Place-Based Connections:
 AMS Nest Courtyards

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Submitted to:
Alma Mater Society & UBC SEEDS

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#### 1.0 EXECUTIVE SUMMARY

As part of the AMS Social Animation Fund and UBC SEEDS project, the combined partnerships allowed the graduate students in the School of Community and Regional Planning at UBC to conduct research on methods to socially animate the Nest. In this report, recommendations are provided on two courtyard spaces that were considered for this study: (1) the North Plaza and (2) the Rooftop Courtyard. The main topic areas considered for research were in regard to winter activation, permanent/non-permanent structures, and events/activities. The data provided key findings within the themes of: (1) physical structures, (2) emotional/mental expressions, and (3) a sense of community.

Several recommendations are provided for each of the North Plaza and the Rooftop Courtyard. For the North Plaza, semi-permanent seating, areas of cover/shelter, and heat sources could be implemented in the spaces that are underutilized. It was found that certain areas of this courtyard are high traffic movement corridors, and as such should be left as open spaces. Additionally, the data indicate that increasing events in the space would be well-received, with a focus on different scales of events, games, and activities, such as from informal buskers to large concerts. This is to allow for continual, year-round student engagement. Lastly, the findings suggest that adding vibrant colours and installing public art would create a greater level of engagement for students. In particular, the public art could have an interactive component with the surrounding environment, such as by responding to rain, or gathering energy from the sun, to facilitate a place-based connection amongst the individual and the courtyard.

The Rooftop Courtyard had similar findings to the North Plaza in that respondents typically asked for an increase of seating and cover, along with the addition of heat sources. Similarly adding colour to the space, such as to the black fence around the garden, and working to soften the hard edges of the concrete structures was a frequent request by respondents. Specific to the Rooftop Courtyard, respondents requested that the peaceful atmosphere of the courtyard be maintained. As well, maintaining the aesthetics by keeping the space clean from litter was a frequent request. Lastly, encouraging small-scale events and socials were expressed to be desirable for this space and its users.

This report aims to act as a guiding document for the AMS and it's future planning of the North Plaza and the Rooftop Courtyard in implementing and increasing social animation through mixed-uses.

#### 2.0 INTRODUCTION



Figure 1: AMS Nest and North Plaza (Credit: Kai Okazaki)

#### 2.1 Context of Statement Research Proposal

The AMS Nest is UBC's new student union building (**Figure 1**). Currently, it is not seen to reflect the intentions laid out since opening in 2015. The intentions are for the Nest to be a student-centered hub of activity with a welcoming space for students to eat, shop, study, and socialize. There are concerns that the overall feel of the Nest is too "mall-like" and devoid of culture and life. This research proposal aims to remedy these concerns with recommendations to the AMS and UBC SEEDS for design interventions.

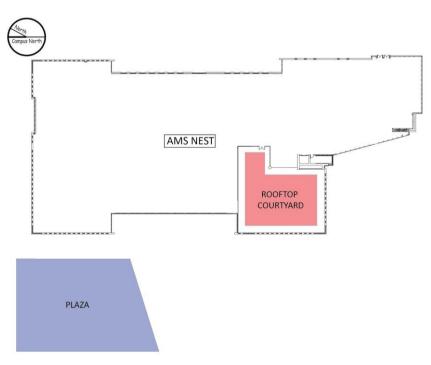


Figure 2: AMS Courtyard Areas (Credit: Stephen Clark)

As shown above in **Figure 2**, this report will be focusing specifically on two courtyard spaces within the Nest area. One area in front of the north entrance of the Nest (North Plaza), and one on the rooftop of the Nest Building (Rooftop Courtyard). Although this section will be focusing on the courtyard spaces of The Nest, there will be multiple comprehensive reports of the various parts of the Nest building to improve the function of the entire building.

#### 2.2 Purpose of Project

The purpose of this project is to determine what the best interventions are for these spaces and to enhance the experience of the area for students, faculty, staff, and other users. This can range between various different interventions, such as additional events and physical structures. The study will use interviews of users of the space to find what the space is currently being used for, and the ways that those uses can be enhanced or added to.

#### 2.3 Research Goals: Objectives and Questions

The goal of this research is to improve the courtyards to create a more vibrant community hub at the AMS Nest. To achieve this, the proposal will address the following primary research question and sub-questions:

What improvements can be made in the AMS courtyards to support place-based community-building, social interactions, and vibrancy (animation)?"

- a) How are the courtyards at AMS Nest currently being used by students?
  - Which areas are most used by students, and what are these spaces like?
  - Which areas are least used by students, and what are these spaces like?
  - How are uses varied with the changing seasons?
  - How are uses varied with formal and informal events occurring in the courtvards?
  - What are the student perceptions of the courtyards?
- b) What kind of interventions can be done to improve the AMS Nest?
  - What types of space activations are possible over the winter months in each of the courtyards?
  - What type of events do students want to see occurring in each of the courtyards?
  - What type of structures and activities should be pursued for each of the courtyards (art installations, activity oriented, events, etc.)

Key qualitative indicators are used to help determine the success of the objectives and are summarized below in **Table 1**:

Table 1: Social Animation objectives and qualitative indicators of the Nest courtyard.

