating space for students may lead them to feel pride and care for the space.
7. Introducing seating will also make the space more sociable because it gives users a space to sit, relax and enjoy.
8. Keep the Library Café open in the spring and summer and have the operators responsible for the outdoor seating.
Agnes Etherington Art Centre

1. The use of comfortable outdoor seating will improve the sittability of the space. It will also change users’ perception of the space as being merely a through way space, and instead make it a destination on the south end of campus.

2. The provision of outdoor seating would also provide seating for employees of the Kingston General Hospital, located just south of the site. This will attract users into the south end of Queen’s Campus and can encourage greater use of the area. It will provide a quiet, social seating space away from the activity on Union Street and University Avenue.

3. Provide signage to indicate the presence of ongoing exhibits indoors. It will bring users into the site and allow them to explore the Centre.

4. The AEAC (Agnes Etherington Art Centre) should host programmable activities such as art programs for children that can utilize the outside space during the summertime. The large frontage would allow enough space not only for seating and tables but also for a picnic table that would allow children and young adults to also engage in the space.

Tea Room

1. Open the existing glass doors to improve accessibility and convenience to and through the interior café.

2. Have way finding tools and signs to indicate the presence of a café inside to improve readability of the space.

3. Configure tables and chairs to allow for partial shade and sun exposure in order to improve comfortability for all users in the space.

4. Extend café service out to the patio area and allow patrons to bring food and beverages outdoors.

John Deutsch University Centre Bike Rack

1. Relocate a portion of the existing bike racks in order to make it accessible to the public as an outdoor seating space. Keep a set of two rows of bike racks at the south end of the site to provide opportunities for cyclists to park their bikes there and enjoy the space. It will also provide an additional barrier away from the busy intersection of Union Street and University Avenue. The remaining bike racks could be located across the street near Stauffer Library or near the southern corner of John Deutsch University Centre.

2. Have benches along the wall adjacent to the John Deutsch University Centre to provide a range of seating options.

3. Include landscaped features or planters in the area to add character and greenery into the space.

4. Provide string lighting in the trees to add character as an extension of Stauffer Library tree lighting and to improve the image of the space.

5. Include small-scale pedestrian lighting as an extension from the existing lighting configuration outside Stauffer Library such as the lamp posts.

6. Include a waste disposal bin for users in the space to allow for continuous maintenance of the space and to instill a sense of stewardship in the users of the space.

7. Chain the furniture together to prevent theft over night. Arrange a partnership with either maintenance crews in charge of the John Deutsch University Centre or Physical Plant Services to lock and unlock furniture each day.
John Deutsch University Centre Khao Outdoor Seating

Area in Front of Glass Wall:

1. Remove existing concrete planters and seating completely and replace with inexpensive, moveable, comfortable chairs and tables. Consider including additional umbrellas to provide shade from excessive sunshine in the space.

2. Install seasonal vertical plantings along the interior cement wall to complement existing shrubbery that separates the seating space from the sidewalk. This also improves the comfortability and micro-climate of the space.

3. Retrofit the existing glass wall that separates the interior cafeteria with the exterior space with a retractable glass wall. It will provide people a unique patio setting while observing the outdoors. The provision of the outdoor seating space and the open wall also makes users of the outdoor space feel a part of the activity occurring indoors. In the short-term, doors should be unlocked and kept open for users to improve the readability of the space.

4. Provide outdoor waste disposal bins so that users can have a sense of stewardship over the space and engage in daily maintenance.

Alcove Area:

1. Replace concrete seating with benches or improved seating spaces.

2. Replace existing central planter in the alcove with covered fire pit.

3. Develop a partnership to ensure that the fire pit is being used for certain months of the year and during a set schedule.

Grad Club

1. Open up patio access from Union Street so that it is both accessible and easy to see from a distance.
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Chapter 1: Background and Context

Queen’s University is situated on the periphery of Kingston’s downtown core and is close to many amenities for students and faculty alike. However, the university does not have ample outdoor public seating spaces. The main campus is bordered by the City Park to the east and Victoria Park to the north but does not have smaller seating spaces integrated into the campus’ core. This report addresses this lack of outdoor public spaces. While certain buildings on campus act as social gathering spaces, there are not many opportunities for students and faculty to take advantage of the beautiful campus in the warmer weather during the spring, summer, and fall seasons; often restricting them to either commercial patios downtown or inside buildings on campus. Outdoor seating space offers the opportunity for faculty, students, staff and visitors to engage, share, learn and enjoy a university campus.

Queen’s University recently announced that it would be increasing its yearly enrolment to a total over 20,000 by 2016 (Queen’s University Senate, 2013). This presents a greater need to accommodate students and provide a greater range of amenities for their enjoyment on campus. A varied set of objective criteria exists in literature pertaining to the design of good public spaces. Although it is difficult to determine an objective definition for what makes a good public space, we can often determine how good it is, by how often it’s used and how people feel in that space. Examples of successful urban spaces like Bryant Park and Times Square in New York, ByWard Market in Ottawa, and Granville Island in Vancouver showcase how successful outdoor spaces can be, if designed with the user in mind.

This report will analyze six existing sites on campus that have the potential to host a pilot project displaying tactical urbanism. Tactical Urbanism has been used in cities all over the world to host temporary urban interventions that help make small parts of a city more engaging and lively (Berg, 2012). The form and scale of tactical urbanism varies; it can take the form of a reclaimed parking stall during the annual Park(ing) Day, where community members and local organizations convert parking stalls on streets into temporary park spaces, or it can take the form of a temporary, converted laneway into a public space. For the purposes of this project, tactical urbanism will be considered for six different locations on campus in the form of seating spaces.

This report will also consider existing plans that detail ways to improve the quality of spaces on campus such as the Queen’s Campus Master Plan (CMP) and the Queen’s Library and Archives Master Plan (LAMP). One of the priority recommendations made in Chapter 5 of the CMP identifies the need for ‘Student Life Spaces’. It explicitly recommends that “Areas illustrated [in this plan] as lacking Student Life Spaces should be considered priority areas for additional social infrastructure. Social Infrastructure includes all space and informal environments that facilitate student and faculty interaction, sustaining or enhancing programming that supports a more holistic Queen’s out-of-classroom learning experience. These include ‘group study spaces, cafes, student government offices, club spaces, and student-run services.” (CMP, 2014, pg. 67). Furthermore, it also recommends that “areas with a high concentration of social infrastructure should be considered priority areas for public realm improvements that incorporate infrastructure for gathering and socializing, such as outdoor patios, public seating, and attractive landscaping.” (CMP, 2014, pg. 67). It even identifies potential partnerships to make this a
reality. The Library and Archives Master Plan, which is complementary to the CMP, identifies the need to “restore, transform, and realize the potential of under-developed library and archives spaces to provide memorable places for social and intellectual encounters and discovery” (LAMP, 2013, pg. 4). It also makes recommendations for Stauffer Library to “reconfigure the lower level to be more open to daylight and include the potential to create a new accessible reading garden as a unique outdoor study space,” (LAMP, 2013, pg. 6). It further recommends improving Library Square by developing a new, major public space on campus at the intersection of Union Street and University Avenue as an inviting place for social interaction. (LAMP, 2013, pg. 6).

These plans, which provide an overarching vision for the future of Queen’s University, explicitly acknowledge the need for social spaces. While a few spaces on campus are identified within the CMP, the six sites chosen for this report provide additional sites for recommended improvement. These outdoor sites are: Stauffer Library, the Agnes Etherington Art Centre, the Tea Room, the bike racks in front of the John Deutsch University Centre, connected outdoor seating spaces in front of the Khao restaurant at the John Deutsch University Centre, and the Grad Club.
Chapter 2: Literature Review

Through the review of available literature on urban design, we sought to identify principles about 'good' urban design and what principles make 'good' public spaces. The literature helped identify key characteristics on each site and allowed us to further examine what other features could be included to create exciting public spaces on campus. Researchers such as Reid Ewing, Jan Gehl, Susan Handy, and Allan Jacobs, among many, have all worked to better understand key attributes of public spaces that make them successful. In Reid Ewing and Susan Handy's "Measuring the Unmeasurable: Urban Design Qualities Related to Walkability", the authors refer to key urban design qualities that contribute to dynamic and engaging street environments. They note the role that perception plays in how people understand and react to public spaces differently (Reid & Ewing, 2009). This report attempts to address objective urban design qualities that can help create positive reactions to these spaces.

One of these qualities, ‘imageability’, refers to a “quality of a physical environment that evokes a strong image in an observer” (Lynch, 1960, pg. 9) and identifies landmarks as being a key component of imageability. Stauffer Library in this case, can be considered a key landmark on campus not only because it is located at the intersection of the two main streets on campus, University Avenue and Union Street, but also because of its unique building form and shape. It is also considered a visual termination point coming from either direction on Union Street, is an orientation point for one’s location on campus, and is a point of contrast in architectural style; its modernity starkly unique from the historic buildings that flank the library on all three corners (Ewing & Handy, 2009).

The authors also highlight the importance of enclosure, which can be considered “perhaps, the most powerful, the most obvious, of all the devices to instill a sense of position, of identity with the surroundings” (Cullen, 1961, pg. 29). Allan Jacobs affirms this, stating that people “react favourably to fixed boundaries as something safe, defined, and even memorable – an invitation to enter a place special enough to warrant boundaries” (Reid & Ewing, 2009, pg. 74). While the inclusion of street trees and canopies can be identified as a key opportunity to provide enclosure, the existing built and natural features at both John Deutsch University Centre (JDUC) locations set it apart from the other locations as being a great public space. Because both of the seating areas outside of Khao are inset into the ground, the physical barrier between the user, the street, and the sidewalk provides a sense of enclosure for those enjoying the space. Furthermore, the bike racks adjacent to the JDUC have both a fence and a large, overhanging mature tree that provide two very different forms of spatial enclosure, making users feel safe with defined boundaries and clear separation from the sidewalk (Reid & Ewing, 2009).

‘Human scale’ was one quality that applied well for all sites on campus. Reid and Ewing (2009), suggest that human scale buildings range from three to six storeys. All buildings that surround each site are no more than six storeys in height, providing a more inviting public environment as compared to a public space situated in the middle of towering buildings. Lastly, the authors also touch on the importance of...
having building facades that have ‘transparency’, often achieved by having display windows or exteriors with extended glass facades. Allan Jacobs suggests that transparency provides the “perception of human activity beyond the street” as compared to facades with “blank walls and garages [which] suggest that people are far away” (Reid & Ewing, 2009, pg. 78). This transparency can be achieved outside of Stauffer Library, the Tea Room, the Khao outdoor seating area at JDUC, and to an extent, at the Agnes Etherington Art Centre. These locations have the greatest potential for displaying this level of interaction and improving the visibility of activities that occur both indoors and outdoors.

Tactical Urbanism itself, although still relatively new in academic literature, is the study of temporary urbanism. It has been practiced in cities all over the world and has yielded exciting improvements to the urban environment. Lydon et al. (2012), explain that Tactical Urbanism has the following five characteristics:

- A deliberate, phased approach to instigating change;
- Offers local solutions for local planning challenges;
- Short-term commitment and realistic expectations;
- Low-risks, with a possibly a high reward; and
- The development of social capital between citizens and the building of organizational capacity between public-private institutions, nonprofits, and their constituents” pg. 1.

Although temporary and spontaneous in nature, tactical urbanism needs to consider some of these design principles in order to successfully create vibrant and dynamic public spaces. These practices have taken the form of temporary parks in open spaces like parking stalls, temporary biking lanes, and guerrilla gardening, to name a few (Berg, 2012 and Lydon et. al, 2012). Pilot projects have also become increasingly popular as a way to experiment with improvements that have the potential to become permanent installations. Projects like pop-up cafes are currently occurring in New York City, for example, and occur at a small cost with a potentially lasting impact. The host restaurant in this case, must agree to cover the design, construction, and maintenance of the popup café in front of their business (Lydon, et. al, 2012).

Once agreements have been made, the City’s Department of Transportation contributes technical assistance by undergoing necessary street improvements to allow for the implementation of the pop-up café (Lydon, et. al, 2012).

Image 2.1 and 2.2 on page 2-3: Shows a before and after photo of the implementation of a pop-up café in New York City, NY.

Tactical Urbanism initiatives are considered “small-scale interventions that are characterized by their community-focus and realistic goals”, with community members, local advocacy organizations, and progressive design and planning companies often taking the initiative to organize these installations (Berg, 2012). The overall goal of this temporary urbanism is to change how a place works, how it is perceived by the public, and the contribution it makes to a community (Berg, 2012). It has a long-term goal of making permanent change by approaching it as a “step-by-step, piece-by-piece” process (Berg, 2012).
It is also a cost-efficient way of testing whether or not a particular place-making strategy will be effective at improving a public space and garnering positive community feedback. For the purpose of this report, we relied on the article, “Identifying and Measuring Urban Design Qualities Related to Walkability” by Reid Ewing. We focused our attention on evaluating human scale, complexity and tidiness. The evaluation process used video recordings and a quantifiable method of evaluation, however, we used a much simpler version of these methods because of limited resources and time. The report emphasized the importance of creating a framework for similar studies, which informed a framework that was created for our report using video for evaluation purposes.
Chapter 3: Methods

This report explores the potential to improve public open spaces on Queen’s University campus. We evaluated these spaces for their potential to host temporary tables and chairs, otherwise known as a ‘pop-up cafe’. Six locations were compared to determine suitability of the conditions required to implement these installations, using a set of evaluative criteria developed and informed by current research. The recommendations that arose from this evaluation considered the possibility of making these installations a permanent feature on campus.

The methods used for this report were primarily drawn from initiatives led by Project for Public Spaces, Jan Gehl’s book, Cities for People (Gehl, 2010) and Reid Ewing’s book, Identifying and Measuring Urban Design Qualities Related to Walkability (Ewing, Handy, Brownson, Clemente, & Winston, 2006). This report used the methods compiled from these sources and adapted them to address the specific objectives outlined in Chapter 1: Introduction. It also references a previous master’s report completed by Sarah Orovan (2011), “Urban Open Space Design to Meet User Needs” and the Project for Public Space’s evaluation criterion for place making. The evaluation criteria being used in this report were specifically adapted from Project for Public Spaces, Jan Gehl’s City for People, and the City of Toronto’s Draft Evaluation Criteria.

What makes tactical urbanism so unique is the spontaneous appearance of an installation in a community. This spontaneity however, requires immense preparation, collaboration and partnerships, and careful execution. The common theme identified across all considered precedents is the aspect of learning, which was achieved by the methods outlined below. It required the development of partnerships with other parties and relevant stakeholders that are affected by its installation.

The following methods were employed for the effective implementation of the research objective:

1) Urban design guidelines were consulted to inform the design of public spaces that attract people and precedents were utilized to inform the design of a successful pop-up café, which was later adapted for various sites on campus. These guidelines helped inform recommendations for future implementation.

2) Devised a set of evaluative criteria using PPS, Natland’s Urban by Design: An Evaluation of Public Spaces in Downtown Westminster, and Gehl’s Cities for People (Gehl, 2010). This set of criteria critically evaluated accessibility, access and linkages, the activities and uses occurring in the space, the degree of comfort and various physical attributes, and lastly, the degree of interaction that takes place on the site. This was evaluated using a rating system that assigns visual indicators of success according to its ability to satisfy specific conditions (See Evaluative Criteria in Appendix).

3) The proposed locations for the pop-up café were visually analyzed in their current conditions and existing elements that had potential to make it a good public space were critically evaluated. This was
determined using factors related to accessibility, visual exposure, enclosure, ease of pedestrian crossing through the space, and factors related to comfort like noise pollution, shelter from the elements, and natural sunlight and shade.

4) A comprehensive evaluation of all chosen sites was conducted and a site with the greatest potential for a successful pop-up café was determined.

5) The site of an existing and successful sidewalk café, the Grad Club, was evaluated using the same criteria, as a control for the study.

6) Once the most promising site was identified, we reached out to relevant stakeholders and authorities to determine the feasibility of implementing a pilot project. This required us to contact relevant authorities primarily in charge of managing the sites being considered.

7) Relevant authorities were then contacted to seek approval to set up a video recording device. A total of four days with and without street furniture were recorded. The video was recorded from the same position with the same time frame for the three days that the pilot project was in use, as well as on the day without furniture. Two of these days were during the Queen’s University Homecoming, allowing us to see how these spaces could be used during major events. The third day was recorded on a regular weekday to act as a control day to see how users interacted with the installation on a day without abnormal volumes and pedestrians.

This video camera was also used to record the space on an average day and to determine how people used the space without place-making features. We sought to record how people interacted with the space and how often people stopped to use the space itself. The cameras were set up at a distance that avoided capturing any distinct faces and was solely used to collect data for further analysis.

The video recording occurred over the span of four days, typically from morning until late afternoon for a duration of approximately 6 hours per day. This option was chosen as an alternative to extensive site visits throughout the day. The video camera was intended to capture the varying volume of students that moved through the space. This method was also chosen to ensure that pedestrians and users felt comfortable in the space. The presence of a recording device in the space would have resulted in unnatural movements within the space. The recording allowed us to best capture natural behavior in the space.

8) User interaction and behavior was recorded and documented both on days without the pilot project, and for the duration of the three days when the project was implemented. This data was evaluated using the same set of criteria devised earlier. It provided a consistent set of variables to evaluate and analyze and provided data on the kind of influence tactical urbanism has on visitors of particular public spaces.

9) Relationships between physical features, urban design attributes, and user activity was analyzed to determine possible causation and to evaluate its influence on participant behavior at the pilot location.
We then used the data collected to provide a set of recommendations for a future, permanent café and/or urban park at the site, as well as other sites on campus. The intention of these recommendations was to create more vibrant and better utilized public spaces on these sites and to improve the availability of outdoor seating on campus.

We examined how users interacted with the space, how they interacted with other users in that space, how they made the space their ‘own’ (i.e. move furniture around), and how long they remained in this space. How people treated the space was also observed, specifically how respectful they were of the furniture and of the space overall. The data obtained during the ‘pop-up cafe’ was then evaluated to determine the project’s effectiveness in attracting passersby. Successful elements were then studied to determine the potential for its implementation at four other sites on campus. The potential to develop permanent seating and recreational space for students, faculty, and visitors was evaluated. The recommendations that come from this evaluation will be made to further complement or reflect the existing Campus Master Plan and the Library and Archives Master Plan for the space outside of Stauffer Library. The six sites whose physical characteristics were examined were identified by informal consultation with Queen’s faculty, staff, and students.

Evaluation Criteria

The criteria below were used to determine whether or not the space is considered a ‘good’ public space that would encourage public use. The evaluation criteria were used for each location and measured using the information gathered from the literature review and our judgment. The results were collected for each subsection then totaled for entire criteria to give a final score for each space. These scores were compared to one another to determine the possibility of implementing a ‘pop-up’ feature in the space.

The evaluation criteria rating score was developed by referencing Natland, 2003, p.27-30

<table>
<thead>
<tr>
<th>Does not satisfy criteria</th>
<th>Poor</th>
<th>Fair</th>
<th>Good</th>
<th>Excellent</th>
</tr>
</thead>
</table>

3-3
Attributes: Accessibility, Access and Linkages
This evaluation criterion was created using Gehl, 2010, p. 239, Project for Public Spaces, 2014, and Orovan, 2011.

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Measurement</th>
<th>Score</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Continuity</td>
<td>Are there void spaces between buildings or a connected flow?</td>
<td></td>
<td>Gehl, 2010, p. 239</td>
</tr>
<tr>
<td>Proximity</td>
<td>Is it in close proximity to amenities?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Connection</td>
<td>Is there a good connection between buildings, sidewalk and pathways?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Readable</td>
<td>Is it easy to understand the space or is it disorganized and dysfunctional?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Walkable</td>
<td>Are there sidewalks? Are they in good condition, wide enough?</td>
<td></td>
<td>Gehl, 2010, p. 239</td>
</tr>
<tr>
<td>Convenient</td>
<td>Is the space in a bad location or difficult to access? Are bus stops near the space?</td>
<td></td>
<td>Gehl, 2010, p. 239</td>
</tr>
<tr>
<td>Accessible</td>
<td>Are there curb cuts, enough space for users? Are there fences or other barriers? Does the space function for people with special needs?</td>
<td></td>
<td>Project for Public Spaces, 2014 and Orovan, 2011</td>
</tr>
</tbody>
</table>

Figure 3.1. Example of an extended patio space, proven successful at universities like Stanford University in California. Good example of accessibility and access. Source: The Unofficial Stanford Blog (2011)
Attributes: Activities and Uses
This criterion was developed using Gehl, 2010, p. 239, and Project for Public Spaces, 2014.