Objectives	Indicators
Increase the duration of stay within courtyard	<ul><li>Inclusive</li><li>Interactive</li></ul>
Increase number of students	<ul><li>Intriguing</li><li>Playful</li></ul>
Increase student traffic in the area	Mindful
Increase variation of uses in each of the courtyards	
Create a unique community in each of the courtyards	
<ul> <li>Facilitate person-to-person connections in each of the courtyards</li> </ul>	
Facilitate person-to-place connections in each of the courtyards	
Create memorable experiences when moving through the courtyards	

This report will go through the relevant literature used to guide the study and to give rise to the research methods employed here. Following the methodology, the process taken to gather data, conduct analysis, and to provide evidence-based recommendations will be described.

#### 3.0 THEMATIC REVIEW OF THE RELEVANT LITERATURE

UBC Public Realm Plan (2009) assessed public spaces to find that 72% of the campus spaces need improvement in areas of design quality, along with improvements to the condition and significance of each space. According to students, staff, and faculty, the social values and experiences of public spaces are impaired and poorly researched (UBC Public Realm Plan, 2009). A space of interest is the Alma Mater Society (AMS) Nest, located at the University of British Columbia's Vancouver Campus. This student-centred hub welcomes students to eat, shop, and socialize while demonstrating leadership in sustainability practices and goals (UBC Alma Mater Society, 2015). This 250,000 square feet building features architectural achievements that is working towards LEED Platinum certification (UBC Alma Mater Society, 2015). However, little is currently known about how the building and surrounding space interacts with users. This literature review will analyze interventions and recommendations for the Nest courtyard spaces through the methodological framework of Post-Occupancy Evaluation (Preiser, 2002), to later build on in providing recommendations on how to improve social animation.

#### 3.1 POE and Social Animation

In this study, social animation refers to the condition of having a place-based connection, fostering a strong sense of community, and bringing meaningful experiences to spaces and the people within them. Since the AMS Nest has recently opened in 2015, Post-Occupancy Evaluation (POE) is one methodological framework that can assess how the building performs and is used by occupants after development (Preiser, 2002). The method identifies the technical evaluations of the physical building itself however, with a greater focus on the softer evaluations of assessing the psychological needs, perceptions of the different users of the building, and activities and goals of the people using the facility (Preiser, 2002). This framework can include an on-site data collection process, monitoring and managing the data collection process, and analyzing the data with explicitly stated performance requirements for a more objective evaluation approach (Bordass and Leaman, 2005).

#### 3.2 Mixed-Methods & Triangulation

Qualitative data can be collected through various approaches, including visual walkthroughs, focus groups with frequent users of the space, and satisfaction surveys to determine the functionality of the space (Hassanian, Mather, and Aker 2016). Visual analysis can be done during different times of the day to observe how the courtyards are being used (Hassanian, Mather, and Aker 2016). Individual

interviews and focus groups can be used to better understand people's thoughts on the space (Brown, 2015). The interview and focus group data can also be triangulated to consider developing surveys for qualitative and quantitative purposes (Brown, 2015). The variety in approaches can help to diversify the information collected and address the intervention for the Nest courtyards.

In addition, content analysis on qualitative research can help develop empirical knowledge and consider studying documents in various forms, including agendas, minutes, event programs, newspapers, and other materials (Bowen, 2008). The combination of various printed and electronic documents helps triangulate different data sources and methods for qualitative research purposes.

The mixed-method approach can be useful in this study to combine quantitative and qualitative research techniques for the courtyards. Evaluators include both techniques to bring meaningful design and implementation for educational and social programs (Greene, Caracelli, and Graham, 1989). This conceptual framework helps identify the courtyards' purpose through triangulation, complementarity, development, initiation, and expansion (Greene et al., 1989). Mixed-methods research can assist in providing insight to what the courtyard's purpose is for students, and procedures following the implementation of the project.

#### 3.3 Built Environment and Student Health

Several studies have shown that the environment not only affects the behaviours of users, but for students specifically, the built environment can impact their overall academic performance (Blincoe, 2008; Durán-Narucki, 2008; Earthman, 2004; Kumar, O'Malley, and Johnston 2008; Schneider, 2002). Academic performance can be seen as a level of engagement, motivation, learning, retention, and overall achievement (Scott-Webber, Strickland, & Kapitula, 2013). Although the courtyards are not directly a space of study, they are a complementary space to allow students to adequately unwind and engage with different aspects of life, such as the community around them. Engagement can be fostered through built form with spaces that are unique, offer flexibility, and have stimulating aesthetics (Scott-Webber et al., 2013). In the AMS courtyards, this can be in many forms such as through public art, spaces for play, cultural development, and transient events and shows.

#### 3.4 Conclusion

Student engagement can be fostered, along with other significant aspects of academic and personal well-being through the built environment. To determine the

best solutions for social animation, design interventions shall be determined through the methodological framework of POE and mixed-methods research analysis.

#### 4.0 METHODOLOGY

#### 4.1 Methodological Scope

Initially, three courtyards were considered for data collection. However, after some thought, "courtyard three" was eliminated from this research as the space will be drastically changing within the next three to four months. Due to this, efforts were focused only upon the North Plaza and the Rooftop Courtyard.

An inductive method is utilized for this research, meaning that the collected data and following analysis give rise to a theory or hypothesis. However, this exploration is guided by a conceptual framework looking at different variables and the relationship these have with each other. These variables are current student usage and preferences of the courtyards, and preferences for initiatives in areas of poor weather usage, organized events, and physical structures.

The scope of this study is to reach participants who utilize the courtyards at different times of day and during the week, and those who are both fond of the courtyards and those who are either indifferent or dislike the courtyards. Of course, there are limitations with this research as the sample size is small, and as a representational demography of the overall student body is difficult to achieve under such constraints.

# **4.2 Qualitative Research - Street-Intercept Method for Individuals and Focus Group**

#### 4.2.1 Interviews

The preferences for initiatives were in areas of: (1) winter activation, (2) organized events, and (3) structures. Three researchers assessed the student perception of these courtyards through a street-intercept method for in-person interviews and an impromptu focus group. The data generation through interviews are used to propose interventions for the courtyards.

The street-intercept method is characterized by interviewers standing at designated locations and stopping people as they pass by to ask for their participation in the survey. To minimize any biases that may arise due to the gender of researchers and the chosen interviewees, different combinations of researchers were utilized in groups of two, either together or nearby each other.

Researchers were positioned at different areas within the North Plaza: (1) by the entrance to the Nest, (2) at the base of the stairs leading up to the Nest, (3) by the

seating available on the sides of the courtyard, and (4) in the middle region of the courtyard. This was done to maximize exposure to students who are displaying different movement patterns within the overall space of the courtyard.

The Rooftop Courtyard is located on the fourth floor of the nest, and is much smaller than the North Plaza. Although the North Plaza is transient in nature, the Rooftop Courtyard mostly has sedentary users. Due to the nature of the Rooftop Courtyard, researchers directly approached any individual that they saw using the space. Data for the Rooftop Courtyard was gathered primarily by two out of the three researchers.

The pitch given to students was varied depending on the researcher, ranging from a more formal introduction and request for participation, to a more casual, informal, and friendly attempts at 'conversation'. Again, this does not strongly reflect in the data, as the sample is small, however this range in pitch and tone by the interviewers did result in a range of participants.

After the first couple of interviews, some of the interview questions were eliminated. The final set of questions that were utilized in the interviews is provided in Appendix 8.1 of this document. In total, there were seven individuals who were interviewed for the North Plaza. Five out of the seven were interviewed as individuals, whereas two were interviewed at the same time. For the Rooftop Courtyard, three individuals were interviewed along with a group of four. Each interviewee signed a consent form and was given the opportunity to take a researcher's email address for further inquiry later on.

#### 4.2.2 Focus Group

An impromptu focus group was conducted at the Rooftop courtyard with a group of four students who were occupying the courtyard space. They were approached by two researchers, who asked a series of questions refined from the individual inperson interviews. This was done to elicit responses in regard to specific features within the Rooftop courtyard (Appendix 8.2).

The notes written down from the interviews, in terms of responses to the specific questions, and notes written by the interviewer, along with the interviewer's impression of the interviewee and their responses are all analyzed and interpreted. This information is then reduced down by way of coding into the overarching patterns and themes. The thematic networks analysis by Attride Stirling (2001) will be used to organize and analyze the qualitative data collected for this study. Both, the individual interviews and focus groups were coded and produced themes that participants had

identified. Appendix 8.4 displays the raw data in tabular format, with the corresponding codes given to the answers provided for each question.

The preliminary data coding was a collaborative effort of all three researchers. Coding was done in two stages. The first stage involved picking out a word or two per response that encapsulated the entire response. These were generally words that represented the topic of the response, and were often mentioned specifically in the response (e.g. "walking" or "class"). The second stage involved compiling the code words provided by all of the participants for each question, and picking out the common thread or theme in those code words. For instance, if nature, green-space, or environment-related words were mentioned then one word (such as "nature") is used to represent these other code words. Finally, these themes are analyzed to report on the findings of this research.

#### 4.3 Observational Research: Visual-Spatial

The purpose of doing visual-spatial research is to add context to the qualitative methods taken in this project. Here, the spaces most and least used by students are determined to assess the differing features of those spaces and how those related to overall usage of the space.

The focus of visual-spatial data collection was to consider how the courtyard spaces were utilized through visual observations. There were two types of observations conducted in the courtyards: (1) photovoice and (2) circulation movements.

#### 4.3.1 Photovoice

For both courtyards, the data was collected through participant observation, where the researchers were the participants in the study. As users of the space, openended data were recorded on observing and considering how the space was visually expressed and emotionally felt during the study. In addition, photos were taken to collect information on what researchers see in the space, any activities that may be happening, and how the space relates to the Nest users. The photovoicing results are coded to develop themes of what the researchers observed in the area.

#### 4.3.2 Circulation Movements

Given the nature of the Rooftop Courtyard as a smaller space with sedentary users, the focus was primarily on the North Plaza for circulation. The North Plaza included movements in or out of the space (i.e. transient behaviour), and sedentary behaviour. The strategy for collecting this data, was to split up the space of the North Plaza into

the eight regions: (1) Nest doors, (2) lot 2 path, (3) north-south movement, (4) east-west movement, (5) southeast corner of the courtyard, (6) northeast corner of the courtyard, (7) north region of the courtyard, and (8) south region of the courtyard (**Figure 3**):

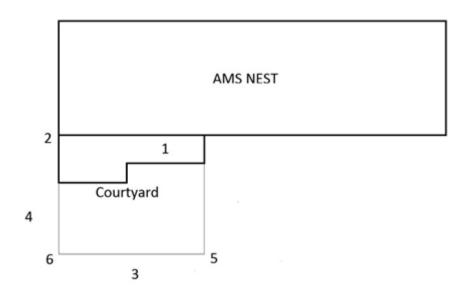


Figure 3: North Plaza and identified transient routes (Credit: Stephen Clark)

This was done to determine where is busiest, where is least utilized, and if the space is for movement or for stationary activities. Two out of the three researchers primarily collected the visual-spatial data in these eight different areas. To eliminate temporal bias, data was gathered at three different times of day and on three different days of the week: Wednesday 3:30pm, Friday 12:00 pm, and Monday 10:00 am.