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Measurement</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>Active</td>
<td>There are a variety of activities in the area. Are people participating in a variety of activities; walking, sitting, playing games, studying, eating?</td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Vital</td>
<td>People of varying ages are using the space</td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Special</td>
<td>Are people stopping in the space? Taking pictures?</td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Useful</td>
<td>People in the space are socializing? Are people in groups or by themselves?</td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Sustainable</td>
<td>People are using the space throughout the day?</td>
<td>Gehl, 2010, p. 239</td>
</tr>
</tbody>
</table>

Figure 3.2. Example of a wayfinding tool on Boston University Campus, MA. Wayfinding tools aid in making a space useful, special and vital. Source: Behance (2006)

Figure 3.3. Wayfinding tool on Utah State University Campus. Source: Utah State University (n.d.)
Attributes: Comfortable and Good Image
This criterion was created using Project for Public Spaces, 2014 and City of Toronto, 2013, p. 3-4.

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Measurement</th>
<th>Score</th>
<th>Data Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Safe</td>
<td>Does the space feel safe? Are there more women in the site than men? Is there lighting?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Clean</td>
<td>Is the space full of litter? Are sidewalks and other infrastructure in good condition?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>‘Green’</td>
<td>Is the area mainly dominated by vehicles? Are there people in the area using other modes of transportation other than vehicles?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Sittable</td>
<td>Are there enough places to sit in the space? Are people able to choose if they want to sit in the sun or shade?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Charming</td>
<td>Are people stopping in the space? Are groups of people staying in the space?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Attractive</td>
<td>Does the space make a good impression? Is the area attractive?</td>
<td></td>
<td>City of Toronto, 2013, p. 3</td>
</tr>
<tr>
<td>Historic</td>
<td>Are there any buildings of historic significance?</td>
<td></td>
<td>City of Toronto, 2013, p. 4</td>
</tr>
</tbody>
</table>

Total

Attributes: Sociable
This criterion was developed using Gehl, 2010, p. 239, and Project for

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Measurement</th>
<th>Score</th>
<th>Data Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Diverse</td>
<td>Are people meeting in groups, in pairs or individually? Are people talking to one another?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Stewardship</td>
<td>Do people pick up garbage in the space?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Neighbourly</td>
<td>Is there a mix of age groups and ethnicities that reflects the community at large?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Pride</td>
<td>Do people point out the space to others? Do people use the space regularly?</td>
<td>Gehl, 2010, p. 239</td>
<td></td>
</tr>
<tr>
<td>Friendly</td>
<td>Are people making eye contact/looking at one another? Are people talking to others in the space?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Interactive</td>
<td>People walking by, are they stopping at talking to others in the space?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Welcoming</td>
<td>Are people meeting their friends here?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
</tbody>
</table>

Total
Chapter 4: Data Analysis

In this chapter, the six locations were evaluated against the evaluation criteria and then compared against one another to determine if a particular location stood out as the best option to host a pop-up cafe. Each location was awarded a score ranging from does not satisfy criteria to excellent. Once all six locations were awarded a score, they were grouped together by attribute so that they could be compared against each other to easily see the best location. The site that presented itself as the best possible location on Queen’s campus was chosen to host a pilot project of tactical urbanism.

Evaluation Descriptions

The evaluation criteria are grouped into four sets: Accessibility, Access, Linkages; Activities and Uses; Comfortable and Good Image; and Sociable. A written description is provided below describing each subgroup and what is examined in each location.

4.1 Comparison of Sites

4.2 Accessibility, Access and Linkages

Specific elements such as:
- Accessibility features
- Ease of access through a site linkages to surrounding space
- Can people see it from a distance
- Is it easy to walk to and is it open
- Are there wheelchair ramps; and,
- Can people use different modes of transit such as walking or cycling, to access the site

If users cannot easily find a public space or easily navigate the area within that space, its not perceived as open or welcoming to the public or its users.

Stauffer Library

Stauffer Library scored well with the exception of being a ‘readable’ space. The site is located within excellent proximity to a range of amenities, is directly in front of a bus stop, and is easily accessible to all users. It is considered accessible because the entrance is at grade for level access and because there is a gradual slope that leads up to the side entrance doors, for the full length of the two colonnades. Both of these measures are considered exceptional accessibility features because they are integrated into the design of the building itself. The Union Street frontage however, is not considered very ‘readable’. This refers to how easily users are able to understand the space. Several of its glass doors remain locked while others are open, making it difficult for users to understand what additional options they have for entering or leaving the library, aside from its main entrance and two side entrances (see Figure 4.1). Furthermore, there is a large amount of open space in front of the library with little
indication of what use this space has. The only seating in the area is a set of concrete benches; a clear location for students and faculty to meet in front of the library. However, because of its awkward location and choice of material, this space is hardly seen as a place to sit and relax or to wait for companions. It is used as a space to move through, not a space to stay in. Clearer signage for entrance options and unlocking all doors to allow for through-access may help improve readability of the space. Adding street furniture that is comfortable, accessible, and visible may also provide greater opportunities for students and faculty and stay in the space rather than simply pass through it.

Agnes Etherington Art Centre

In terms of accessibility, access and linkages, Agnes Etherington scored marginally higher than Stauffer Library. Its provision of a wheelchair ramp, clear entrances, and its wide open space make the space easy to navigate and access, and is located directly in front of a bus stop as well. The addition of a wheelchair ramp however indicates an initial failure to adequately address accessibility, as compared with the provisions taken at Stauffer Library. While the ramp greatly improves the accessibility of the site, an integrated approach such as having a flush street entrance would serve all users equally. The biggest downfall of this site however, is its general location. Because it is located further south into campus, it is further from general amenities like the Athletics and Recreation Centre, the John Deutsch University Centre, grocery stores, gymnasiums, and other student life buildings. It is also further away from any upper-year student housing, making this space generally isolated and empty in the evening. The space does however, have potential for use by first year students due to the proximity of first year residences to the Centre.

Tea Room

The Tea Room is in a central location at the corner of Division and Union Street, and close to engineering and science students. Within this hub, the Tea Room is a popular destination for students and faculty especially because of the limited food options in this part of campus. This makes the site not only walkable, but also provides a convenient option for students within the area. Since the Tea Room is located within the Integrated Learning Centre (ILC), pedestrians and automobiles remain unaware
of its presence within the building. There are no signs indicating the location of the Tea Room nearby and because of this, the location is not easily readable. This could easily be ameliorated by the inclusion of signs or wayfinding tools to indicate the presence of the Tea Room inside the ILC. The Tea Room is in the corner of the building with easy access, but the glass walls are reflective so that you cannot see inside the building from the outside. Additionally, the outside doors are locked, making it difficult to read the space and reducing the available options for entering the building. By simply unlocking the doors on a regular basis (with the exception of colder, winter months), accessibility and convenience of the space itself can be improved. This would also provide additional seating space for the already small indoor café, making it a great outdoor patio space and a unique café experience in a different corner of the campus, Figure 4.2.

John Deutsch University Centre Bike Racks

With the exception of convenience, the bike rack area scored nearly perfect on every measure of accessibility, access and linkages. Its central location on campus, at-grade accessibility, existing enclosure, and location adjacent to a busy sidewalk make it an ideal location for a cafe or seating area as seen in Figure 4.3. Furthermore, its proximity to Queen’s Pub and Quiznos, among other eating establishments, make it an ideal spot to sit outdoors and consume food purchased at one of these restaurants. It is also around the corner from the weekly fall farmer’s market, making it a prime location to sit and socialize with friends while enjoying local fare. The space would however, require the removal of the existing bike racks in order to make it accessible to the public as an outdoor seating space. At least two rows of bike racks can be kept at the south end of the space closer to the intersection, to allow cyclists a space to park their bike and sit and relax. This also provides a small buffer between the traffic going through the intersection and the users of the space.
John Deutsch University Centre Khao Outdoor Seating

The outdoor seating outside of the Khao establishment in the John Deutsch University Centre (JDUC) provides a great opportunity to improve public space on campus. Currently however, the space is difficult to read with few welcoming features in the area and cold, concrete tree planters which have not been effective in attracting passersby. It is however, highly accessible with a direct wheelchair ramp leading straight to the sunken-in seating area. It is in a prime location situated directly adjacent to the Athletics and Recreation Centre (ARC), is immediately in front of JDUC, has direct access to several eating establishments, and is close to all the student life activities and centres on campus. The space is difficult to read since the seating area is rarely used by any students or faculty, making this a confusing space to be in. This is because it is not seen as a social space on campus. Furthermore, because this area is sunken into the ground by 1.2m, it may not be directly visible from across the street, making it more of a ‘hidden’ destination to users across campus, Figure 4.4.

Grad Club

The Grad Club scores nearly perfect on every measure provided and acts as a best practice on campus. Its prime location at the corner of Union and Barrie Street and its proximity to downtown make it accessible to those approaching campus from downtown, but is located further from the centre of Main Campus than any other site being considered. Its outdoor patio is both covered and uncovered and provides a barrier for safety by way of landscaped features. It is wheelchair accessible and is well connected to other buildings on either side. The only criticism however, is that the patio is not directly accessible from Union Street. This may make it confusing for patrons who may wish to sit immediately on the patio rather than walk along the outdoor path from the Barrie Street, Figure 4.5 shows Barrie Street entrance. A potential improvement could be to open up patio access to Union Street that is both accessible and easy to see from a distance.

Figure 4.4. John Deutsch University Centre Khao with outdoor sunken seating unused. Source: Tejani (2014)

Figure 4.5. Grad Club at Barrie and Union Street Source: Google Maps (2014)
Below are the results of the six locations evaluated against the criteria.

Accessibility, Access and Linkages Summary

When considering the access and linkages for these various sites, the Grad Club, Agnes Etherington Art Centre, and the John Deutsch University Centre locations prove to be top contenders, with Stauffer Library close behind. The open, central locations of these spaces lend to their success in this evaluation, although each have features that can be improved.

4.3 Activities and Uses

One of the most important criteria is the availability of a variety of functions the space has for users of all ages, genders and abilities. They are the reasons why people choose to visit a space or actively seek it out on a regular basis. The Project for Public Spaces (2015) calls activities the “basic building blocks of a space”. Michael von Hausen (2013) even calls for the “Power of 10”; a basic principle that calls for public spaces that have a minimum of 10 different activities that occur throughout the day, across all seasons. The potential for a variety of uses will be considered thoroughly, using this criterion. We will be asking questions such as; How can the space be used throughout the day? Does it allow for social interaction, or does it promote individual activities? Is there a balance between men and women who visit the site, or does it appeal more to one gender than the other? Can the space be used by all ages? This criterion will help determine the ability of these public spaces to attract people from across the campus to engage in unique and inclusive activities.

Although the results for accessibility, access, and linkages were almost all good to excellent, likely due in part to Queen’s adherence to accessibility guidelines, the activities and uses in these spaces fared poorly for almost every location. This category considered how active spaces were, how varied the ages of its users were, how unique the space was to people, how social those spaces were, and how people used the space throughout the day.

Stauffer Library

Although many activities often occur near the entrance of Stauffer Library (ex. AMS booths during Homecoming, Frosh Week, and throughout the fall), not as many people treat the space as though it is ‘special’. People are not observed taking photos of the space or stopping to admire the space in general. It is however, a popular meeting spot for students all across
campus, with people often socializing near or around the entrances with other friends. Because this space is also welcoming to faculty and families, the age range of its users is quite varied. Recommended improvements to this space may include wayfinding markers at the corner location of the intersection, in front of the Library. This would make the space unique and bring people to the site, but it would also allow people to use the Library as a primary benchmark on campus. Examples of this can be seen at Universities across Canada and North America such as Boston University and Utah State University. Furthermore, outdoor seating and nighttime lighting may allow people to use the exterior space in the evenings. If furniture is left outside for patrons to enjoy into the evening hours, it is recommended that the furniture be chained to the tables to prevent any theft over night.

Agnes Etherington Art Centre

‘Activities’ is one of the weakest overall categories for the Agnes Etherington Art Centre. It scored highest in this category for being a vital space, meaning that a wide range of ages use the space. This is primarily because the Centre can appeal to both young adults and mature users equally. It is also considered a unique or special building on campus, being distinctly modern, sleek, and architecturally beautiful, Figure 4.6. However, we did not observe people stopping to take photos or to admire the space on a regular or even sporadic basis. Aside from this factor however, the area immediately in front or adjacent to the Centre is minimally used; acting almost exclusively as a fore court for the building and a thoroughfare for pedestrians to cross diagonally across the block. Mostly, it is ignored as pedestrians walk past the Centre further down into campus. There are no real outdoor activities in the area to engage users, nor is there ample seating space for pedestrians to enjoy. Furthermore, there are few reasons for people to stop and socialize outside the Centre, making it an often empty and underutilize space. Lastly, the space is only heavily used during special exhibits or events. This means that on the occasional night, the space is also used in the evening however, on a regular basis, there are few activities in the area that would draw pedestrians this far into the campus unless to use the bus stop located conveniently outside the Centre. Figure 4.7 and 4.8 demonstrates at the Vancouver Art Gallery potential outdoor seating near the entrance of the building.

The large, open space in front of the Centre presents opportunities to bring activities and users into the space rather than simply relying on residual
volume from other activities close-by on campus. The Centre should consider hosting programmable activities, like art programs for children in the large open space in front of the main entrance during the summer time. The large frontage has enough space for seating and tables that would allow children and young adults to also engage in the space. Not only would these provisions provide seating space for parents while they watch their children, but it can provide every day seating for employees of the Kingston General Hospital, located just south of the site. This will successfully attract users into the site and will encourage greater use of the area, as it provides a quiet, social seating space away from the busy activity on Union Street and University Avenue.

Tea Room

The Tea Room is located in an active and heavily-used building. Because the cafe is not a standalone building, there are no wayfinding tools indicating its presence in the building, until after you enter the main entrance to the ILC. This gives the Tea Room a special quality for the users of the building and users who know the space well, but generally goes unnoticed by those walking by the space. There is a space outside the Tea Room that was designed to accommodate tables and chairs but very rarely is this space available for users’ enjoyment. Additionally, since the Tea Room is operated by students, the operational hours follow a student’s schedule. This means that the Tea Room is not open during the weekend, closes early during the exam period, and is not operational during the summer. A student run coffee shop such as the Tea Room is a great way to involve students and provide student jobs, but there are still opportunities to improve the experiences of the students using the space itself.
John Deutsch University Centre Bike Rack

The Bike Rack area scored well in this category because of its ideal location on campus. Located directly adjacent to the main intersection on campus, it is often the site of social events, outreach initiatives, farmer’s markets, and is a prime meeting place on campus. It is also located directly in between two main entrances into the JDUC and Stauffer Library. Although the location is not directly used for socializing since bike racks take up the area, the space directly adjacent to it is often busy with a large volume of pedestrians and friends socializing while waiting to meet other companions. The space however, does not necessarily accommodate a range of ages nor is it considered ‘special’, where passersby would stop to take photos and admire the space. While the building itself is architecturally beautiful, the bike racks are old, poorly spaced, and generally not aesthetically unique. Because the ARC and the JDUC host a variety of uses and activities that can run late into the evening, the space around the bike racks is still used throughout the day. The bike racks are also used until winter by users who choose to bike down to Campus, although there are many options for bicycle parking in the immediate vicinity. This space, once improved, can host permanent seating and tables that can be chained in place during the evening to prevent theft. This will provide patrons frequenting the space in the evening, a suitable place to sit and socialize.

John Deutsch University Centre Khao Outdoor Seating

The Khao Outdoor Seating space ranked the poorest for activity and uses, as compared to every other location being considered. This is because the existing seating structures in the space are not comfortable or seen as welcoming, making the space severely underutilized (See Figure 4.4). This is unfortunate, since the original 1970’s design was for a ‘sidewalk café’. The space does not have any users whatsoever and does not provide any opportunity for a variety of ages to use the space. Although it is situated directly in front of the entrance into the lower portion of JDUC and Khao, the site itself is often neglected and ignored. There is also little reason for people to use the space throughout the day, unless they are walking directly past it and back on to the street. The enclosed seating area closest to the entrance should be retrofitted to provide a more comfortable seating option but to also host unique elements such as covered fire pits to keep students warm during the winter months.

Figure 4.9. Fire Pit installed by Project for Public Spaces in a new plaza at Harvard University in Boston, MA. 
This was successfully implemented in the new outdoor plaza on Harvard University Campus, see Figure 4.9. Furthermore, by retrofitting the existing glass wall that separates the interior cafeteria with the exterior space with sliding doors or a retractable glass wall, we can improve the visual connection between the two spaces. It also provides people dining indoors the option to sit up against the wall and seek shelter in a unique patio setting. Glass walls can be easily retrofitted to provide this unique patio experience, and was successfully accomplished at the Stone City Ale on Princess Street, seen below in Figure 4.10.

Grad Club

The Grad Club scored highest in this category for being an active space. It is a local pub located on campus that is regularly frequented by students and faculty alike. Although the outdoor patio space is only used in late spring, summer, and fall, the space directly inside the building is used all year round. Although there is not a lot of space on the sidewalk to stand and socialize, the establishment itself has a large capacity and the ability to host different events throughout the day and week. The only category that the Grad Club did not score perfectly in was whether or not people stop to take photos of the space. Although it is a beautiful converted heritage home, it matches the character of the existing neighbourhood and does not stand out the way the Agnes Etherington Centre does. The space is however, well-known to students and faculty across campus making it a special and beloved space for many.

Activities and Uses Summary

Not many of the locations fared well in this set of attributes. The Grad Club and John Deutsch University Centre do prove however, to be the best options because of the connection to the buildings adjacent to the space. The JDUC hosts many student amenities and is in a central location of campus whereas the Grad Club is a popular space for students and faculty, especially in the warmer months. The Grad Club has more unique qualities than other locations on campus, such as the secluded outdoor patio.
4.4 Comfortable and Good Image

The degree of comfort and the aesthetic appearance of the space play a large role in users wanting to interact with a space. If there are few weather-protection features, uncomfortable seating areas, and if the space feels unsafe, it is unlikely that users will spend extended periods of time in that space or want to use it in the future.

Successful public spaces are those that are litter-free, provide a variety of seats in the sunshine and shade, feel safe to all ages and genders, have protection from the elements and vehicular traffic and make a good impression. The importance of giving users seating options and varying surfaces is also important. It provides people with the opportunity to comfortably adapt to the space and make it their own, either by moving provided furniture around or using it for a variety of purposes like self-reflection or for socializing with friends. Each site will be evaluated for these specific features.

### Stauffer Library

Stauffer Library scored well on almost all measures of comfort and good image. Its prime location on campus, its visibility from the entire intersection, and its wide sidewalks make the space feel safe, with an equal number of women and men using the site. The space is also free of litter and appears to be cared for by both the students and the staff at Stauffer Library. Because it sits on a major intersection, the corner of this site sees a heavier amount of traffic. Its wide sidewalks and the bike lanes present on both University Avenue and Union Street make it a central hub on campus that is used heavily by pedestrians and cyclists alike. Its major weakness however, is that there is a complete lack of seating space or social space for students to use outdoors, with the exception of the concrete slabs along Union Street near the main entrance to the library, see Figure 4.11.

![Figure 4.11. Concrete seating option outside of Stauffer Library.](source: Smith (2015))

<table>
<thead>
<tr>
<th>Activities and Uses</th>
<th>Stauffer</th>
<th>Agnes</th>
<th>Tea Room</th>
<th>J-Duc BR</th>
<th>Kao Outside</th>
<th>Grad Club</th>
</tr>
</thead>
<tbody>
<tr>
<td>Active</td>
<td><img src="image" alt="Circle" /></td>
<td><img src="image" alt="Circle" /></td>
<td><img src="image" alt="Circle" /></td>
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<tr>
<td>Vital</td>
<td><img src="image" alt="Circle" /></td>
<td><img src="image" alt="Circle" /></td>
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<td><img src="image" alt="Circle" /></td>
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<tr>
<td>Useful</td>
<td><img src="image" alt="Circle" /></td>
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<td><img src="image" alt="Circle" /></td>
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<tr>
<td>Sustainable</td>
<td><img src="image" alt="Circle" /></td>
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<td><img src="image" alt="Circle" /></td>
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</tbody>
</table>
Additionally, Stauffer Library lacks the provision of any appealing landscaping like trees and foliage. The existing trees could be integrated into the space more effectively. The addition of planters and moveable seating around the trees to capture the changing shade throughout the day would make a positive addition to the space. The addition of this landscaping would break up the concrete landscape and bring colour and greenery into the space, as was successfully accomplished in front of the New York Public Library in Bryant Park, as seen in Figure 4.12.