This type of observation is uncontrolled in that the researchers were able to look around the space and record anything that they are able to take in within the context of the focus area. As well, as the researcher is stationed within the space of observation, they become a part of what they are observing. In other words, they are embedded within the research collection.

The measurement instruments were a writing utensil and paper. The regions that were designated were done so with rough estimates made by the researcher, as opposed to exact designation of each region.

# **5.0 KEY FINDINGS**

## 5.1 Visual-Spatial

#### 5.1.1 Photovoice



Figure 4: Rooftop Courtyard and UBC Sprouts Club pick-up boxes (Credit: Kai Okazaki)

In **Figure 4**, the photo identifies the only space in the area that has a roof for providing cover. In addition, the UBC Sprouts Club, a student-run grocery store, was hosting their weekly Sprouts box pick-up during the time of the study between 1-3pm. This information was incorporated into the thematic network analysis in **Table 6**.

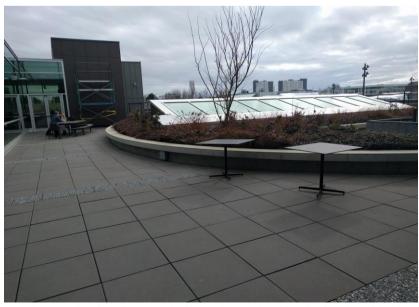


Figure 5: Rooftop Courtyard with partial seating (Credit: Stephen Clark)

#### Photovoice observation results:

- No one present in courtyard
- Lacks maintenance; litter present on the ground
- · Quiet, calm
- Cold weather
- Places to sit were limited
- Garden's black fence creates an uninviting feeling
- Views looking out are pleasant
- Doors are sometimes locked, making it inaccessible

For the rest of the observational period, the rooftop courtyard presented with very few individuals occupying the outdoor space (for example, participants sitting at the table) and not many seating options readily available (**Figure 5**). As well, litter was seen throughout the courtyard, suggesting that maintenance in the space is lacking at times. Furthermore, there were periods during the day when the researchers, as well as students, were unable to access the rooftop as the doors were occasionally locked. This created confusion around the accessibility of the space. **Table 2** below identified the findings and recommendations for the rooftop courtyard:

Table 2: Key findings from photovoicing and recommendations for Nest Rooftop Courtyard

Findings	Recommendations
<ul> <li>Quiet space with infrequent use, isolated and inaccessible</li> <li>Visually unappealing and disorganized</li> </ul>	<ul><li>Cleaning maintenance</li><li>Providing open access of doors</li><li>Keep it quiet</li></ul>

#### 5.1.2 Circulation & Traffic Count

Table 3: AMS Nest transient routes user count over 10-minute periods in North Plaza

North Plaza		ln		Out					
	10:00am	12:00pm	3:30pm	10:00am	12:00pm	3:30pm			
AMS Nest Doors	78	47	48	54	29	59			
Lot 2 Pathway	2	10	29	11	6	16			
North (In) & South (Out)	20	4	42	8	11	6			
East (In) & West (Out)	12	0	6	3	2	1			
Southeast Corner	22	5	2	15	12	11			
Northeast Corner	21	13	13 37		13	29			
Grand Total	155	79	164	110	73	122			

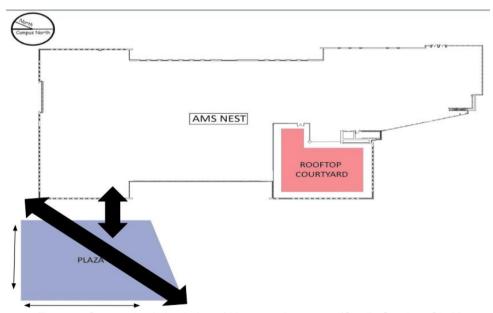


Figure 6: Summarized circulation of Nest transient users (Credit: Stephen Clark)

For the transient users, the data in **Table 3** indicated there was high number of people entering and exiting the Nest building, indicating that many of the students entering into the courtyard space are either heading towards or out of the building. As well, crossing over the courtyard in the directions coming to and from the bus loop around the Nest was busy intersections. Both of these circulations are illustrated in **Figure 6** for representation.

Table 4: Stationary users of North Plaza over 10-minute periods

Front Courtyard	10:00am	12:00pm	3:30pm
Stationary Users	8	10	10
Uses	Sitting, Standing, Talking	Sitting, Standing, Talking, Group meeting, Fundraising, eating/drinking	Sitting, Standing, Talking, eating/drinking

In the courtyards, there were some stationary users identified during the observational study (**Table 4**). The common uses of the space were similar in each time period conducted.