This location is also heavily used as a meeting place for students because it is situated almost directly at the centre of most major facilities on campus. People do not however, stay outside this space for extended periods of time, since there is little provision of comfortable seating space. Being so architecturally unique from the older buildings that surround it, Stauffer Library also makes a great impression on passersby in the area. The space along Union Street is also large and open enough to potentially host a good amount of outdoor seating, which would improve its overall image on campus and would easily be visible from all four corners of the intersection at Union Street and University Avenue. The inclusion of public art by local artists may also serve to make the space more unique and appealing to students and faculty in the area. Unique elements like these were incorporated into a pop-up park which was recently made permanent in Yarraville, Australia, in the form of structural, man-made trees and landscaped seating blocks (see Figure 4.13).

**Agnes Etherington Art Centre**

Although the space is wide and open, as you walk closer toward the entrance, the space is more concealed by trees that are located off to the
side of the wheelchair ramp, leading up to the main entrance. Because this location has a deep setback from the sidewalk and has a change in grade, this could be seen as a barrier for users. These features do not make the space inviting. Aside from this however, the space is open enough to make all its users feel safe and is ideally situated on a corner block, providing views into the site from two corners of the street. The space is also regularly cleaned and is often free of litter. Large sidewalks and bike lanes also make this space easily accessible by all users, not just vehicles. Additionally, while the space is aesthetically appealing and makes a strong impression on passersby, there aren’t many people who actually stop and socialize in the space itself. It is situated directly in the middle of several historic buildings, further juxtaposing its modernity against the limestone buildings that surround it. The use of comfortable outdoor seating space might improve the use of the space. It will also change users’ perception of the space as being merely a through way space, and instead make it a destination on the south end of campus.

Tea Room

The Tea Room scores averagely in this set compared to the other locations. The space is clean and has an attractive setting. The ILC has an architecturally beautiful interior and exterior, but the Tea Room does not take advantage of the available outdoor space. There are large planters outside the Team Room with an attractive plant design where the Tea Room could set up tables and chairs continuously (see Figure 4.14). There are no other outdoor seating options in the vicinity and having this amenity in a beautiful setting would make the location very popular. For this reason, the Tea Room received a poor rating for the sittability of the space.

John Deutsch University Centre Bike Racks

While the bike rack area scored well in other categories, it did not score as high on comfortability and image. Currently, the bike rack area has
absolutely no sitting space for users. It is completely occupied by rows of bike racks without any room for makeshift seating, unless some rows are removed. Although nestled up against a historic building and adequately shaded by a large tree, the bike racks are not overtly charming or appealing. The space does however, have the potential to be extremely attractive if rows of racks are relocated and replaced with seating space. This would vastly improve the charm and image of the site, as it exists today. Some improvements to the space might include the addition of benches against the far wall of the John Deutsch building to provide additional seating options as well as some small-scale pedestrian lighting in order to better illuminate the space, which sits in the shade the majority of the day. This lighting can reflect the existing character of the pedestrian lighting situated around campus or specifically, as an extension of the lighting fixtures currently in place at Stauffer Library. The addition of seasonal planters will also bring character to the space. Other character defining elements can include tree lights (see Figure 4.15), since the existing tree in place is one of the more prominent features of the space.

This could be an extension of the Stauffer Library tree lighting initiative and will create a greater connection and relationship between these spaces. Different seating options and string lights were used in the popular Spruce Street Harbour Park in Philadelphia, PA (see Figure 4.16). Similar seating can be chosen for this space should use a tri-colour palette, as determined at the discretion of a professional designer, to reinforce the University's identity.


Although the space is not necessarily strewn with litter, it is clear that it is not necessarily as heavily maintained as other, more open spaces on campus. The addition of a waste disposal bin in the space will allow people to dispose of trash after using the space, giving users a greater sense of ownership and pride over the space. The space feels safe overall, with a number of limestone barriers separating the space from pedestrians and is ideally located at the corner of a heavily-used intersection. This ensures
that the space is monitored by other pedestrians and users for most hours of the day and evening. As a measure to prevent theft however, tables and chairs can be chained together over night and unlocked the next day.

John Deutsch University Centre Outdoor Khao Seating

This space had rankings that were more polarized than any other location being considered on campus. The space is in a heavily-used area of campus and feels equally safe for both men and women. It is also completely free of litter and can generally be used more heavily by pedestrians and cyclists. Although there are provisions for seating in the space, it is vastly underutilized by students and faculty. If the concrete planters and seating space were completely removed and replaced with movable, comfortable chairs and tables, passersby may feel more inclined to actually use the space. This site should however, consider greater use of tables with umbrellas, since there are few provisions to protect users from direct sunlight. Directly diagonal from this space is an additional alcove of seating space immediately next to the entrance of the JDUC. This space is also vastly underutilized but provides protection from wind and sun and would make a great social space (see Figure 4.17).

The removal of the existing seating space and the installation of improved seating or benches will make the space more comfortable to sit in and will encourage users to stay in the space. Additionally, the existing planter located in the center of the alcove can be replaced with a fire pit for users in the colder months of the year. This will provide incentive for students to use the space year-round, rather than just in warmer months. A partnership for this service would likely have to be formed with the maintenance crews assigned to the JDUC or with Physical Plant Services to keep the fire pit running during winter months. As it exists however, neither of these areas are constructed or presented in a manner that is attractive or charming to users. Its lack of physical comfort (seating) make it an unappealing place for people to stop and socialize. These two seating spaces are however, properly nestled beneath a row of shrubs and are up against the JDUC, which give it protection from wind coming from the east. The existing shrubbery can be complemented by the addition of seasonal vertical plantings up the concrete wall inside the space. This will bring more greenery into the site and improve the overall image of the space. This was done at Singer Hill Café in Oregon City, OR and is a similar although more elaborate version of what can be implemented outside of the JDUC (see Figure 4.18).
The Grad Club, an already established patio with outdoor seating, has provided an excellent example of how to provide comfort and the feeling of safety for users that occupy the space adjacent to a heavily-used traffic intersection. The space is only used while the facility is open, which means it is constantly monitored by staff and other users. It is regularly cleaned and maintained and can be accessed equally by vehicles, pedestrians, and cyclists, as there is bicycle parking and on-street vehicle parking located directly outside the facility. Furthermore, it already has moveable seating that is ideally located in the shade and has a vegetation buffer from the street, which offers just enough privacy for its users but still allows great views of the street and of City Park (see Figure 4.19).

Because of its social nature, people not only stay in the space for extended periods of time but also actively travel across campus to visit the space.

Comfort and Good Image Summary

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Stauffer</th>
<th>Agnes</th>
<th>Tea Room</th>
<th>J-Duc BR</th>
<th>Kao Outside</th>
<th>Grad Club</th>
</tr>
</thead>
<tbody>
<tr>
<td>Safe</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
</tr>
<tr>
<td>Clean</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
</tr>
<tr>
<td>‘Green’</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
</tr>
<tr>
<td>Sitable</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
</tr>
<tr>
<td>Charming</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
</tr>
<tr>
<td>Attractive</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
</tr>
<tr>
<td>Historic</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
<td>•</td>
</tr>
</tbody>
</table>

Table 4.3. Evaluation of comfort and good Image for six chosen sites.
4.5 Sociable

This criterion was used to evaluate whether or not people use this space to socialize or interact with other members of their community. We tested the space to see whether or not it is a place where people choose to meet their friends and colleagues, or if it is solely a space that people pass through to reach their final destination. When people choose to interact in spaces consistently or regularly, it shows a sense of attachment to these spaces in their community. It means that there is potential for enhancing the space for its users and providing more elements of comfort and opportunities to engage in activities. A measure of success is when community members bring friends to the space or point out notable features of the site, exhibiting a sense of pride and ownership of the space (Project for Public Spaces, 2015). Another measure of this is whether or not people take initiative to self-govern the space by picking up litter and maintain the area. Lastly, this criterion measures how people interact in the space; whether or not they smile at one another, make eye contact, interact in groups and even with strangers. This ultimately shows that people enjoy the space and feel comfortable in it.

Stauffer Library

The sociability of a location takes into account a number of qualities that make a space heavily used and Stauffer scores well in many of these categories. Stauffer Library is a monumental building on Queen’s Campus and is easily recognizable, which aids in the pride that students and faculty have for it. The way the building is designed with access all around the corner of Union Street and University Avenue means that it is welcoming, interactive, and user-friendly. This is demonstrated by the many organizations that hold their events outside Stauffer (see Figure 4.20).

![Figure 4.20. Campus Organizations holding events outside of Stauffer Library. Source: Koebrich (2013)](image)

The space is unobstructed by other functions and structures, which helps make the space readable and in turn gives the sense of comfort. What Stauffer Library lacks is stewardship. Only the front entrance and paved area have a sense of ownership and stewardship because of the frequent use by students. If there was outdoor seating on the west side of the entrance by the café inside, more spaces around library entrances would have frequent users. This may improve the sense of stewardship for this space. A partnership can be made between the café inside Stauffer and the library that can provide jobs for students. By giving the responsibility and opportunity to students to create a space on campus for people to enjoy, a greater sense of pride and stewardship may be formed. Stewardship also helps give the space a feeling of ‘roots’ or ownership, which relates to the
feeling of pride. Introducing seating will also make the space more sociable because it gives users a space to sit, relax and enjoy.

Agnes Etherington Art Centre

The location does not present itself as a sociable space. The space is aesthetically pleasing but the lack of interaction with the sidewalk and surrounding functions do not serve the Gallery or the campus well. It does not appear that the actual location is friendly because of the lack of users outside of the Agnes Etherington Art Centre. If there was seating for users that would allow them to sit and stay in the space, it would create a more welcoming, interactive and friendly environment. Additionally, because the Art Centre is only known for its exhibitions and not the shop inside, users do not perceive the site as being diverse, with a range of activities to engage in. However, by incorporating seating outside with signage, the space has great potential for become a popular location on campus because of its unique function and beautiful appearance. By indicating that there is a shop indoors and by providing signage on current exhibits, it will also bring users into the site and allow them to explore the Centre; something they may not have done before.

Tea Room

The Tea Room is in a very sociable location and is a popular spot with students and faculty. This is difficult to see from the exterior of the café. The lack of seating outside the Tea Room does not complement the space. This is demonstrated in the scores it was awarded for sociability.

Even though the indoor cafe is very popular, by not expanding to the available space outside, users are not able to effectively admire or enjoy the space that the Tea Room has to offer. The outdoor space has shade, room for tables and chairs and is in a popular location for engineering and science students. There is also a food truck across the street which would make the outdoor seating a popular destination. By restricting access to the space outside the Tea Room, it does not make the location as interactive or welcoming.

John Deutsch University Centre Bike Racks

This location has great potential to be a sociable space. By removing some of the bike racks and placing tables and chairs, people will be able to sit and relax in a central location on campus with a pleasant atmosphere. This atmosphere lends to the positive score in this criteria because of the open and readable location. There is one solid wall which gives users a sense of security and the tree canopy overhead which provides dappled sunlight. These qualities make the location welcoming and friendly. By integrating tables and chairs, this would lend to the sense of pride the location can have. It would demonstrate that Queen’s values its campus and can utilize unique and different spaces on campus for more than one use.

John Deutsch University Centre Outdoor Khao Seating

This location in its current state does not demonstrate the pride and neighbourly characteristics that Queen’s has. The space is unused and feels forgotten.
But because of its unique qualities and its proximity to amenities, it has the potential to be a successful location for outdoor seating. The lack of flow in the site and its unsuccessful features such as the unused planters, reflects in the poor score. The location does not have a sense of pride, welcoming or friendly characteristics that the JDUC and other locations have. These characteristics are vital for a successful social space because people will not use the space if it does not appear friendly or welcoming. By improving the seating and aesthetics of the location, this would greatly improve the image and sociability of the space.

Grad Club

The Grad Club has the best sociable outdoor space on campus. This is achieved by the qualities that are present in the criteria. You can sense the pride and care that the staff at the Grad Club have for the space and this translates into a neighbourly, welcoming, interactive and friendly space. The Grad Club offers different seating for users inside and outside as well as covered seating outdoors. Landscaped features such as hedges, plantings and trees throughout the patio give it an aesthetic quality that is lacking in the other sites on campus. Having the space continuously monitored and cleaned gives the user a positive impression of the space and emulates a sense of pride and ownership over the space. The Grad Club is a well-established social hotspot on campus that demonstrates outdoor seating can be implemented on campus with success.

Sociable Summary

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Stauffer</th>
<th>Agnes</th>
<th>Tea Room</th>
<th>J-Duc BR</th>
<th>Kao Outside</th>
<th>Grad Club</th>
</tr>
</thead>
<tbody>
<tr>
<td>Diverse</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
</tr>
<tr>
<td>Stewardship</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
</tr>
<tr>
<td>Neighbourly</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
</tr>
<tr>
<td>Pride</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
</tr>
<tr>
<td>Friendly</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
</tr>
<tr>
<td>Interactive</td>
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<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
</tr>
<tr>
<td>Welcoming</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
</tr>
</tbody>
</table>

Table 4.4. Evaluation of sociability for six chosen sites.

4.6 Summary of Evaluation Criteria Results

Through the evaluation criteria, it is clear that there are two front-runners in the evaluations that present themselves as the most successful candidate for the implementation a pop-up café. These two locations are Stauffer Library and The Grad Club. The six locations all have positive traits in each criterion but seemingly lack in criteria contingent on location, the surrounding land uses and the amenities available in the area.
Many locations lack the exposure to pedestrians. The Tea Room, Agnes Etherington Art Centre, and the John Deutsch University Centre Outdoor Khao Seating Area lack the visibility and imagination to turn the space into a pop-up café space. These locations have good physical accessibility but the form and function of the spaces lack in criteria such as: the activities and uses of the space, the sittability and attractive qualities, and diverse, welcoming and interactive characteristics. Stauffer Library and The Grad Club have these qualities and demonstrate in the criteria that they are the best options for a pop-up café. Since the Grad Club already hosts a successful outdoor social space, Stauffer Library has been selected as the best option for a pilot project.
Chapter 5: Pilot Project

One objective for this report was to conduct a pilot project of a pop-up café on Queen's University campus. As a result of the evaluation criteria above, Stauffer Library presents itself as the best candidate for this project. To complete a project like this, it requires a great deal of cooperation, preparation and observation. (Figure 5.1)

By using Stauffer as the pilot study for the report, preliminary hypotheses were made for the outcome of the project. Since Stauffer is in a central location on campus, we assumed the pop-up café would be used heavily. This is because of the visibility to pedestrians and cars as well as the café located inside of the library. Additionally, the results of the evaluation criteria led us to believe that Stauffer Library presents itself as the best candidate for what Project for Public Spaces (PPS) considers a ‘good public space’. Our hypothesis proved to be true as the pop-up café implemented outside of Stauffer Library was a clear success.

Ideally, a pop-up café would be implemented in warmer months but because of the time constraints for this report and the availability of furniture, the pop-up café was implemented in October. During this time there was less than ideal weather, with several rainy and windy days during the duration of the pop-up café.

A partnership was formed with Queen’s Chief Librarian, Martha Whitehead (Figure 5.2), to implement the project. Ms. Whitehead borrowed outdoor furniture from the City of Kingston and we agreed to conduct a rigorous evaluation of the project. An agreement was made to allow us to observe and use the furniture for the project as long as we could ensure that furniture was set up and taken down and protected from theft during the dates Ms. Whitehead had chosen. Several meetings took place with Ms. Whitehead and her staff to set up dates and times for the pop-up café as well as different configurations for the furniture.

Figure 5.1. Pop-Up café outside Stauffer Library. Source: Tejani (2014)

Figure 5.2. Martha Whitehead and Kathy Christmas. Source: Tejani (2014)
To record our results of the project, a video camera was used to film the space. We then counted the number of people using the space from the recorded footage. Another partnership was formed with Economics graduate students whose third floor office in Dunning Hall overlooked Stauffer Library. A video camera was set up on a tripod looking out a window to film the space for the duration of set-up and take-down for the pop-up café. The camera was checked upon every four hours and during each checkup, pictures were taken of the pop-up café (Figure 5.3).

To gather the results of the café, the total hours of footage needed to be observed and counted to determine the total number of users in the space. A total of twenty hours were filmed (including a day without the café) to gather an understanding of how the space was used during all hours of the day; there was full coverage of the time the pop-up cafe was in use, plus plus six and a half hours without the café on a similar day.

The dates that were chosen for the pop-up café were October 16th, 17th, and 18th. These dates also aligned with Queen’s Homecoming activities (Figure 5.4). October 22nd was chosen to observe the space without hosting the café to complete a comparison. This comparison would look at the results of how many people used the space outside of Stauffer when there was not any furniture present and when the pop-up café was implemented. This would provide clear results to understand if people used the space beforehand or if the furniture led people to stay and enjoy the space.

Figure 5.3. Image taken of pop-up cafe from observation room.
Source: Tejani (2014)

Figure 5.4. Students using pop-up cafe during Homecoming.
Source: Tejani (2014)
The total amount of time the café was set up was twelve and a half hours. The times the café was set up were: Thursday October 16th - 10:30-4pm, Friday October 17th - 12-4pm, and Saturday October 18th - 9am-2pm. Wednesday October 22nd was recorded between 11:30-5pm, and was identified as a ‘normal day’. These times are closely related to a student’s time on campus and as an agreement with Martha Whitehead, the café was taken down no later than 5pm.

Despite the inclement weather on three of the four days and the other activities happening on campus, the pop-up café was well used (Table 5.1 on page 5-4). One of the three days generated one hundred and ninety-five people using the space (Figure 5.5). The average number of people that used the space on the four days, excluding the 16th was fifty-two. This is a reasonable amount of people compared to the space before the furniture which had up to twenty-two people staying in the space for shorter periods of time. Comparatively, people stayed in the space for longer periods of time after furniture was added to the space. A comparison of similar hours during a weekday with furniture and a weekday without furniture shows that an average of four people used the space during 12pm – 4pm on a weekday without furniture, as compared to an average of 41 people that used the space during the same time period on a weekday with furniture.

Our results of the project strongly show that the implementation of a pop-up café on a permanent basis can be situated outside of Stauffer Library. The concerns of whether the furniture will be used are proven in the results that demonstrate that users will occupy the space even in poor weather conditions (Figure 5.6). With more time to arrange partnerships, collaboration should be made with the café inside Stauffer Library to manage the space outside.
<table>
<thead>
<tr>
<th>Date</th>
<th>Type of Day</th>
<th>Hours of Observation</th>
<th>Number of users per hour</th>
<th>Total number of users per day</th>
<th>Average Temperature during the Café Hours*</th>
<th>Total Precipitation during Café Hours*</th>
<th>Approximate Wind Speed during outdoor café hours*</th>
</tr>
</thead>
<tbody>
<tr>
<td>Thursday, October 16th</td>
<td>Normal day with outdoor furniture</td>
<td>10:30am-4pm</td>
<td>10:30am - 11am: 0</td>
<td>195</td>
<td>17°C</td>
<td>8mm</td>
<td>19km/h</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>11am - 12pm: 32</td>
<td></td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td></td>
<td>12pm - 1pm: 41</td>
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<td></td>
<td></td>
<td></td>
<td>2pm - 3pm: 33</td>
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<tr>
<td></td>
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<td></td>
<td>3pm - 4pm: 26</td>
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<tr>
<td>Friday, October 17th</td>
<td>Outdoor furniture and Homecoming activities</td>
<td>12-4pm</td>
<td>12pm - 1pm: 7</td>
<td>31</td>
<td>14°C</td>
<td>0.8mm</td>
<td>28km/h</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>1pm - 2pm: 13</td>
<td></td>
<td></td>
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<tr>
<td></td>
<td></td>
<td></td>
<td>2pm - 3pm: 6</td>
<td></td>
<td></td>
<td></td>
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</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>3pm - 4pm: 5</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Saturday, October 18th</td>
<td>Outdoor furniture and Homecoming activities</td>
<td>9am-2pm</td>
<td>9am - 10am: 1</td>
<td>74</td>
<td>10°C</td>
<td>1.4mm</td>
<td>21km/h</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>10am - 11am: 11</td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td>12pm - 1pm: 29</td>
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<td></td>
<td>1pm - 2pm: 14</td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Wednesday, October 22nd</td>
<td>Normal day without furniture</td>
<td>11:30-5pm</td>
<td>11:30am - 12pm: 1</td>
<td>22</td>
<td>9°C</td>
<td>Information not available</td>
<td>24km/h</td>
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<tr>
<td></td>
<td></td>
<td></td>
<td>12pm - 1pm: 6</td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td>1pm - 2pm: 2</td>
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<td></td>
<td>4pm - 5pm: 5</td>
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<td></td>
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<td></td>
</tr>
</tbody>
</table>

Table 5.1. Number of People and weather conditions using the outdoor Stauffer Library Space.