#### 5.2 Verbal Textual

### 5.2.1 Interviews & Focus Groups

From the verbal-textual data, all of the participants indicated that they are current undergraduate students at the university and found different uses for the Nest Courtyards. The organizing theme was categorized into three areas: (1) physical structures, (2) emotional /mental expression, and (3) a sense of community. Within these groups, basic themes were created for the type of issues that were described throughout the interviews in Table 5:

Table 5: Thematic Analysis Framework on AMS Nest Courtyards (Attride Stirling, 2001)

Global Theme	Organizing Theme	Basic Theme	Code	Issues (discussed)
		Students enjoy having more seating areas established	Sitting	Seats, Tables
	Physical Structures	Weather as a dependent variable for courtyard	Cover	Gazebo, Retractable Roof, Tents
		Students enjoy being in a space that is visually appealing	Aesthetics	Garden, Green spaces, Art, Light, Fire Pit
		Particular environments can generate feelings that become a positive experience for students	Positive*	Quiet, Calm, Relaxing, Safe
AMS Nest Courtyards as interventional space	Emotional / Mental Expressions	Particular environments can generate feelings that become an unpleasant experience for students	Negative**	Cold, Anxious. Sad, Busy, Solemn, Fearful, Isolated, Empty, Expensive, Sterile, Boring, Grey
		Environment and space does not affect students	Neutral**	Nothing, Insignificant
		Students enjoy being around other people in a vibrant space	Vibrancy	Eating, Meeting, Socializing, Taking a break,     Studying (busy atmosphere)
	A Sense of Community	Students enjoy being around activity- and event-based attractions	Activities	Music concerts, Chess, Roller hockey, Yoga, Snow building, Sitting at the Knoll
		Students enjoy the space to have the option of being alone	Independence	Alone, Taking a break, Studying (isolated atmosphere)

#### 5.2.2 Physical structures

In regard to physical structures, many of the participants indicated that having more seating and tables outside created a positive experience, however, this was inevitably dependent on weather conditions. Participants felt that if the weather conditions were poor, having more coverage and heat may provide a better experience in the area for students to come stay within the courtyards. All of the interviews were conducted during cold, overcast days with partial rain.

The participants also indicated that having aesthetically pleasing structures may attract and extend the duration of stay in the courtyards. The responses were on the general theme of sustainability and green infrastructure that included having more of the AMS Sustainability public art installations in the Nest, having more green spaces/walls, and gardens present in the areas. The rooftop maintains some components of green infrastructure, such as the garden and green space, but the North Plaza currently does not include any of these to enhance the aesthetics of the area.

#### 5.2.3 Emotional and Mental Expressions

In regards to emotional / mental expressions, the codes were categorized based on the experience of the user in the area. The qualities that were described as positive experiences pertained to only the rooftop courtyard responses, and negative & neutral experiences pertained to both courtyards. The rooftop users usually found the space available and open to escape from the busyness of the Nest. This generated the experience of feeling relaxed and calm for participants. In contrast, there were a number of expressions directed towards the negative experience of both courtyards, suggesting that these environments generate overall feelings that were unpleasant for students to be in. Mutual expressions for both courtyards included being sterile, cold, and grey when standing in the space. However, some students identified that they were not affected by the environment and space in terms of how they felt being in the courtyards. These students were those passing through the courtyards and were not a frequent user of the area.

#### 5.2.4 A Sense of Community

For the sense of community, the students were asked to identify where and how they felt a sense of belonging on the UBC campus. The majority of students identified that they enjoy the vibrancy of a Nest space and were drawn to the building as a focal point on campus. Others have mentioned repeatedly about the enjoyment of activities and events that are hosted at the AMS Nest. These were qualities that allowed the participants to identify their presence and sense of belonging to a

community by identifying a space that served the purpose for students. The students also referred to the courtyard during warmer and sunnier days where the activities and events brought greater attraction to the space. In addition, the students did not find the courtyard having a strong sense of community during the colder and rainier climatic conditions, which may be in relation to the lack of physical structures in place for a safer and warmer space.

#### 6.0 RECOMMENDATIONS

#### 6.1 Physical Structures

It appears that the addition of **shelter**, **overhead cover**, and **more seating options** are the primary concerns of the space so that individuals are able to better enjoy nature in varying weather conditions. For the Rooftop Courtyard, the general consensus with regards to overhead cover was that although there were large covered spots, they were in inconvenient locations and were fixed (**Figure 7**).

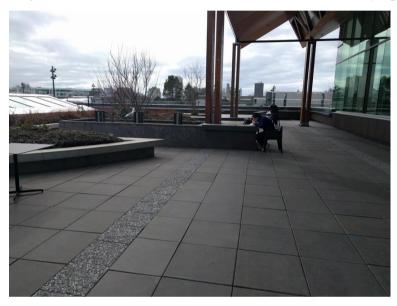


Figure 7: Rooftop Courtyard and people sitting underneath overhead cover (Credit: Kai Okazaki)

Structures such as retractable canopies and patio umbrellas would allow for modifiable cover for different weather conditions, and allow more freedom in where users can locate. This is also true for the North Plaza, although there is currently no cover in this space.

One of the main issues with the seating in these spaces is the lack of variety in seating. Although there are some seating, the data indicated that there needs to be more seating types available. For example, in the North Plaza there are only tables for small groups, and if a large group wanted to gather, they would have to drag a few together to create a makeshift space, which is not an attractive option for many (**Figure 8**). If users felt the need to lay down and relax, there is only concrete and wooden slabs on the periphery.

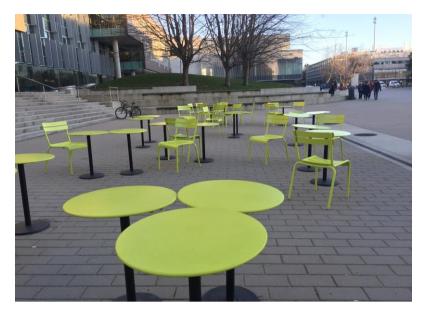


Figure 8: Current seating and tables in the North Plaza (Credit: Kai Okazaki)

In cooler climates, the addition of a **heat source** to keep people comfortable and safe was mentioned in our analysis. This could include things such as heat lamps or small fire pits useable for events.

#### 6.2 Emotional/Mental Expressions

Many stated a sterile or empty feeling in the space, which although may have not been verbally expressed in all of the responses, it appeared to be an underlying issue that would consistently come to light. Many responses recommended to add **colour** to both courtyard spaces to soften any hard edges, like cement and black fences, and foster a pallet of personality (**Figure 9**). Many stated that the space is hypermodern. This could be utilized in a creative way by adding modern art, such as a type of moving structure powered by both rain and sun to capture the conditions of this specific place.



Figure 9: Colours of grey in the North Plaza (Credit: Kai Okazaki

#### 6.3 A Sense of Community

It is recommended that **public art** and **games** both be pursued in this space. Art installations, similar to what is seen in other parts of the city and the AMS Nest, can help facilitate place-based connection, and to create a sense of culture in the space. In the North Plaza, some possibilities for this include having sign out sheets and resources available for games such as ping-pong and street hockey. Interventions could also include things as simple as hopscotch or mazes painted onto the concrete of the plaza. Interactive art pieces not only add aesthetic value, but also additional spaces for interaction with the courtyards, such as sitting or climbing

Lastly, **events** were enjoyed by students specifically if they were music or food related. The open space of the courtyards could be further utilized for large concerts, although as this impedes student traffic flow, smaller scale forms of live music could be considered such as buskers or DJs. Cultural food events could be implemented in this space to showcase the foods of nations from around the world. This could be a fun way to connect students to each other, as many are international, while inspiring excitement for the courtyard, as it becomes a place of novel experiences.

#### 6.4 Other Recommendations

In providing interventions to the space, it is important to **maintain current uses.** In the North Plaza, it is crucial to ensure that the transient routes through the space are not interfered with. The main routes are the path cutting through the space North/South towards/away from the bus loop path directly in and out of the Nest. However, the path towards the bus route should be observed before any changes are made, as the new bus loop will likely change the direction of this transient path.

In the Rooftop Courtyard, multiple users expressed how the space was quiet and isolated and that this was a feature that they enjoyed. Although improvements should be made to the space, it is important to keep the space as a place of quiet for those who use it to study, eat, and sit quietly.

#### 7.0 CONCLUSION

Using a Mixed Method approach, our group interviewed and studied users of the AMS Nest courtyards to better understand how the space was being used, and how it could be improved. Our findings suggested that users of the spaces used the two courtyards in different ways. Users of the Plaza used it mostly for transitioning in and out of the Nest, with a few using it a place to gather. Users of the Rooftop Courtyard were there either to eat, study, or generally be in a secluded space. In both spaces users expressed that the space was too sterile, and that there were not enough seating and shelter options. Weather is a hindrance to the use of the space, and limits the ways and times that the space can be used. In the case of the Rooftop Courtyard, many of the users felt that the space was inaccessible and isolated, but liked this about the space, as it gave them a secluded quiet space to study or read. Bringing more people to the Rooftop Courtyard would most likely not improve the use of the space, based on the current use.

Overall, our findings suggest that there does not need to be large interventions to the Courtyard areas to improve the use of the spaces, and the courtyards can be improved by adding relatively low cost improvements, as well as utilizing the openness of the spaces to hold more events and activities.

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#### 8.0 APPENDIX

#### 8.1 Questionnaire: Interview

#### Hook

Hello! Do you have ten minutes to give us input on making the courtyard a better space for students?

#### **Preamble**

We are a group of students working with the AMS to make the courtyards more socially animated and fun. We want to ask you a few questions to get a sense of how you would like to change the space!

#### **Interview Questions**

#### Warm-up:

- 1. What are you doing at UBC today?
- 2. What are you doing here at the courtyard?
- 3. What do you usually use the courtyard space for?
- 4. How do you feel when you are here?
- 5. When you look around, what do you like best about this space?
- 6. With that in mind, what would you change about this space?
  - a. Prompts: benches, grass, etc.

#### Main Body:

- 1. Does weather make a difference in how you use the space?
- 2. What do you think would be a fun thing to do out here when it snows or rains?
- 3. What is your favourite outdoor event in this city? What do you like about it?
- 4. Do you think there should be more events in the courtyards? What kind of events would you like to see?
- 5. Are there any games or sports you would like to see available in this courtyard?
- 6. What kinds of physical structures would you like here?
- 7. Is there anything you think is missing from the courtyards?
- 8. Do you have any questions for us that you would like to ask?

#### Demographics Questions (for Interviewer's discretion):

- 1. What is your role at UBC?
  - What are you studying?
- 2. What gender do you identify as?
- 3. What is your age?

4.	What is	your	Ethnicity	<b>/</b> ?
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Thank you so much for your time. If you have any further questions that you may have about the project, our contact information is on the consent form.

Interviewer Information:	
Conducted by:	
Date & Time://	,:m
Weather condition:	
Note anything occurring	during interview:
Location (circle one):	Lot 1 (7000 sq ft.)
	Lot 2 (3000 sq ft)
	Lot 3 (Rooftop courtyard)
Movement (circle one):	Stationary / Transient
Group (circle one):	Individual / Pair / Group

#### 8.2 Questionnaire: Focus Group

#### Focus Group Agenda:

- 1. Welcome everyone into the space
- 2. Introduce the project and what we are hoping to accomplish
- 3. Introduce the facilitator, notetaker, researchers
- 4. Have everyone introduce themselves to the group
- 5. Begin questions and facilitated discussion using active listening techniques

#### **Focus Group Questions and Facilitated Discussion:**

Ask participants to list and describe their favourite urban spaces in Vancouver, for reference:

- 1. What do you know about the courtyards at the AMS?
- 2. Have you visited the courtyard with a purpose (meet a friend, attend an event, place to relax, etc.) If so, how often?
- 3. How long do you stay in the courtyard?
- 4. Does weather make a difference in the space?
- 5. What would you like to see in the courtyard during the winter?