*Average temperature, precipitation and wind speed may vary slightly because weather information is taken at the Kingston Airport.
*Data taken from Government of Canada Climate recordings (Environment Canada, 2015)
*October 22nd was used to record activity on a day without the pop-up café to compare usage.
*Wind speed gathered by adding wind speed for observation hours and dividing the number by the total number of observation hours
Chapter 6: Recommendations

The following recommendations were developed and informed by the findings from the evaluation conducted for each site. These recommendations provide a range of permanent and semi-permanent options to improve the quality of these public spaces on the Queen’s Main Campus. The majority of these recommendations have the potential to be tested first, as a pilot project, to ensure success upon permanent installation. Once the success of the space has been measured and evaluated in a manner similar to the methods executed in this report, provisions can be made to include more permanent place-making and character-defining elements.

Stauffer:

1. Provide clear signage for entrance options. Unlocking all doors will allow for through-access and help improve readability of the space.
2. Adding movable chairs, tables, and umbrellas that are comfortable, accessible, and visible will provide greater opportunities for students and faculty to stay in the space rather than simply passing through it.
3. The inclusion of way-finding markers at the corner of Union Street and University Avenue will make the space unique and bring people to the site, but will also allow people to use the Library as a primary benchmark on campus.
4. Chain furniture during the evening or set up appropriate schedule for take-down crews.
5. The addition of planters and moveable seating around the trees will capture the changing shade throughout the day and would make a positive addition to the space.
6. If there is outdoor seating on the west side of the entrance by the café inside, the space will have a greater sense of stewardship. The introduction of an outdoor seating space for students may lead them to feel pride and care for the space.
7. Introducing seating will also make the space more sociable because it gives users a space to sit, relax and enjoy.
8. Keep the Library Café open in the Spring and Summer and have the operators responsible for the outdoor seating.

Agnes Etherington Art Centre

1. The use of comfortable outdoor seating will improve the sittability of the space. It will also change users’ perception of the space as being merely a through way space, and instead make it a destination on the south end of campus.
2. The provision of outdoor seating would also provide seating for employees of the Kingston General Hospital, located just south of the site. This will attract users into the south end of Queen’s Campus and can encourage greater use of the area. It will provide a quiet, social seating space away from the activity on Union Street and University Avenue.
3. Provide signage to indicate the presence of ongoing exhibits indoors. It will bring users into the site and allow them to explore the Centre.
4. The Art Centre should host programmable activities such as art programs for children that can utilize the outside space during the summertime. The large frontage can accommodate seating and tables that would allow children and young adults to also engage in the space.
Tea Room

1. Open the existing glass doors to improve accessibility and convenience to and through the interior café.
2. Have way finding tools and signs to indicate the presence of a café inside and to improve readability of the space.
3. Configure tables and chairs to allow for partial shade and sun exposure in order to improve comfortability for all users in the space.
4. Extend café service out to the patio area and allow patrons to bring food and beverages outdoors.

John Deutsch University Centre Bike Rack

1. Relocate the existing bike racks in order to make it accessible to the public as an outdoor seating space. Keep a set of two rows of bike racks at the south end of the site to provide opportunities for cyclists to park their bikes there and enjoy the space. It will also provide an additional barrier away from the busy intersection of Union Street and University Avenue. The remaining bike racks could be located across the street near Stauffer Library or near the south corner of John Deutsch University Centre.
2. Have benches along the wall adjacent to the John Deutsch University Centre to provide a range of seating options.
3. Include landscaped features or planters in the area to add character and greenery into the space.
4. Provide string lighting in the trees to add character as an extension of Stauffer Library tree lighting and to improve the image of the space.
5. Include small-scale pedestrian lighting as an extension from the existing lighting configuration outside Stauffer Library such as the lamp posts and elsewhere on campus.
6. Include a waste disposal bin for users in the space to allow for continuous maintenance of the space and to instill a sense of stewardship in the users of the space.
7. Chain the furniture together to prevent theft over night. Arrange a partnership with either maintenance crews in charge of the John Deutsch University Centre or Physical Plant Services to lock and unlock furniture each day.

John Deutsch University Centre Khao Outdoor Seating Area in Front of Glass Wall:

1. Remove existing concrete planters and seating completely and replace with inexpensive, moveable, comfortable seating space. Consider including additional umbrellas to provide shade from excessive sunshine in the space.
2. Install seasonal vertical plantings along the interior cement wall to complement existing shrubbery that separates the seating space from the sidewalk. This also improves the comfortability and micro-climate of the space.
3. Retrofit the existing glass wall that separates the interior cafeteria with the exterior space with a retractable glass wall. It will provide people a unique patio setting while observing the outdoors. The provision of the outdoor seating space and the open wall also makes users of the outdoor space feel a part of the activity occurring indoors. In the short-term, doors should be unlocked and kept open for users to improve the readability of the space.
4. Provide outdoor waste disposal bins so that users can have a sense of
stewardship over the space and engage in daily maintenance.

Alcove Area:

1. Replace concrete seating with benches or improved seating spaces.
2. Replace existing central planter in the alcove with covered fire pit.
3. Develop a partnership to ensure that the fire pit is being used for certain months of the year and during a set schedule.

Grad Club

1. Open up patio access from Union Street so that it is both accessible and easy to see from a distance

As a result of the evaluation conducted, combined with the recommendations that require the least amount of retrofitting, we recommend that the John Deutsch University Centre bike racks be the chosen site for another pilot project. This was chosen because the existing bike racks on site can be unscrewed, removed, and placed elsewhere on campus. This would open up the space and provide a large area for the implementation of a pop-up café. The existing physical barriers from pedestrian and vehicle traffic also make it an attractive place for users in the summer and late fall.
Chapter 7: Next Steps

After the implementation of the pilot project at Stauffer Library, it is clear that the incorporation of an outdoor, permanent seating space can be proposed. To ensure that this initiative can be successful in the warmer, operational months, several conditions that affect this type of project need to be identified. These include maintenance to ensure longevity and cleanliness, the costs associated with this project, liability, effectiveness, and limitations.

A maintenance plan should be proposed for all parties involved in order to guarantee the success and permanency of the café seating for years to come. The main parties involved are Stauffer Library, The Library Café, University Food Services and Queen’s University campus maintenance crews. This maintenance plan will need to identify the ownership of the outdoor seating as this dictates the responsibility for set-up and take-down each day. It is identified in the Campus Master Plan for Queen’s University that the University Food Services is an option to form a partnership with for management and implementation of cafes across campus. The plan will need to identify the location of storage of furniture overnight and during winter months, unless the furniture is locked in place on the site to prevent theft. A partnership with campus maintenance crews should be formed to keep the space clean and litter free. If the outdoor café space is proposed to be operational later in the evening, safety of users should be considered and options for illuminating the space at night should be explored. Stauffer Library already has an existing lighting plan for the trees on site, so an extension of the plan could be made to light the outdoor café space. An outdoor café can range from simplistic and minimalistic in nature, to elaborate and expansive. Depending on the ownership and partnership of the café space, the cost of implementing specific elements or features in the café will range. At a minimum, there should be a range of tables that can sit four people and tables that can sit two, all with moveable seating. The larger tables for four people should have umbrellas to provide shade for users. Based upon similar projects identified through best practices and the environmental conditions of the region, this furniture should be made of durable material that can withstand the rain, sun and constant movement. In keeping with the image of Queen’s University, the furniture in the space should be of high quality to provide a pleasant experience for students, staff, faculty, alumni and visitors.

Additional elements that can be added to the space but are not required for its success are planters, string lighting and public art. Planters will soften the hardscape in the area and provide a pleasing visual element in the space. Depending on the plant material chosen, a microclimate effect can help with the cooling and wind in the area. String lighting can be an extension of the previous Stauffer Library lighting initiative and will build a stronger connection between the two spaces. Public art could be supplied by existing art communities and galleries in the area. Union Gallery is situated in Stauffer Library, as is the Fine Arts program at Queen’s University. A partnership can be made between the organizations to support local artists by displaying their art.

The liability of a permanent feature like an outdoor café is an important consideration. The University will need to devise a plan for student safety and security while Stauffer Library should create one specifically for furniture and other elements in the space. If the Library Café serves...
customers outside, they will also need to create a plan to address liability. Careful consideration should be made for accessibility of all users of the space and access to the library so that the proposed furniture does not hinder access to the library.

In order to ensure the longevity of an outdoor seating space, the success and effectiveness of the café needs to be monitored. A method to monitor the space for continued use can be through weekly reports to Stauffer Library. This will provide Martha Whitehead, the Chief Librarian, information on the type of uses in the space and if any changes need to be made. Reports can include who the users of the space are, what activity is taking place, and peak times of usage. This can help with decisions on whether more furniture is needed. If the seating space is heavily used, this means that there is a demand for more outdoor seating space on campus. If a conclusion was made that there should be more locations on campus for outdoor seating, then the other locations identified in this report should be considered.

Another method of monitoring the space can be done through The Library Café staff. Serving customers outside would allow them to see the space used throughout the day. Additionally, a questionnaire could be made for people using the outdoor space to provide feedback and opinions for improvement and enjoyment of the space.

Future Research

Should this pilot project be replicated elsewhere on campus, several limitations must be acknowledged first. The outcome of the pilot project was successful and achieved the original goals set out for the implementation of the café. However, if time permitted, we would have chosen to conduct the pilot project at the beginning of the year when the weather was significantly better. This would require all preliminary work to be completed earlier in the fall semester in order to monitor and effectively analyze the results of the pop-up café. A lack of public feedback has also prevented an understanding of the particular needs of the users in the space. Had this feedback been collected, there could have been additional user-based recommendations provided for the installation of a future, permanent Café. Additionally, we would attempt to form a partnership with The Library Café in order to determine whether or not the outdoor café could potentially improve the overall sale of goods. Additional consultation with appropriate planning, funding, and maintenance staff would have also proved helpful in better understanding the impediments to implementing, maintaining, and funding this public space initiative. Future undertakings should establish these partnerships and begin the dialogue about practical implementation strategies for permanent installations.

If this research project were replicated, we would recommend setting up the pop-up park at a time more suitable for use by students, faculty, and alumni. Our results showed that the café was not used before 10am on any given day, and minimally between 10am – 11am. Therefore, we recommend coordinating the set up for a future pop-up café at approximately 11am on a weekday. We would further recommend altering the evaluation criteria. The existing set of criteria that informed the evaluation of the six sites on campus was developed primarily from Project for Public Spaces. After applying the evaluation criteria to the project, we discovered that not all of the criteria were applicable to this project. The criteria that were questionable were ‘vital’, ‘sustainable’ and ‘green’. Arguably, these criteria are important to consider for any good public space, but found that it
overlapped with other criteria we used and were too broad for the spaces examined. ‘Vital’ refers to if there are people of varying ages in the space. This topic is already covered by ‘Active’, ‘Special’ and ‘Diverse’, and was therefore redundant to include in the list of criteria. ‘Sustainable’ refers to if there are people using the space throughout the day. Since the pop-up café is located centrally on Queen’s campus, students typically use the area throughout the day. Additionally, ‘Sustainable’ could be re-cast to something more descriptive such as ‘degree of usage’ or ‘occupancy’.

‘Green’ refers to where there are many vehicles using the space and the different kinds of transportation in the area. The Project for Public Spaces uses this evaluation for parks, public spaces and other locations in cities. As transportation typically isn’t the focus on campuses, ‘green’ could be omitted. This is especially so, since Stauffer Library and many of the other sites do not have parking connected to their location.

Consideration should also be made for whether the criteria can be applied to northern climates where there are four distinct seasons. For the case of Queen’s campus, outdoor seating will not be used as extensively during the colder months. Evaluation of the space needs to adapted to reflect the conditions of that particular space.

Finally, a university campus presents itself as a unique area within a city. It attracts diverse groups of people ranging from all ages and evaluations should adjust for these qualities. For future studies on tactical urbanism, the same evaluation criteria could be used but should include further exploration into similar criteria, specifically for colder climate regions. A closer examination of the criteria should be made to determine if there is an overlap in the criteria to prevent repetition. Lastly, there should be an analysis of public feedback on such initiatives. Because Universities present a unique clientele, the opinions and feedback of its users should be collected and analyzed so that the space may be improved over time and so that it reflects the needs of its users. We recommend leaving comment boxes on each table with short forms that would allow users to reflect on their experience there. Positive feedback can also provide the support required to keep the pop up café installed on a permanent basis.
Chapter 8: Conclusion

Tactical Urbanism is an opportunity to invigorate public places and transform these spaces into destinations rather than underutilized spaces in communities. This initiative is an opportunity for public spaces to be retrofitted and tested to determine if they can become active and vital spaces in a community. This report identified six locations on Queen’s Campus that were evaluated to determine if they could be revitalized into social hubs on campus. Stauffer Library was selected as the best contender out of the six locations as determined by the evaluation criteria. The ultimate goal of the report was to reinvigorate a space on Queen’s campus using a pop-up café to provide the students, faculty, staff, and visitors with an outdoor seating space to enjoy the beautiful campus.

Through the evaluation, it was identified that Stauffer is the most active, walkable, sociable, charming and welcoming site of the six that were evaluated. Because of these qualities, it was chosen to be the location of a pilot project. This pilot project saw the implementation of tables and chairs outside of Stauffer Library for the duration of three days, two of which hosted Homecoming activities. A partnership was formed with the Queen’s head librarian Martha Whitehead, to implement the project in conjunction with Stauffer Library’s LAMP (Library and Archives Master Plan). During the pop-up café’s operation, it was observed that an outdoor café space can be successful on Queen’s campus. This was proven through the pilot project which attracted an average of 41 people between 12pm – 4pm on one operational weekday afternoon, as compared to an average of four people on a typical weekday afternoon without outdoor seating. Despite less than ideal weather conditions and other activities occurring on campus, the pop-up café was well used and proved to be successful. As a result of this pilot project, it is recommended that Queen’s University implement a permanent café space outside of Stauffer Library.

There are several concluding recommendations that can be made for future tactical urbanism project endeavors:

**Build Strong Partnerships and Collaborations**

Regardless of where the project may be implemented, partnerships and collaboration are vital to the project’s success. Since projects of this type are mainly implemented outdoors, there are a variety of groups who own, manage, or maintain the space. A meaningful connection should be developed with these individuals to improve the space so that all parties have access to valuable information from the outcome of the project. More specifically, partnerships should be made at Queen’s University with the Campus Planning staff, maintenance crews, and appropriate funding parties for any future undertakings on campus. This will promote dialogue about the reality of implementing, maintaining, and funding these space-making initiative; the feasibility of which are often determined by budgetary constraints.

**Plan and Test**

Gather and test all necessary equipment to measure and observe the project. This ensures all information can be gathered about the space without learning about gaps in the analysis stage. This includes testing all equipment, managing schedules of all individuals involved and being prepared for all types of weather. Prepare back-ups of equipment, materials and alternative dates in case of last minute changes. Collecting public feedback is also a crucial step in testing the effectiveness of these
public space improvements. It will allow the users of the space an opportunity to provide recommendations for a permanent installation that meet the needs of those users.

**Timing is Important**
Understand the user demographic and the times they would use the space; try to implement the project during these times of year and day. If this means that the user would only use the space in warmer weather, the project should be planned during this time to make an accurate conclusion about the outcome of the project.
References


Image Sources


Appendix:

Evaluation Criteria Used to Evaluate Public Space for Tactical Urbanism

Rating System to be used:
This evaluation criterion was developed referencing Natland, 2003, p. 27-30.

<table>
<thead>
<tr>
<th>Does not satisfy criteria</th>
<th>Poor</th>
<th>Fair</th>
<th>Good</th>
<th>Excellent</th>
</tr>
</thead>
</table>

Attributes: Accessibility, Access and Linkages
This evaluation criterion was created using Gehl, 2010, p. 239, Project for Public Spaces, 2014, and Orovan, 2011.

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Measurement</th>
<th>Score</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Continuity</td>
<td>Are there void spaces between buildings or a connected flow?</td>
<td></td>
<td>Gehl, 2010, p. 239</td>
</tr>
<tr>
<td>Proximity</td>
<td>Is it in close proximity to amenities?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Connection</td>
<td>Is there a good connection between buildings, sidewalk and pathways?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Readable</td>
<td>Is it easy to understand the space or is it disorganized and dysfunctional?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Walkable</td>
<td>Are there sidewalks? Are they in good condition, wide enough?</td>
<td></td>
<td>Gehl, 2010, p. 239</td>
</tr>
<tr>
<td>Convenient</td>
<td>Is the space in a bad location or difficult to access? Are bus stops near the space?</td>
<td></td>
<td>Gehl, 2010, p. 239</td>
</tr>
<tr>
<td>Accessible</td>
<td>Are there curb cuts, enough space for users? Are there fences or other barriers? Does the space function for people with special needs?</td>
<td></td>
<td>Project for Public Spaces, 2014 and Orovan, 2011</td>
</tr>
</tbody>
</table>
Attributes: Activities and Uses
This criterion was developed using Gehl, 2010, p. 239, and Project for Public Spaces, 2014.

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Measurement</th>
<th>Score</th>
<th>Data Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Active</td>
<td>There are a variety of activities in the area. Are people participating in a variety of activities; walking, sitting, playing games, studying, eating?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Vital</td>
<td>People of varying ages are using the space</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Special</td>
<td>Are people stopping in the space? Taking pictures?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Useful</td>
<td>People in the space are socializing? Are people in groups or by themselves?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Sustainable</td>
<td>People are using the space throughout the day?</td>
<td></td>
<td>Gehl, 2010, p. 239</td>
</tr>
</tbody>
</table>

Attributes: Comfortable and Good Image
This criterion was created using Project for Public Spaces, 2014 and City of Toronto, 2013, p. 3-4.

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Measurement</th>
<th>Score</th>
<th>Data Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Safe</td>
<td>Does the space feel safe? Are there more women in the site than men? Is there lighting?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Clean</td>
<td>Is the space full of litter? Are sidewalks and other infrastructure in good condition?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>‘Green’</td>
<td>Is the area mainly dominated by vehicles? Are there people in the area using other modes of transportation other than vehicles?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Sittable</td>
<td>Are there enough places to sit in the space? Are people able to choose if they want to sit in the sun or shade?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Charming</td>
<td>Are people stopping in the space? Are groups of people staying in the space?</td>
<td></td>
<td>Project for Public Spaces, 2014</td>
</tr>
<tr>
<td>Attractive</td>
<td>Does the space make a good impression? Is the area attractive?</td>
<td></td>
<td>City of Toronto, 2013, p. 3</td>
</tr>
<tr>
<td>Historic</td>
<td>Are there any buildings of historic significance?</td>
<td></td>
<td>City of Toronto, 2013, p. 4</td>
</tr>
</tbody>
</table>

Total
Attributes: Sociable
This criterion was developed using Gehl, 2010, p. 239, and Project for Public Spaces, 2014.

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Measurement</th>
<th>Score</th>
<th>Data Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Diverse</td>
<td>Are people meeting in groups, in pairs or individually? Are people talking to one another?</td>
<td>Project for Public Spaces, 2014</td>
<td></td>
</tr>
<tr>
<td>Stewardship</td>
<td>Do people pick up garbage in the space?</td>
<td>Project for Public Spaces, 2014</td>
<td></td>
</tr>
<tr>
<td>Neighbourly</td>
<td>Is there a mix of age groups and ethnicities that reflects the community at large?</td>
<td>Project for Public Spaces, 2014</td>
<td></td>
</tr>
<tr>
<td>Pride</td>
<td>Do people point out the space to others? Do people use the space regularly?</td>
<td>Gehl, 2010, p. 239</td>
<td></td>
</tr>
<tr>
<td>Friendly</td>
<td>Are people making eye contact/looking at one another? Are people talking to others in the space?</td>
<td>Project for Public Spaces, 2014</td>
<td></td>
</tr>
<tr>
<td>Interactive</td>
<td>People walking by, are they stopping at talking to others in the space?</td>
<td>Project for Public Spaces, 2014</td>
<td></td>
</tr>
<tr>
<td>Welcoming</td>
<td>Are people meeting their friends here?</td>
<td>Project for Public Spaces, 2014</td>
<td></td>
</tr>
</tbody>
</table>

Results of Evaluation Criteria

![Evaluation Criteria Table]

![Accessibility Access and Linkages]

![Activities and Uses]