#### Pass around photos of each courtyard:

- 1. What do you see in these spaces?
- 2. What are you likely to do in these spaces?
- 3. What do you think is lacking?
- 4. What would you change if you wanted to make the space playful?
- 5. What would you change if you wanted to make the space relaxing?

If specific patterns show up in the interview questions, then those could be asked about here to further elaborate.

#### Closure:

- 1. Are there any questions that you would like to ask us?
- 2. Are there any questions or follow ups that you would like to ask your group members?

#### 8.3 Sample Interview: Verbatim Transcription

Rooftop Courtyard, 4th floor, AMS Nest

Kai: What are you doing on campus today?

Respondent: I study at UBC and doing some school work today on the rooftop.

Kai: What do you usually use the courtyard space for?

Respondent: I use it to enjoy the view, and it's quiet compared to inside the Nest

Kai: So usually you like to come out here for quietness and being outside. Do you find weather changes the space?

Respondent: Yes, especially when it's sunny. If it's cloudy or rainy, I don't come up here.

Kai: When you are out here, how do you feel in the space? Anything in particular you like?

Respondent: In the summer, I like the water pool that is right over there. It's really calming and I like to put my hands in it. It does get quite busy during the warmer months. I would say I just like this space now because it's quiet and there's seating.

Kai: Did you decide to come out here because there were available seats? Respondent: Yes.

Kai: So saying that, what would you change about this space then?

Respondent: I would say more seats would be something nice for people to have. There's only that one part up here that's covered by rain. If there were flexible seating, where it can be brought up and put away, that would be nice. Then people who use the space can create their own sense. I've noticed clubs coming out here before, having lunches and hanging out.

Kai: These would be during warmer months?

Respondent: Yeah but sometimes there are people out here getting a fresh of air when it's unlocked.

Kai: I see. So sometimes the roof is locked?

Respondent: It's been closed a few times before, but I don't know who's in charge of it.

Kai: Interesting. Going back, would there be anything else you would like to see up here?

Respondent: I do like the green space with the garden and plants up here. If there could be more like a green wall or something, that would be nice.

Kai: Like a vertical wall with plants?

Respondent: Yeah.

Kai: Great. Do you think there could be some fun things to do out here when the weather is kind of like this [cloudy and slightly cold]?

Respondent: Maybe if there were more weatherproofing out here, like those retractable roofs to have people sit outside for events and stuff. What about those heat lamps like they have at restaurants for heat?

Kai: I see. So it could be the use of warming up the space and having more cover.

Respondent: Yeah.

Kai: Do you think people are drawn to come up to the 4<sup>th</sup> floor and out here if there were events or programs held out here?

Respondent: I would say so. I would come up here for the Gallery, and if there was something cool happening outside instead of inside, I would be more likely to go. Like an event held outside.

Kai: Great. Do you think anything else could be out here to have people use this space better? What about structures?

Respondent: What do you mean by structures?

Kai: Is there anything that could be brought out here, like fun activities or public art pieces.

Respondent: I do enjoy public art but maybe something like big board games or something weird like that to get people's eyes turning.

Kai: Awesome. Anything else you think is missing from this rooftop courtyard? What about the community garden?

Respondent: Oh, if they did some bee promotion like urban bee keeping or gardening workshop for students, that could be neat.

Kai: Okay. Is there anything that you would like to ask us?

Respondent: Nope.

Kai: Thanks for your time!

# 8.4 Verbal and Spatial Data

# **Coded Interview Responses**

Interviewee	Location (1 = North Plaza, 3 = Rooftop)	Movement (Transient, Stationary)	Group (Individual, Pair, Group)	What are you doing at UBC today?	What are you doing here at the courtyard?	What do you usually use the courtyard space for?	How do you feel when you are here?	When you look around, what do you like best about this space?	With that in mind, what would you change about this space?	Does weather make a difference in how you use the space?	What do you think would be a fun activity to do out here when the weather is poor?	t favourite outdoor	Do you think there should be more events in the courtyards? What	Are there any games or sports you would like to see available in this courtyard?	What kind of physical structures would you like here?	Is there anything you think is missing with the space?	Additional information
1	3	Transient	Individual	Study at UBC	Quiet space to be outside	A place to sit and be away from the loud noise	Calm (likes the water table in the summer), quiet, relaxing	View, connection to nature, the green space	Add more seating (flexible), green wall along window, create my own space	Yes, definitely	More weatherproofing, retractable roofs, have more people come out for events		Yes, draw more people from gallery, ciruclation, courtyard, clubs activities		Heat lamps to stay warm (solar- powered), more seats	Bee promotion (urban bee keeping, gardening workshops?	Undergraduate, female, 20's, Caucasian
2	3	Stationary	Group (4)	Study at UBC	Came here once, mostly empty and not crowded; wasn't enough seats by the lounge so we came outside	Eating, maybe would use to study out here if i was nice	Nervous that a bird will poo, lots of crows (anxious, fear,)	Garden, block of green colours around the space	beekeeping, gardening; the black fences are ugly; put more umbrellas, some cover (but not total cover) because only one actual table under the cover	Cold hinders alot	water gun fights; heat lamps, wind blockers		concerts, painting, pastel wine and cheese paint night, gallery set-up			More colour, too much grey	undergrads, 2 males, 2 females, 20's, middle- eastern & asian
3	3	Transient	Individual	Student from Vancouver	1st time up here, never knew it existed, only been to 4th floor for Gallery, AMS health services	not much use from me, but come to the nest (3-4 times)	solemn, quiet, looks sad	green gardens and view	lawn chairs, couches, comfortable seating	wouldn't be outside when it's cold but yes	Covered events, seating, outdoor gathering		Sunset summer (suits and dresses) dinner, after hours event		Not much		undergraduate, male, 20's caucasian
4	3	Transient	Individual	Getting things from sprouts	Picking up vegitables	Like to study here, dont find it cold, likes to sit here	likes the fresh air, quiet, isolated		more seating space, more coverings, maybe retractible, umbrellas				Cant see an event here, oddly shaped		permanent huge chess, orchard commons is cool, try and emmulate that, ping pong tables	more greenery, green wall, very grey, everything is dead, Its hard for people to get to the 4th floor	female, 20s, caucasian
CODES				Student / Utility	Escape / Quiet / Accessible / Chore	Study / Seating / Eating	Calm / Anxious / Sad / Relaxing / Solemn / Fear / Quiet / Isolated	Green / Garden / View / Nature	Enhance aesthetics / seating / shelter / farming		Heat / Shelter / Events		Art / Socials / Concerts / Students Clubs		Games / Warmth / Seating	Green / Bees / Programming / Too grey	
5	1		Individual	Study at UBC	decided to meet here for lunch	Usually hang out at the knoll a lot	Puky green chairs are kind of ugly, but it makes the seats pop out f the cold grey concrete of the courtyard	Storm the Wall. The area is perfect for chairs. The moveable chairs allow for expandable activities, can use for gatherings like food trucks, concerts, etc. Just a good space.	more people and he more	Yes, the weather makes people disappear	Snowman competition, snowball fights		The live events they've had here are great	Hockey nets, sticks to rent			Female, undergraduate, 20's Caucasian
6	1		Individual		decided to meet here for lunch	usually hang out here a lot more when its sunny	This is a transportation hub to everywhere. Wouldn't come to do homework or anything like that	Storm the Wall. The area is perfect for chairs. The moveable chairs allow for expandable activities, can use for gatherings like food trucks, concerts, etc. Just a good space.	more people and be more	Yes, the weather makes people disappear	Snowman competition, snowball fights		The live events they've had here are great	Hockey nets, sticks to rent			Male, alumni center employee, 20's, Caucasian
7	1	Transient	Individual	Going to lectures	Walking, sitting, s getting some fresh air	Nothing really, just to transition through	I don't like it. It's restrictive, there is too much conflict. I don't like it when people protest here or acost me as I'm trying to go into the nest. I just don't like to be disturbed	Nothing really, I like it when it is empty	Good as it is, as long as it's empty / just leave it utilitarian and empty of emotion	N/A	More shelter	Italian cultural event that happens on Commercial Drive. It's fun to eat the food and experience the culture	classes are done for the	Roller hockey	Different lights, like what exsts in Olympic Village / neighbourhood energy utility like thing here, teach people something energy or sustainabilty / art / smokers poles so people stop littering their cigarette butts everywhere / doesn't like the tables and chairs that are out there	It feels incomplete here, and no one wants to sit on the concrete, so something should be done about that	
8	1	Transient	Individual	Going to class	Transition to get food from the nest	Enjoys sitting on the grass when it's nice out / just to walk / sit along edges but not often	Very sterile feeling but it is better than before	The basketball court / the grass	Add a garden, maybe a community garden / productive green space / art / buskers	N/A	Gazebo / wood fire pit		Yes - a centralized DJ booth, BBQ, yoga thing	Badminton, volleyball	More seating / zip line	Music -> bands -> piano / Places I can sit with my laptop and work	
9	1	Transient	Individual	Going to class	Just walking through	Just to walk through	Nothing really	I like how open it is	I would add art or something fun. Like one of those rain buckets that fills up with water and dumps out the water in swimming pools	Yes	Have a gazebo or cover	Live music	Sure! More concerts	A big game of chess	I don't know really, maybe more shelter	Art, intruiging installations	
10	1	Stationary	Individual	Classes	Lunch break	usually walk through, theres weather issues so only eat here when warm	feels like it cost a lot of money	trees, basketball, the live events, concerts, foot trucks	More lighting at night				More concerts	Would like grass, to listen to music			M, 20s. Asian
11	1	Stationary	Individual	Bake sale, classes, break	Selling cup cakes	Walking through	Empty	likes the knoll	actual things to use, tables and chairs more spread out		should be covered		storm the wall, food trucks, doesn't really go to events much	possibly pick up sports	more benches, maybe more spread out	it could be good if there was more things	M, 20s. caucasian
CODES				school, work, break	lunch, walk, break	walk, hang out,	Empty, sterile, boring, walk through, expensive	Nothing, leisure, live events/concerts, Food truck	Garden, Art, Green space, water, lights, tables, seating		Cover, Gazebo, fire pit, snowbuilding		Live events/concerts, yoga	roller hockey, chess, grass to sit	Seating, cover, lighting, art,	Art, music,	

otal Students: