# Becoming Green Places

## Attachment to Public Green and Recreational Space Among Multi-Unit Dwellers in Ballard

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Abstract

# Becoming Green Places: Attachment to Public Green and Recreational Space Among Multi-Unit Dwellers in Ballard

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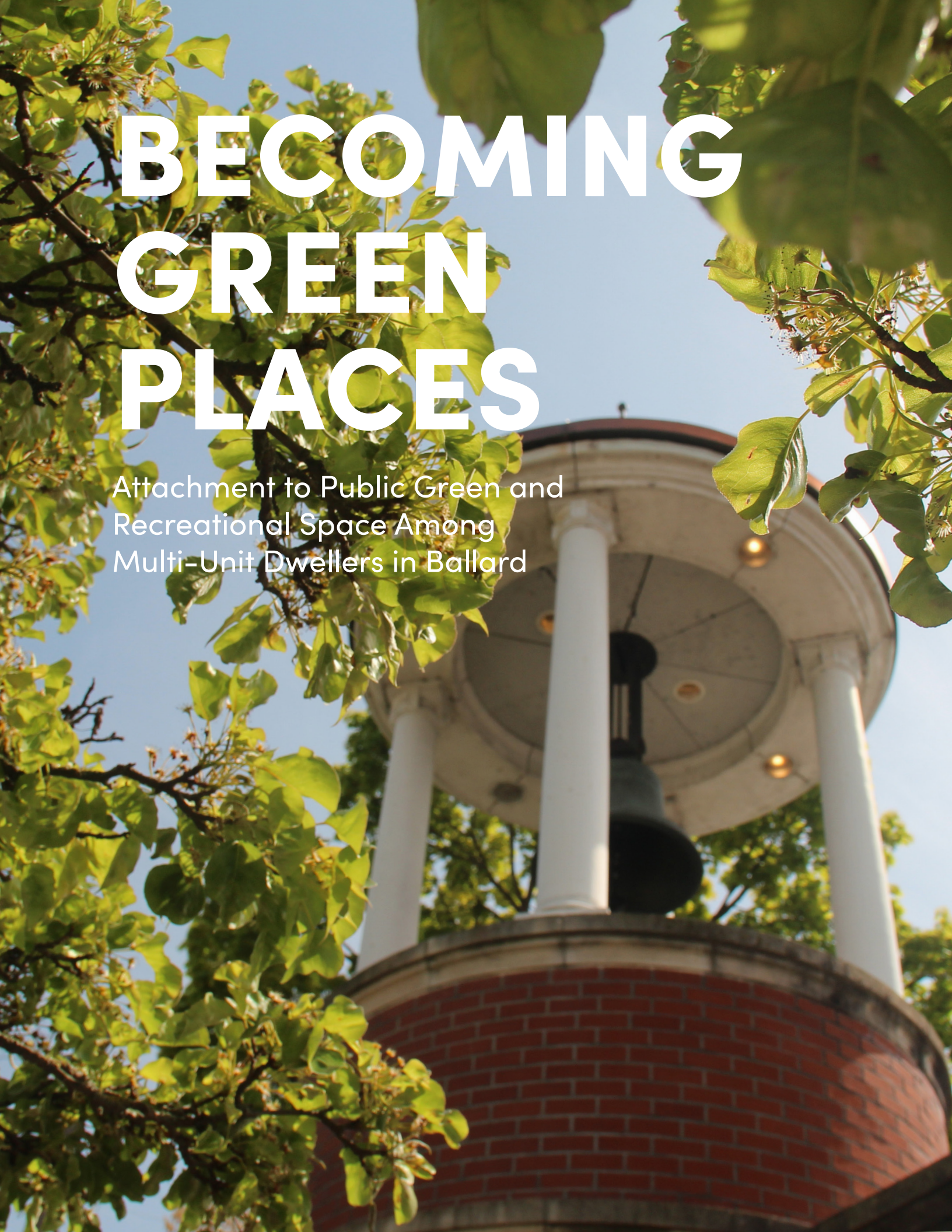
The use of public green and recreational space has been transformed by increasing urbanization, densification, and residential unaffordability, and by the Covid-19 pandemic. This research seeks to discover how public green and recreational spaces and their uses contribute to the place attachments of multi-unit dwellers, and whether these places may be able to maintain or restore continuity of place attachment within rapidly changing and increasingly dense urban environments. A qualitative case study of interviews with multi-unit dwellers in Seattle's Ballard neighborhood, an area that represents the level of residential density politically feasible in Seattle's near future, was conducted. Place attachments, the emotional bonds between people and places, are rarely considered in the planning process but have significant impacts on the social cohesion, well-being, and resilience of communities. Findings from this study convey the nuanced importance of public green and recreational spaces to multi-unit dwellers; they offer opportunities to develop place attachments through gathering, encountering emotions, exploring, establishing time-depth, experiencing nature, and learning about local history. This study implores urban planners to consider place attachments and community well-being more intentionally in future urban development and planning efforts to ensure that public amenities keep pace with increased residential density.



# BECOMING GREEN PLACES

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# Acknowledgements

This research, place-based in nature, was conducted on the unceded ancestral lands of the Coast Salish People. I would like to express my respect and gratitude to this land and to the countless generations of Duwamish, Suquamish, Tulalip, Puyallup, and Muckleshoot People who continue to call this place home.

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Thank you to my thesis chair Dr. Christopher Campbell for your insights, ideas, and encouragement throughout this process. To Dr. Ken Yocom, who joined my committee in spring quarter, thank you for stepping in and being generous with your time and feedback. And to my honorary advisors Art and Anna, I couldn't have held it together without your company and reassurance.

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Before spring break of 2022, just months away from my thesis deadline, Dr. Bob and I met for one of our bi-weekly meetings. I expected him to tell me to buckle down and put in some hard work over the break. Instead, he told me to relax and take some time for myself. He said, "Go put your feet in the grass. If it's too cold for that, go bowling." Thank you, Dr. Bob, for reminding me to go easy on myself, not take things too seriously, and always keep learning. You are missed by many.

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# 1. PERSONAL STATEMENT

During my junior year of college I was fortunate to spend a semester studying abroad in Madrid, Spain. I was most looking forward to the food, the history, and the easily accessible transportation networks, but the most meaningful and memorable part of my experience was unexpected: the park.

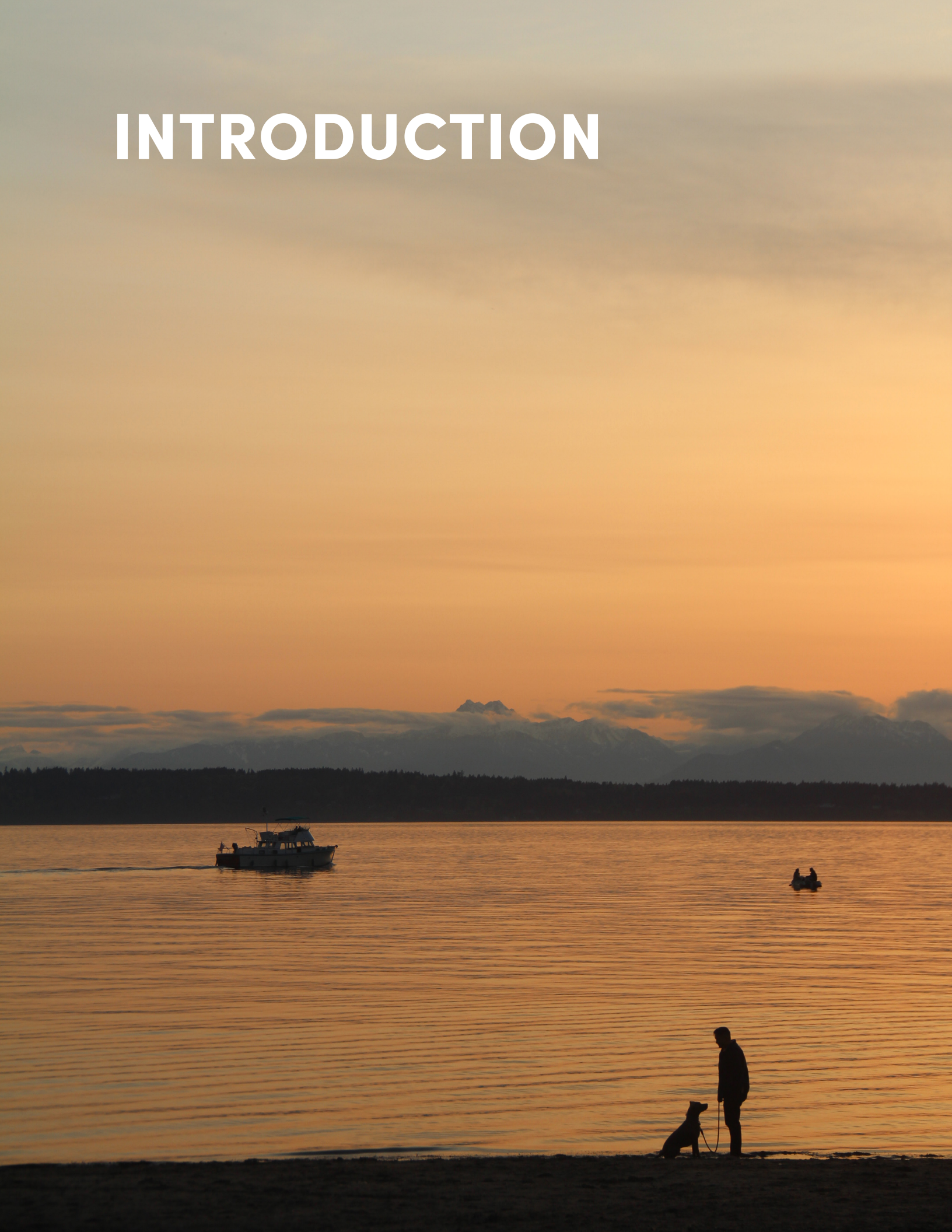
I lived in an apartment a few blocks away from El Retiro Park, a 300-acre park in the middle of the city. The park had everything; thousands of trees, winding paths, manicured gardens, grassy lawns, a small lake, even the Glass Palace, or Palacio de Cristal, that hosts rotating art exhibits. I visited this park daily.

Like most housing units in Madrid, the apartment I lived in didn't have private outdoor space. Because of this, public spaces like El Retiro Park are used heavily, serving as a shared backyard. People come to the park for everything: they have birthday parties, take rollerblading lessons, attend puppet shows, and go on picnics. They exercise, relax, observe, and recharge.

In times that I felt homesick and lonely I would go to the park to walk under the shade of cypress trees and let the gravel paths guide me. As a mediocre Spanish speaker I was separated from other park-goers in language, but did not feel alone. I was not only a part of the crowd, but part of the community, coexisting and sharing with other park users. It was vibrant, exciting, and welcoming. I saw who Madrid was in that space, an agglomeration of different people, activities, and cultures. The park itself was witness to it all, and I found comfort in that place.

It was in this context that I developed an interest in open space access. The ideal of dynamic, creative, and inclusive public spaces drives this research. As cities like Seattle become more dense, as housing types change, and as private open space becomes increasingly scarce, my focus is on how urban planners can support communities in creating meaningful, enriching, and exciting public spaces. This thesis is my first step into this realm of possibilities.

# INTRODUCTION



# 2. INTRODUCTION

The term 'place attachment' is used to describe the emotional bonds between people and places (Taylor, Gottfredson, and Brower 1984; Manzo and Devine-Wright 2021). Place attachments can be analogized as relationships with friends; they are complex, a compilation of shared experiences, interests, and values. Our relationships hold a range of emotions: comfort, joy, resentment, loss. We grow to know our friends and their backgrounds over time; as we change, our relationships and their associated emotions may evolve too.

Our relationships with others often serve different needs or functions. We go to a certain friend to confide in and process emotions. Another friendship may be more activity-based and hold less of an emotional connection. We feel comfortable sitting in silence with old friends, enjoying the simplicity of their company. Some new friends feel instantly familiar.

Like relationships with friends, relationships with places are unique, complicated, and develop over time. We may be attached to different places for different reasons; a park we grew up visiting in childhood may hold a different attachment than one where we take our lunch breaks during the workday.

Place attachments are intrinsically linked to urban planning, a place-based profession. The ideal of fulfilling the highest and best use of a piece of land is rarely as simple as the quantifiable factors considered in typical planning processes, like cost and time. Intangible factors like place attachments and community identity greatly affect our relationship to and satisfaction with the built environment.

The consideration and incorporation of place attachments in urban planning processes is critical for effective and ethical community-based planning. As this research will explore, place attachments can have positive impacts upon community cohesion, belonging, and overall well-being. Identifying how attachments to public green and recreational spaces, outdoor venues for recreation, social interaction, and respite, develop and change can help inform local planning efforts to ensure that the built environment fulfills public needs and provides opportunities

to develop meaningful place attachments. It is particularly important for urban planners to intentionally consider place attachments among communities in rapidly densifying urban landscapes, where continuity of place attachment is easily disrupted.

In this research I sought to answer two key research questions: how do public green and recreational spaces and their uses contribute to the place attachment of multi-unit dwellers, and how can these public green and recreational spaces help maintain or restore continuity of place attachment within rapidly changing and increasingly dense urban environments?

Public green and recreational spaces are a key component of public space, which serves as "the daily glue by which we come into contact with diverse and different people who make up our social world" (Low and Smart 2020, 3). Trends in increasing urbanization, densification, and residential unaffordability mean that an increasing number of people live in multi-unit dwellings, housing units that share at least one wall and lack significant access to private open space. Thus, public green and recreational spaces, including parks, trails, playgrounds, and community gardens, are being used by more people, more frequently, and for more uses than in recent decades (Lin, Meyers, and Barnett 2015; Galster and Lee 2020). The onset of the Covid-19 pandemic in early 2020 further transformed the use of public open space, as these became primary venues for safe social interaction when many third places, spaces outside homes and workplaces vital to people's social networks and well-being, closed due to government lockdown orders (Rosenbaum et al. 2007; Volenec et al. 2021).

As discussed more fully in the Literature Review, research has shown that public green and recreational spaces positively affect the development of place attachment and the mental health of visitors and nearby residents. Because of the recency of the topic, there is little research on how attachment to green spaces has been affected by the Covid-19 pandemic (Zhang et al. 2015; Nutsford, Pearson, and Kingham 2013). However, recent studies have posed questions and theories about impacts of the pandemic and related lockdowns on use, perceptions, and design of public space (Honey-Roses et al. 2020).

The research questions were explored through a qualitative case study in Ballard, a neighborhood

in northwest Seattle known for its Nordic heritage, maritime industry, vibrant business district, and popular regional parks. Ballard, designated as a Hub Urban Village under the City of Seattle's Urban Village Strategy, is one of Seattle's denser neighborhoods and has accommodated a significant share of the city's recent residential growth (Rosenberg 2018; City of Seattle 2020). Given Seattle's political opposition to significant zoning changes yet a desire for more inclusive and affordable neighborhoods, it's likely that moderately dense urban infill like townhomes and mid-rise apartments seen in Ballard may represent the level of urban density that is politically feasible in Seattle in the near future (Carder 2021; Trumm 2021). Because of its variety of moderately dense housing, the recent change in its built environment, and the diversity in scale of nearby public green and recreational spaces, Ballard serves as an interesting case study for this research.

This research shows that public green and recreational spaces do have significant impacts upon place attachment for multi-unit dwellers. These attachments exist at a variety of scales, from large parks and gardens to street trees and curbside planting strips. As the Findings section will explore in more depth, public green and recreational spaces contribute to place attachment by offering opportunities to gather, engage whimsically, process emotions, establish time-depth, connect with nature, and much more. They have the potential to serve as places of continuity among a landscape which is constantly changing. The Discussion section explores the implications of these findings in the field of urban planning, imploring professionals to consider more creative incorporation of public green and recreational spaces in urban environments to create opportunities for people to develop place attachments and know places more deeply.

# BALLARD CONTEXT

# 3. BALLARD CONTEXT

## Neighborhood history

The Duwamish People were the original inhabitants of the land that eventually became Ballard. In Lushootseed, the language spoken by the Duwamish People, the word Shilshole means "tucked away inside" (Lape 2016). This area, nestled between Shilshole Bay to the west and Salmon Bay to the south, supported the community with plentiful salmon, accessible waterways, and relative shelter due to its geographic formation. Besides larger water bodies like Salmon Bay being important regional connectors, small waterways like streams and creeks were locations of cultural and spiritual significance and places to gather resources (Ballard News Tribune 1988).

The landscape among which the Duwamish lived differed vastly from how it appears today. Industrial, commercial, and political interests have caused shorelines to shift and topographies to be altered throughout Seattle; the built environment consumes the natural. White settlement and subsequent environmental changes disrupted or destroyed many places integral to the Indigenous way of life in the region.

One example is the development of the Lake Washington Ship Canal and Hiram M. Chittenden Locks, from here on referred to as the Ballard Locks, which caused the displacement of many Indigenous communities. An increase in water levels in Salmon Bay and subsequent drop in Lake Washington transformed the surrounding area; the Black River, sited in present-day Renton, went dry and the Duwamish village along its banks was but one casualty of this infrastructure (Banel 2017). Another impact of the Ballard Locks' development was the forced removal of Salmon Bay Charlie, called Hwehlchtid in Lushootseed, his wife, Chilohleet'sa, and other Duwamish people who lived along the shore of Salmon Bay, west of where the Locks were developed. This small community was evicted around 1913, before the opening of the Ballard Locks in 1917, and was one of the last Indigenous groups to be removed from Seattle (Casey 2020).

Stories like this mar the history of the city. The land on which Ballard was founded was stolen from its first inhabitants and despite their significant cultural history, the Duwamish People are

Figure 1. Before and after comparison of Salmon Bay, looking southeast. The top photo shows Shilshole Bay Charlie's home, on the banks of what would become the Magnolia neighborhood. The bottom photo shows the area today; the shoreline has shifted, and the Salmon Bay Bridge is visible to the east. *Casey 2020.*

still not a federally recognized tribe. While not a major focus of this research project, there is much to be done within the field of urban planning to decolonize public spaces and authentically include Indigenous voices in decision-making. The Duwamish Tribe's website includes opportunities for further education and involvement in Indigenous justice movements, including the Real Rent Duwamish movement.

The first land claims were filed in Ballard in 1853, marking the beginning of white settlement in the area. Over the next several decades, Indigenous communities in the area were forcibly displaced as more white settlers moved in and adapted the land for farming and industry (Lape 2016). The first colonizer developments were for homesteads as trees were cleared for farming. The land was logged and platted in the late 19th century and soon welcomed an influx of

newcomers, many of whom were immigrants from Scandinavian countries.

Ballard became an increasingly populous city as its industries, based mostly on timber and fishing, became more established. The town of Ballard was incorporated in 1890 and eventually annexed into the city of Seattle in 1907 (Seattle Municipal Archives 2022). For decades Ballard existed as a relatively working-class neighborhood, where maritime and other industries were part of the community identity.

The Nordic community in Ballard grew as people from a range of Scandinavian countries moved to the area in the late 19th century, attracted in part by the maritime industry and landscape (Pulkkinen 2016). Although many other elements of history have been lost to development and gentrification, this Nordic heritage continues to shape Ballard's identity today; events like Syttende Mai, the Norwegian Constitution Day parade, still take place in the neighborhood and hold a special meaning for the community.

The built environment of Ballard reflects this heritage, too. Bergen Place, a small park in the heart of Ballard's commercial district, is home to murals, flags, and other artwork that reflects the history of Nordic communities in Ballard. Down the street, the Ballard Centennial Bell Tower in Marvin's Garden Park marks the site of Ballard's original City Hall. The National Nordic Museum, just a few blocks west on NW Market Street, hosts events and exhibitions for all community members. Several local businesses in Ballard draw inspiration from Nordic culture: Skål Beer Hall is influenced by Viking meadhalls, Larsen's Bakery offers traditional Danish baked goods, and Woodland Mod's wares reflect minimalist Nordic design. In a move of questionable authenticity, even new apartment buildings, like the Søren Ballard Apartments, have names reminiscent of the neighborhood's Nordic heritage.

## Ballard today

Ballard is comprised of a number of smaller neighborhoods, including Sunset Hill, West Woodland, Loyal Heights, Whittier Heights, Crown Hill, and Adams (more commonly called Central Ballard). The area near the Ballard Avenue Landmark District in the neighborhood's

commercial core is often called Old Ballard. NW 85th Street is typically used as Ballard's northern boundary, but the lines dividing neighborhoods often blend. Depending on who you talk to, the Crown Hill, North Beach, and Blue Ridge neighborhoods, all north of NW 85th Street, are sometimes included as Ballard's sub-neighborhoods. Since several participants in this research, who self-selected as Ballard multi-unit dwellers and volunteered to be interviewed, live north of NW 85th Street, I will err on the side of geographic inclusivity in this study.


Figure 2. Ballard neighborhood map.

The 1994 Seattle Comprehensive Plan introduced the city's Urban Village Strategy (UVS), which changed zoning in particular areas to accommodate denser commercial and residential development. A portion of Central Ballard, south of NW 65th Street and primarily between 8th Avenue NW and 28th Avenue NW, is designated as a Hub Urban Village under the UVS. This designation prioritizes residential, commercial, and job growth and increased public transit service. A portion of the Crown Hill neighborhood is designated a Residential Urban Village, which allows for slightly lower levels of development, focused on residential and commercial growth (City of Seattle 2020). Both Ballard's Hub Urban Village and Crown Hill's Residential Urban Village were expanded in 2019 under Seattle's Mandatory Housing Affordability (MHA) policy, which aims to ensure that new commercial and multi-family developments contribute towards developing affordable housing (City of Seattle 2022).

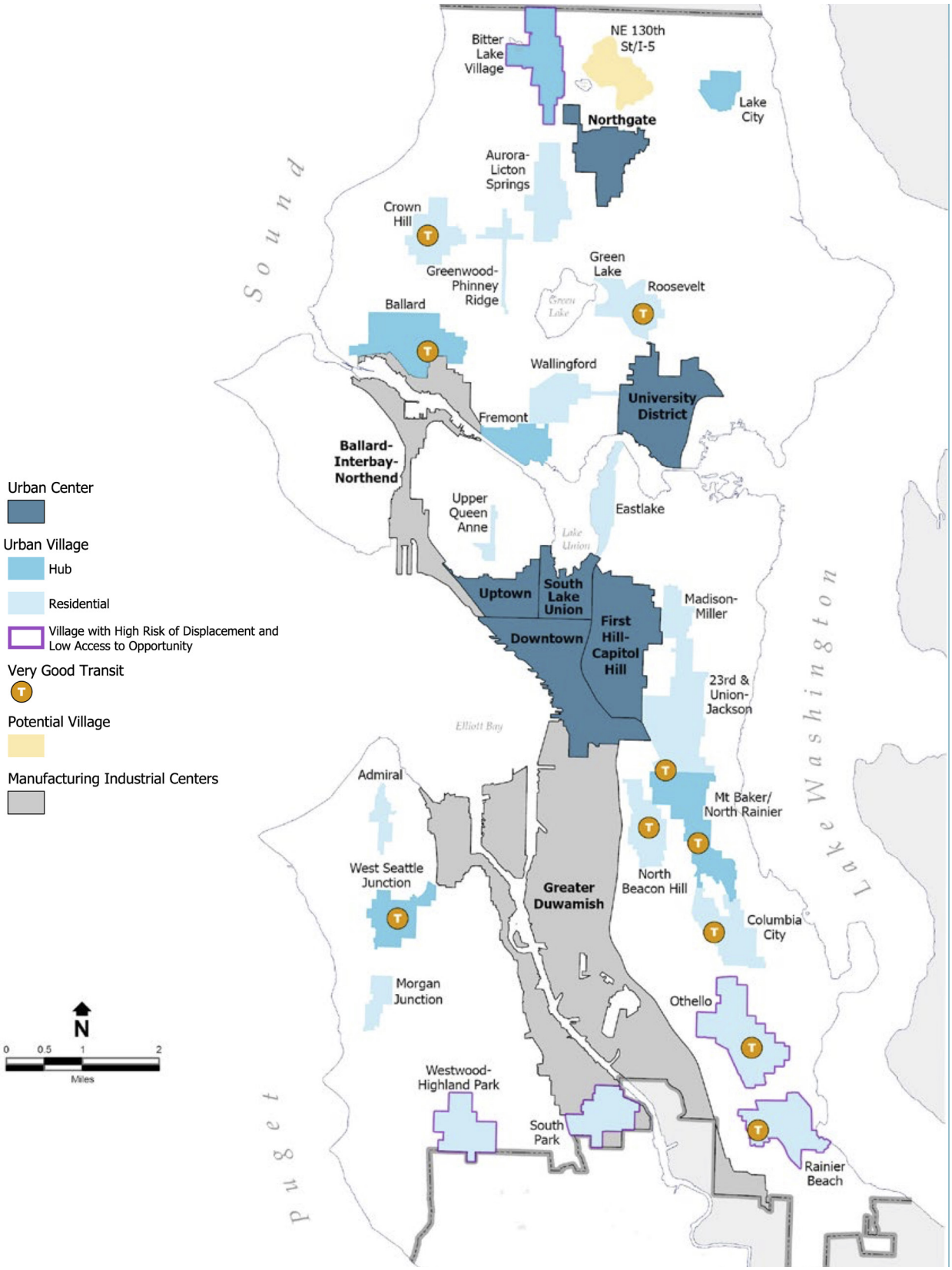



Figure 3. The City of Seattle Urban Village Strategy map. Ballard's Hub Urban Village and Crown Hill's Residential Urban Village are both shown on this map. *Seattle 2035 Comprehensive Plan*.

As shown in Figure 4, much of the land in Ballard is zoned for Single Family residential, particularly north of NW 65th Street. South of NW 65th Street and along major arterials zoning allows for multi-family residential and commercial/mixed use development. The neighborhood's west shoreline, south of Golden Gardens Park, is zoned for commercial/mixed use development, while much of the south waterfront is zoned for manufacturing/industrial uses.

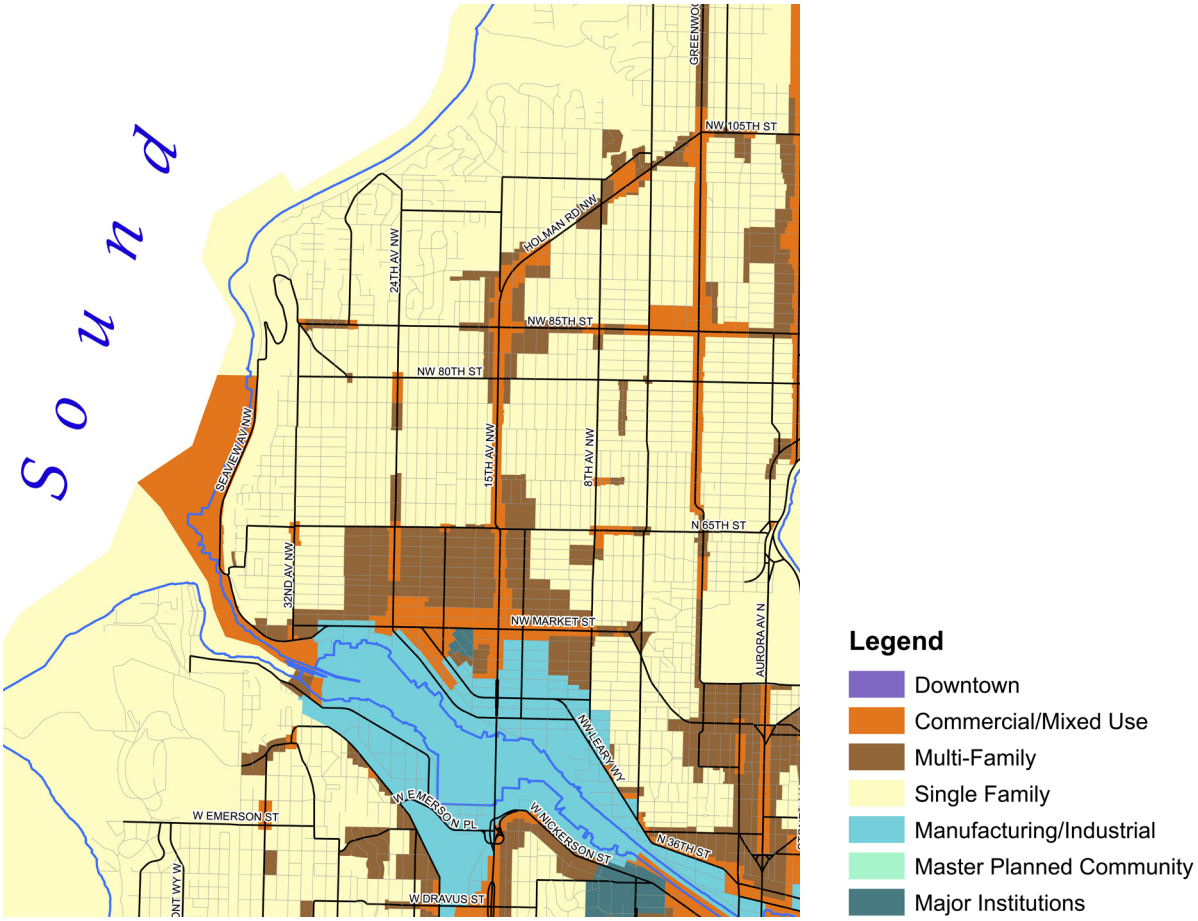



Figure 4. City of Seattle zoning map. *Seattle Department of Construction and Inspections 2019*.

Much of the change in Ballard's built environment has taken place since 1994, when the Urban Village Strategy was enacted, and within the boundaries of the Hub Urban Village, as this area is zoned for more dense development than the rest of the neighborhood. In this area, the transformation from a working-class community to gentrified hub is particularly visible, as new mid-rise apartment buildings line Market Street and townhome clusters replace single-family houses. Between 2012 and 2017, more demolition permits had been issued in Ballard than in any other Seattle neighborhood (Crowe 2017).

Despite the increase in housing units in Ballard's commercial core and implementation of MHA in 2019, home prices and rental costs have not remained affordable. As in Seattle overall, Ballard's average housing costs have increased dramatically in recent years (King and Campbell 2022). Ballard's Hub Urban Village is expected to grow by 4,000 housing units between 2015 and 2035, according to the City of Seattle's 2035 Comprehensive Plan Growth Strategy Appendix. The Hub Urban Village is also expected to add 3,900 jobs by 2035. Crown Hill's Residential Urban Village is expected to grow by 700 units (Seattle 2020).

Critics of the UVS note that areas like Ballard's Hub Urban Village, zoned to accommodate moderately dense commercial and residential development, have experienced a disproportionate amount of the city's residential growth in recent years (Rosenberg 2018). This means that some parts of the city are changing rapidly while others, predominantly single-family neighborhoods, are hardly changing at all, which has implications for the place attachments of community members throughout the city. HB 1782, Washington's missing middle housing bill, would have allowed for duplexes and fourplexes to be built in single-family zoned areas near transit stops (Groover 2022). However, HB 1782 died in the 2022 legislative session despite polls showing that 60% of voters would have supported the initiative (Bicknell Argerious 2022). Similar legislation will likely be proposed in coming years with the goal of moderately densifying urban areas.

More changes are heading toward Ballard. Sound Transit's Ballard Link Extension light rail line is planned to open between 2037 and 2039. Discussions of the station's location are ongoing, with alternatives considering either an elevated or tunneled station near NW Market Street and 14th Avenue NW or 15th Avenue NW (Sound Transit 2022). New transportation infrastructure will make accessing other parts of the city much easier for Ballard residents and brings with it the expectation of more dense residential development within Ballard's Hub Urban Village.

Ballard's demographics have changed alongside the built environment. Between 2010 and 2020, Central Ballard's population increased by 66%, the second fastest of any neighborhood in Seattle. The only areas where the child population increased more than that of adults in this time period were Loyal Heights and Whittier Heights, just north of Central Ballard. Though the population of people of color (POC) increased by at least 84.4% throughout greater Ballard between 2010

and 2020, POC still represent fewer than 33.3% of the neighborhood's population (U.S. Census Bureau 2020).

Currently, demographic trends vary within neighborhoods in the greater Ballard area. NW 65th street is the northernmost border of Ballard's Hub Urban Village. North of this boundary, where much of the land is zoned for single-family development, homeownership rates and proportions of single-family detached housing are higher than in Central Ballard, where there is a higher proportion of renters, a smaller average household size, and a generally younger population (City of Seattle 2020).

Comparatively, "Ballard is less racially and ethnically diverse than Seattle as a whole" (Balk 2021). Most of the census tracts in Ballard have higher median household income estimates than Seattle overall, except near the Old Ballard and Crown Hill areas (City of Seattle 2020).

## Ballard's public green and recreational spaces

Ballard is home to a variety of public green and recreational spaces: parks, trails, beaches, community gardens, playgrounds, greenways, street ends, and more. Some of these spaces are natural areas where visitors can see wildlife and find respite from the built environment, while others are woven into the urban fabric, providing space for recreation and rest in the city. Because of Ballard's location on the Puget Sound, many of these public spaces afford users access to amenities like views and waterfronts.

Perhaps the most well-known public spaces in Ballard are the large regional parks: Golden Gardens Park along Ballard's west shoreline and the Ballard Locks spanning Salmon Bay. Whether Carkeek Park, north of the Crown Hill neighborhood, is in Ballard is debatable, but it is nonetheless a relatively close regional park. The Burke-Gilman Trail, a popular multi-use trail, hugs Ballard's shoreline and provides a regional connection for non-motorized travel.

While these regional public spaces loom large in Ballard, the densest areas of the neighborhood have relatively limited access to nearby public open space. According to the City of Seattle's

Outside Citywide project and shown in Figure 5, Ballard's Hub Urban Village is an area of high priority for overall public space need. The current inaccessibility of the Ballard Commons Park, closed in December 2021 for rehabilitation following the sweep of a homeless encampment, reduces open space access in Central Ballard even more. Transit, bicycle, and pedestrian infrastructure to nearby public green and recreational spaces also leave something to be desired. Appendix B further explores barriers to accessing public green and recreational spaces in Ballard.

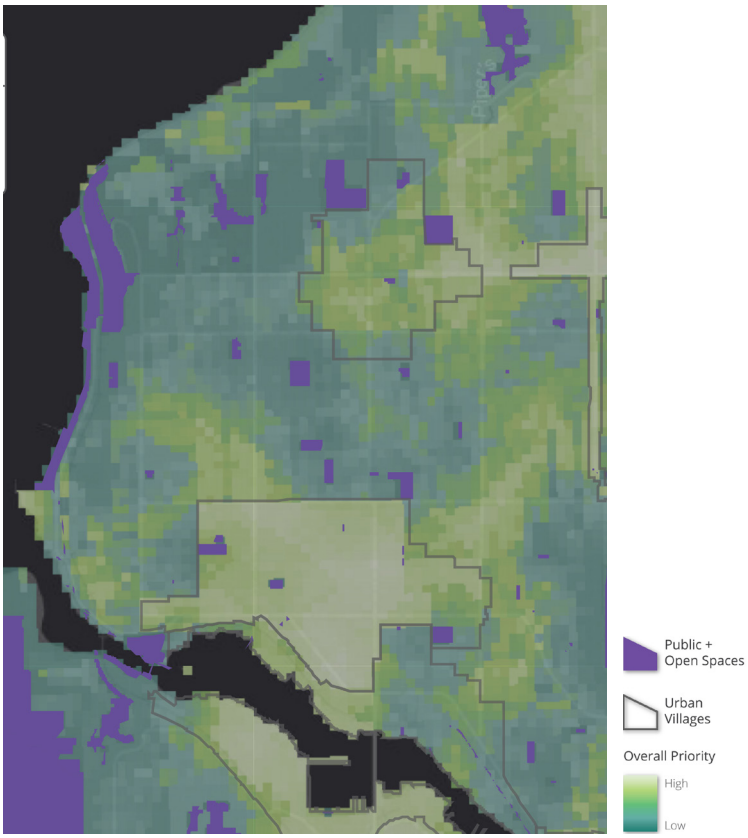



Figure 5. Map of overall public space priority areas, or areas that lack adequate access to public space. The total public space access score takes racial and social equity, density and growth, and health outcomes into consideration. Ballard's Hub Urban Village is an area of high overall priority. *City of Seattle 2022, Outside Citywide.*

Perhaps stronger than the desire for public waterfront access in Ballard is the push for the Burke-Gilman Trail Missing Link, a 1.4-mile section of trail just east of the Ballard Locks, to be connected. This is one of the most hotly debated issues in Ballard, as industrial businesses and bike and pedestrian advocates struggle to compromise, balancing a desire for business to continue as usual against a desire for safer non-motorized pathways through southern Ballard.

Groundswell NW, a local community organization, published an update to their Ballard Open Space Plan in 2014, which includes a comprehensive inventory of public open spaces in the neighborhood. The Ballard Open Space Plan also includes images of walksheds to various public amenities, like playgrounds, parks, and community gardens, which provides a useful visual of access to public green and recreational spaces in Ballard. This plan has many insightful


Figure 6. An inventory of open spaces in Ballard in 2014. A wide range of open space types are included in the inventory, most of them public. *Groundswell NW Ballard Open Space Plan 2014 Update.*

observations about the quality of and access to public open spaces in Ballard, noting in each sub-neighborhood where gaps exist and identifying opportunities for improvement.

Programs and code standards that incentivize or require landscaping and open space do exist within the city of Seattle. The City of Seattle's voluntary Incentive Zoning program is applicable in Ballard's Hub Urban Village and allows developers to gain additional developable space, in the form of increased building height or floor area, in exchange for providing amenities, called "developer contributions" (Seattle Department of Construction and Inspections 2022a). Open space is one of these amenity options. The Seattle Green Factor, which aims to enhance quality and quantity of landscaping, applies to certain new developments, requiring them to incorporate some landscape elements, including "green roofs, rain gardens, vegetated walls, and trees, and shrubs" (Seattle Department of Construction and Inspections 2022b). Only

new developments that are in certain zoning designations, like multi-family residential, commercial, and some industrial zones, need to comply with the Seattle Green Factor. While these programs exist, they are limited in their application to new developments and in the extent of their impact to create usable open space and urban greenery.

Ballard's unique history is ingrained throughout the neighborhood. The story of Ballard's grit and work-ethic is told through the maritime industry, which continues to run as a working waterfront. Its tight-knit Nordic heritage is reflected in stories told by elders, in public parks, and in parades. Stories of the area's Indigenous history are too often left untold. A common tale heard in Ballard today is how much the neighborhood has been changed by relatively recent developments, a narrative tinged with loss. Despite this change, Ballard's history and community identity remains. Public green and recreational spaces offer an opportunity to help the Ballard community tell old stories while weaving new ones.

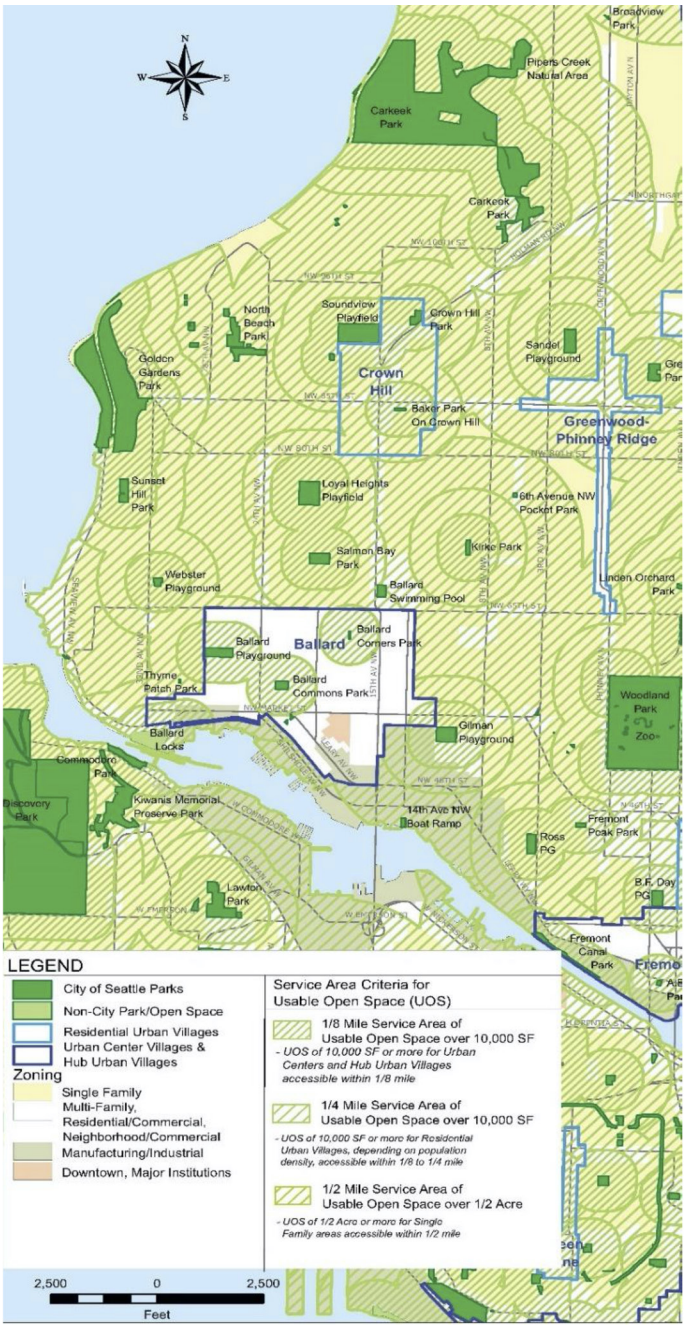



Figure 7. Seattle Parks and Recreation 2011 Gap Analysis Report showing distances from open spaces in Ballard. Groundswell NW notes that the definition of access used in this analysis may be too broad; it does not consider barriers like busy arterials and topography. *Groundswell NW Ballard Open Space Plan 2014 Update.*

# LITERATURE REVIEW

# 4. LITERATURE REVIEW

There is a distinction to be made between a space and a place. A space is a physical arrangement of features, like a cluster of trees near a grassy field, surrounded by a paved path and a dozen benches. A place incorporates this physical arrangement but adds layers of emotion and experience to create a significant location to which one is attached. This attachment, formed by emotion and experience, can distinguish a place from a space.

While it's clear that people can become attached to places, it is unclear what role green spaces play in developing broader place attachment. The following literature review covers fundamental definitions of place attachment, confirms that attachment to place is closely tied to health and well-being, concludes that green spaces can be significant venues for development of attachment, discusses potential implications of the Covid-19 pandemic upon attachment to and use of public space, and explores benefits and challenges of incorporating place attachment into the urban planning process.

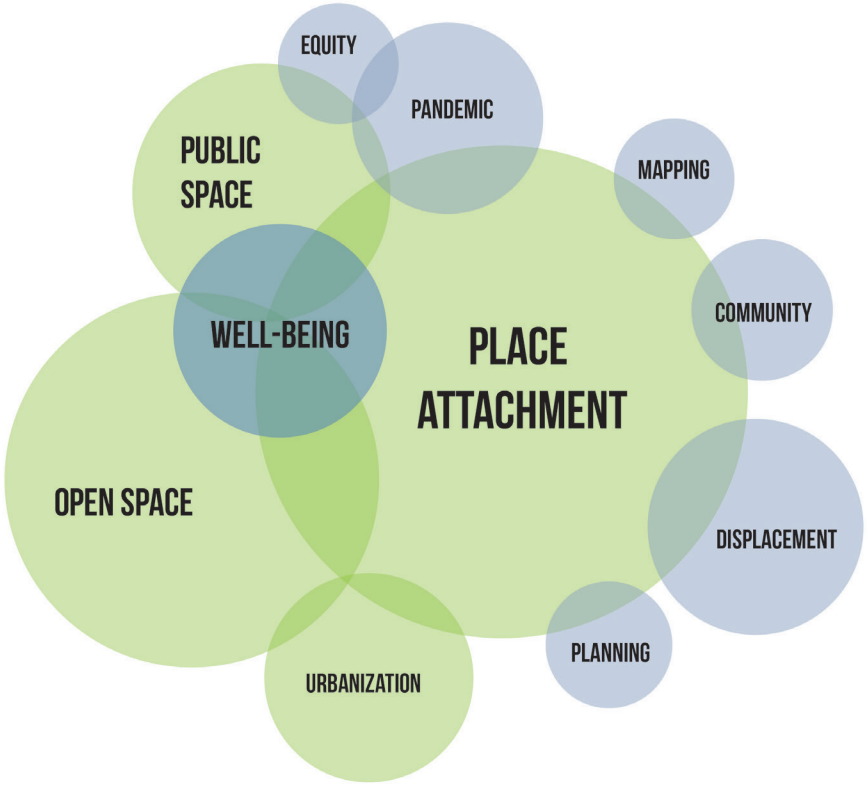



Figure 8. Visualization of connections between topics explored in the Literature Review. Circle sizes correlate with the number of sources on each topic; the larger the circle, the more sources on that topic are included in this review.

## Fundamental place attachment literature

Early place attachment literature explored the type, scale, and location of attachments, establishing initial definitions from which recent literature continues to be based. In their exploration of the impacts of ecological environments on behavior and health, Stokols and Shumaker (1981) noted how difficult the study of place attachment is because of "the staggering complexity of the large-scale environment" (441). Subsequent research has added layers of depth to definitions of place attachment. Shumaker and Taylor (1983) defined place attachment as a complex relationship between people and residential environments, a rather narrow definition that does not include place relationships outside their immediate neighborhoods. Low and Altman (1992) expanded the definition further, stating that the study of place attachment looked more broadly at "the bonding of people to places" (2). Taylor, Gottfredson, and Brower (1984) investigated the development of attachments themselves, noting that the "multilevel nature of attachment processes...are both social and psychological in nature" (103). Korpela and Hartig (1996) expanded upon early research by exploring the relationship between favorite places and their "restorative qualities," emphasizing the psychological and emotional health benefits of familiar environments (221-231).

More recent research of place attachments attempted to add continuity and clarity to early definitions. Scannell and Gifford (2010) created a three-dimensional framework of "Person-Process-Place," which analyzes place attachment spatially, socially, and cognitively in a "tripartite" framework used widely today (1-5). The tripartite framework differentiates how meaning is created: on the personal or group level, the cognitive or behavioral level, and on a physical or spatial scale. These distinctions aid in understanding differences in the development and nuances of place attachment. Manzo and Devine-Wright (2021) define place attachments as "emotional bonds to places" and emphasize the well-being benefits of people-place bonds (136). This definition remains broad, open to attachments to a wide range of physical environments.

The body of research focused on place attachment theory continues to grow and includes a variety of topics such as housing, displacement, well-being, and green space. Lewicka (2011) reviewed Scannel and Gifford's tripartite model of place attachment and much of the recent

place attachment research to summarize the broad and evolving depth of literature to clarify current understandings and theories of place attachment. One of the primary findings of this literature review was that the Person element of the tripartite model has received most of the attention in this field. Other topics, including those focused on "social capital, environmental aesthetics...and meaning-making processes that stem from movements and time-space routines" present gaps in the literature (207). Lewicka presented various perspectives within the field of place attachment, including the debate over how much time it takes for place attachment to develop.

## Key elements of place attachment

Scannell and Gifford's tripartite framework of place attachment, mentioned above, differentiates between the person, process, and place elements of attachment and provides a primary lens through which place attachments are studied. The person element of the tripartite framework explores the social dynamics by which attachments develop and analyzes the characteristics of both individual and collective place meanings (2). The framework's process dimension investigates the psychological process by which attachments develop, noting that "the memories, beliefs, meaning, and knowledge that individuals associated with their central settings make them personally important" (3). The place element of the framework examines the physical and social characteristics of the locations of attachment themselves, finding that attachments to physical locations often result from the social ties that the places represent (5).

Specific factors are repeatedly identified in the literature as significant contributors towards developing place attachment. Continuity is a primary theme, both that continuity develops from long-held person-place relationships and that continuity of the physical environment can aid in developing and maintaining these bonds (Scannell and Gifford 2010; Twigger-Ross and Uzzell 1996). Environmental consistency and connection to the past can serve as a foundation for strong attachments to place.

In place attachment development, places often come to represent a deeper meaning, beyond the

spatial configuration of the space itself. According to Manzo and Devine-Wright (2021) this place meaning, and our attachments, are "a result of the sociocultural and political-economic context in which they appear" (139). Stedman (2003) suggests that rather than being attached to a location's physical characteristics, people develop attachments to the deeper meanings that the location symbolizes.

To a lesser extent, length of residence and housing type are also discussed as factors that impact place attachment. Length of residence in a neighborhood is generally thought to correlate with stronger place attachment and deeper place meaning (Scannell and Gifford 2010, 4). However, this generalization is refuted by Kaltenborn and Williams (2002), as they noted that correlating attachment to residence length oversimplifies and diminishes the deep bonds that people can create in more temporary environments, such as people who have recently moved or who are visiting a location.

There has not been enough research to make substantive claims about the impact of residential density and housing type on place attachments. However, research by Arnberger and Eder (2012) in Vienna exploring the connection between local residents' level of community attachment and perception and use of nearby public green spaces found that urban residents valued shared green space more than suburban residents did. This finding may suggest that an increased reliance upon shared green space for urban residents corresponds with a higher value placed upon this space. More research is needed to better understand the relationship between housing type, private open space access, and attachment to public open space.

## Types of place attachment

Because the reasons for development and elements of attachments are often based on personal experiences, social ties, and memories, place attachment literature is limited in making definitive conclusions on the topic. However, themes in type of attachments have appeared and help to clarify and categorize place attachments.

Social attachment, or the symbolic attachment to social bonds, is a common reason for a

location's significance (Woldoff 2002). Emotional bonds, whether with other individuals, community groups, or cultural institutions, add layers of meaning to physical locations. A location's physical and spatial characteristics also appear as reasons for developing attachment, perhaps more commonly in locations of significant or unique architectural or natural features. The utility a place serves, or functionality it provides, can result in place dependence, a type of place attachment that is primarily functional rather than emotional in nature (Stokols and Shumaker 1981).

Attachments may also be categorized by type of location. Manzo and Devine-Wright (2021) describe natural place attachments as attachments to specific outdoor settings and civic place attachments as attachments to larger-scale locations, such as entire neighborhoods and cities that can "symbolize one's association with a larger collective identity" (138).

## Place attachment, nature, and outdoor space

Natural and outdoor spaces are a significant focus of place attachment research, as they present unique place-based venues for social interactions and ecological experiences. Arnberger and Eder's (2012) research investigated relationships between community attachments and the local residents' perception and use of public green spaces (42). Data, split between urban and suburban residents in Vienna, showed that urban residents had a higher level of community attachment, valued shared green space more, and perceived a higher quality of life than suburban residents did. They found that the perceived supply of, access to, and quality of green space had the largest impact on community attachment. The research did not find a significant relationship between private green space ownership and development of community attachment.

Zhang, Matsuoka, and Huang (2018) added to the body of residential green space literature by exploring how green space design in residential areas impacts place and social attachment in public housing communities in Taiwan. The research sought to better inform planners and architects to ultimately design better public housing communities that provide for emotional, social, and physical needs. The research found that combinations of outdoor space quality, circulation, recreational facilities, and layout all affected relationships to place. Hosseini et al.

(2021) researched the impact of local green spaces on attachment and behavior, particularly the social attachment of residents in Hamadan City in Iran, with a focus on the historical and cultural value of these spaces. Results showed that place attachment was affected by emotional, functional, social, and spatial bonds, and that stronger sociocultural bonds were correlated with a stronger role of green spaces in place attachment.

As discussed in the subsequent sections, connections are also made in the literature between green space, health, and place attachment. Zhang et al. (2015) explored how attachment and health can be promoted by increasing the availability of accessible and usable green spaces, focusing on the significance of the quality of green spaces in relation to place attachment and mental health. Results from the Dutch city of Groningen showed that the neighborhood with green space that was more available, accessible, and usable also had residents with greater place attachment and better mental health. The authors concluded by encouraging municipalities to "make green places, instead of green spaces" by incorporating qualitative research when planning and designing for green spaces that benefit the health and wellbeing of users (14343).

The literature also explores place attachment to non-urban outdoor spaces which tend to be larger, more remote, and more ecologically pristine. Williams et al. (1992) studied emotional and symbolic attachments of wilderness users, finding that people with strong attachments to a particular place are less likely to have strong attachments to the overall idea of "wilderness," but that an attachment can be had to the general wilderness concept.

## Nature, outdoor space, and physical well-being

Natural and outdoor spaces have many well-studied benefits to physical health, due in part to the impacts nature and greening have on the built environment. Shishegar (2014) describes how vegetation like street trees and parks can mitigate urban heat island effects and benefit human health. Urban green spaces have been found to have positive impacts on urban air quality, which also benefits human health (Nowak and Heisler 2010). High quality, safe urban green spaces, particularly parks and trails, provide opportunities for recreation and exercise to the benefit of physical health. Studies like that of Sachs and Marcus (2014) have also found that visual and

physical access to nature aids in the physical healing process for hospital patients. Robbins (2020) summarizes other health benefits of natural settings, including nervous system, blood pressure, and immune system regulation.

Further research explores the holistic health and well-being benefits derived from green spaces. Irvine et al. (2013) compared individuals' intended reasons for visiting parks with reported benefits after visiting the park to understand motivators and effects of park use. Through surveys at 13 park sites in the UK, Irvine et al. found there were discrepancies between the intended reasons for visiting a park, which tended to be functional, and the derived effects, which were more emotional and spiritual. These derived effects show clear health and well-being benefits resulting from park use.

## Nature, outdoor space, and mental well-being

In addition to physical health benefits, natural and outdoor spaces have well-studied benefits for mental, emotional, and psychological well-being. Natural spaces, both in urban and wilderness settings, have been found to have positive effects on happiness, creativity, self-esteem, and community cohesion (Glaeser 2008; Weinstein et al. 2015; Williams 2017). Access to high-quality and safe outdoor space is therefore important for overall human health.

Bratman et al. (2019) emphasize the importance of investing in urban greening in the built environment, since urban development reduces greenery of various types while increased density increases the need for natural environments. In their study of Discovery Park in Seattle, Lev et al. (2020) found that relatively wild outdoor spaces can aid in developing resilience and overall well-being. Marcus (1992) found that "many people…seek out nature-dominated settings to reduce stress." This observation echoes the importance of natural spaces for psychological health and well-being.

Nature's restorative benefits to personal well-being have been studied in-depth. Ulrich (1979) found that viewing images of nature helped students feel fewer negative emotions; Honeyman (1992) found a similar result with images of vegetation in urban settings. Subsequent studies

focused on nature's restorative benefits found that experiencing and viewing nature aids in processes of self-regulation and in overall emotional health (Korpela 1989; Kaplan 1995; Korpela and Hartig 1996).

## Place attachment and well-being

A significant portion of the literature explores relationships between place attachment and mental health and well-being. Scannell and Gifford (2017) sought to understand how place attachment satisfied the psychological needs of participants, like belonging, meaning, and self-esteem. The authors investigated how being ostracized impacts the potential satisfaction of psychological needs through place attachment. By conducting online group-based games with undergraduate university students, Scannell and Gifford found that visualizing places associated with place attachment increased satisfaction of psychological needs, helping convey why bonds between people and place exist. This project incorporated place attachment as an independent variable, a novel way of looking at the topic.

Attachment to third places, locations between home and work where people socialize, is a significant component of social health and well-being. Rosenbaum et al. (2007) described "socially supportive destructive events" that people experience, such as death, divorce, illness, retirement and other events that impact one's social support network (44). Rosenbaum et al.'s research investigated to what extent commercial third places can fill social support and relationship needs. Through a literature review and interviews at a local diner, Rosenbaum found that third places, particularly in the face of loneliness or isolation, can serve as a gathering place for development of social networks and can positively affect health and longevity. Rosenbaum et al. wrote, "Third-place patrons match their lost support to their commercial support, thus remedying negative symptoms associated with isolation" (1). Place attachment is assumed to develop in these socially supportive communities and environments.

## Place attachment and equity

It is necessary to acknowledge the history of place inequity, which has and continues to dictate

who is included in and excluded from public space. Trawalter, Hoffman, and Palmer (2021) note, "Public spaces have never been truly public. They have always been exclusionary and inequitable" (131). Exclusion from space based on race, ethnicity, religion, sexual orientation, and gender were commonly written into law and exclusionary practices continue to present themselves in more covert ways. An increasingly visible and contentious debate on exclusion of people experiencing homelessness from public parks wages on in Seattle and other cities across the country (Brownstone 2021). Hostile architecture, a design type intended to restrict certain behaviors like resting or camping, is commonly incorporated into public spaces with the intention of excluding unwanted individuals, including those who are unhoused (National Recreation and Park Association 2017).

Restrictions on and rules in public open space have affected place attachments, as the places that we are familiar with and can access contribute to our attachments. Trawalter, Hoffman and Palmer note that involvement in public space shapes civic life and sense of belonging, so exclusion from and negative experiences in space may shape the symbolic meaning of places and to what extent we feel comfortable and safe in certain spaces.

## Built environment disruptions

Changes within the built environment, like densification and urban infill, have potential to impact place attachment, as explored in work by Wirth et al. (2016). Residents in Zurich, Switzerland were surveyed by mail, their responses measured quantitatively on a Likert scale. The authors found significant positive relationships between age and time of residency with place attachment, and a positive relationship between cooperative housing and place attachment. They also found that place attachment increases when the perception of an urban change is perceived as an upgrade and that the area is still familiar. This research justifies early resident involvement in urban planning and design processes, especially in rapidly urbanizing and evolving areas. Disruptions that fit into the community's perception of existing space may be better received and prove to be less of a disruption to place attachment.

In their research, Lin, Meyers, and Barnett (2015) found that green infrastructure decreases

with densification, particularly public parkland and residential tree coverage. Disruptions to urban greenery could impact attachment, as people can develop emotional attachments to these natural spaces at a variety of scales. Lin, Meyers, and Barnett also found that lower income communities may have a higher reliance on public green space than higher income communities due to a smaller presence of private residential canopy cover in low-income communities.

A significant subset of place attachment research focuses on displacement and its impacts upon social and neighborhood ties. Fullilove (2016) explored themes of gentrification as they relate to place attachment, focusing on displacement of African American communities in the United States due to urban renewal. Fullilove aimed to understand the emotions tied to violent displacement, a process that continues to occur, to emotionally heal from the experiences. She stated that people "live in an emotional ecosystem," referring to the immense depth and complexity of our environments, moving beyond the physical realm to encompass the intangible feelings and emotions that accompany spaces (17).

Further research on displacement and place attachment incorporates natural disasters and Indigenous perspectives. In her thesis titled Emotional Infrastructure, Durgerian (2019) investigated how trauma, specifically recent earthquakes in Christchurch, New Zealand, affected emotional connections to place and the processes of healing post-event, and how emotional infrastructure builds and crumbles in communities and civic spaces. Durgerian conducted interviews with people who lived through the earthquakes in 2010 and 2011, including members of the Māori population, the Indigenous peoples of New Zealand. Through these interviews, people expressed feelings of physical and social loss, alongside physical changes within the city. Members of the Māori community provided an insightful and powerful viewpoint, stating that the earthquakes disrupted a "damaging normal" and presented an opportunity to do things differently going forward (103).

## Covid-19 pandemic

The Covid-19 pandemic dramatically altered the lives and daily routines of people around the world. Research by Fancourt and Steptoe (2021) in the UK showed that the pandemic has had

significant impacts upon psychological and social health. The report found that socioeconomic inequalities are widening due to the pandemic, and people who have lower incomes report higher levels of depression, anxiety, and loneliness and lower levels of satisfaction and happiness with their lives. Green spaces are often seen as a source of respite from psychological stress, so it is important for urban planners to understand the psychological toll that the pandemic has had and how it may affect people's behavior in and use of public space.

Use and perceptions of public space were affected by the pandemic. As Devine-Wright et al. (2020) wrote, "One of the key values of public space - the chance encounter with others - is based on the very unpredictability that can be anxiety-provoking now" (4). Volenec et al. (2021) researched changes in park use due to the pandemic, and wrote that because of the pandemic people have had access to "limited recreational opportunities, widespread financial uncertainty, and consequent heightened anxiety" (1). Volenec et al. sought to understand how park visitation changed during the pandemic and how effective park shutdown orders were. The researchers used geotagged social media data from parks in New Jersey to look at four time periods in the spring of 2020 (before the pandemic, during the beginning of the pandemic, during the New Jersey statewide park shutdown, and after the shutdown was lifted). Volenec et al. found that at the start of the pandemic park visitation increased by 63.4%, before shutdown orders were enforced. These findings suggest that parks provide critical resources to communities and were a popular venue for recreation during the pandemic.

Despite this initial work, many questions about the pandemic's impacts on relationships with place remain unanswered. Devine-Wright et al. (2020) created a theoretical framework and identified implications of recent disruptions to explore themes of emplacement-displacement, inside-outside, fixity-flow, home-making and un-making, new politics of public space, and access to recreational spaces. Devine-Wright et al. found that examining altered relationships to place and use of place must be incorporated in post-pandemic planning and policymaking in order to better understand the extent of the pandemic's disruption. This research specifically addressed inequities exacerbated by the pandemic, including the privilege to remain at home rather than go to a front-line job and forced displacement due to loss of employment or illness (2-3).

The long-term effects of the pandemic on design, perception, and use of public space have yet to be completely understood. Honey-Roses et al. (2020) questioned the permanence of the pandemic's impacts on public space and whether social behaviors within and emotional connections to public space will change permanently or if these changes brought about by the pandemic and related lockdowns will wane. The authors noted that future attitudes towards and use of public space may have design implications for streets, sidewalks, parks, and other public spaces. Low and Smart (2020) discussed how the pandemic has affected public space, third places, and social networks, and wrote that "we are experiencing a shrinking sense of world" and notable isolation. They noted, "third places…provide important locations for feeling as if we are part of a social world and belong within it" (2). The authors weren't concerned about third places surviving; they believed that strong social networks would stand the test of time. Instead, they worried about the future of public spaces because of fear of disease transmission. Once places for spontaneous interaction with strangers, public spaces now pose a risk.

## Place attachment and urban planning

The field of urban planning often fails to incorporate person-place bonds into the planning and public engagement process. There are benefits to including place attachment in design and planning professions; Manzo and Devine-Wright (2021) write, "Planning and design can benefit greatly from the consideration of place attachments as a way to guide sensitive, socially responsive design solutions" (142). This is a challenging undertaking, as the advice and agendas of planners can conflict with community desires. Francaviglia's (1978) research in an Ohio town that experienced damage from a tornado studied conflicts between urban planners and communities. Despite planners' recommendations, the town was rebuilt to look much like it did pre-disaster, illustrating how strongly place attachments influence planning decisions.

Place attachments may continue to shape the built environment. For example, the American Dream of single-family home ownership has become symbolic of prosperity, success, and independent wealth. Attachment to this housing type may affect efforts to increase housing density and diversify housing types in urban areas. Incorporating place attachment into

engagement processes may help urban planners better understand the needs and perspectives of local communities and help build consensus and compromise.

## Literature takeaways

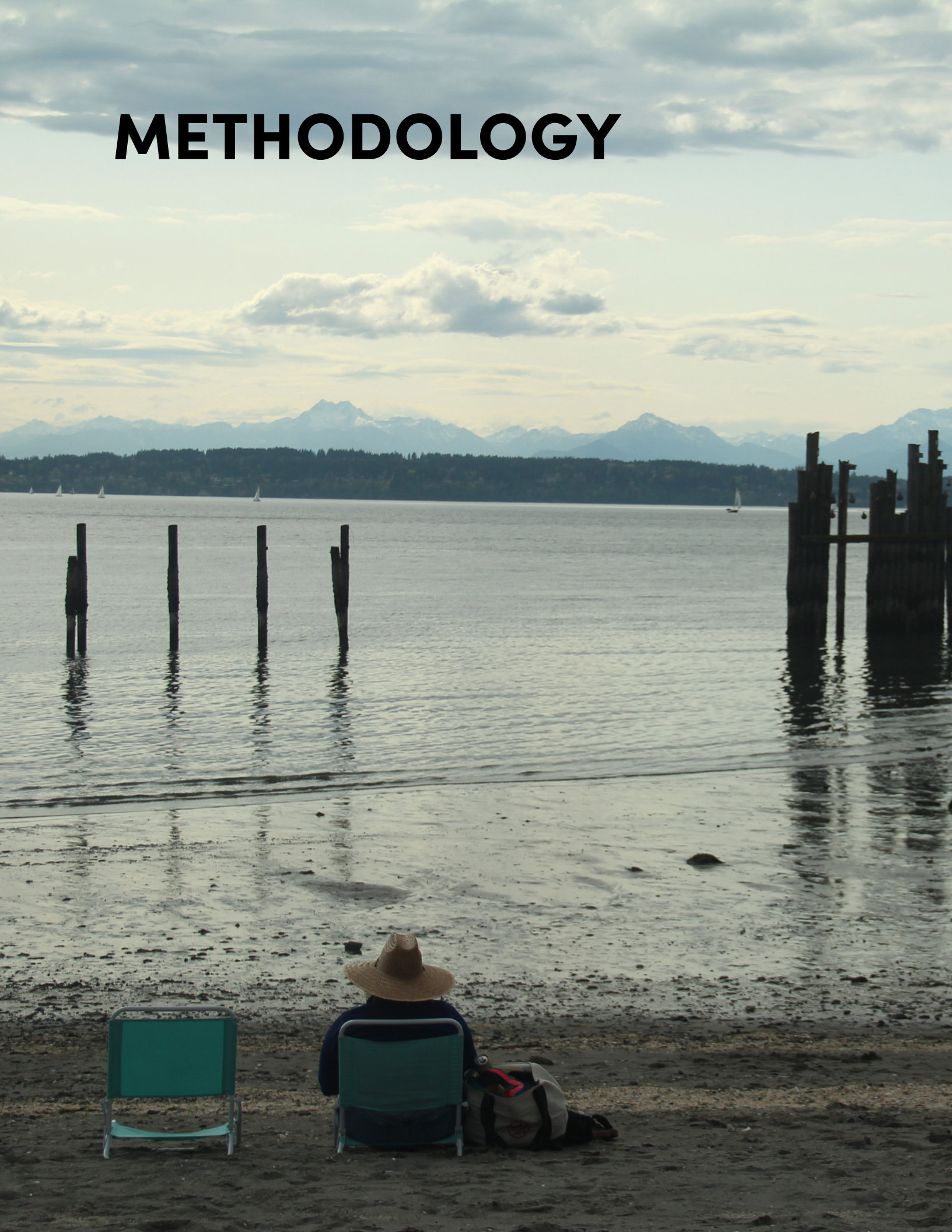
Several primary lessons found in the literature relate to this research. First, while quantitative research allows for broad information gathering, qualitative research provides the depth of knowledge needed to understand place attachments fully. The literature shows that place attachments can develop on a variety of scales, for a variety of reasons. Spaces become places when layered with meaning; attachments are often tied to the symbolism and meaning that a place holds, rather than its physical characteristics (Stedman 2003).

Public green and recreational spaces offer opportunities to develop place attachment, in part through emotional, functional, and social bonds (Hosseini et al. 2021). Place attachments are beneficial for overall well-being (Scannell and Gifford 2017), but can be disrupted by changes in the built environment (Wirth et al. 2016). Continuity of an environment can help sustain person-place bonds (Twigger-Ross and Uzzell 1996). This research will provide insight into how attachments to public green and recreational spaces develop and serve as locations of continuity among rapidly changing urban landscapes. Topics like time-depth and vicarious enjoyment, that are not a significant focus of place attachment literature, are explored in this research.

Traditional place attachment literature correlates length of residency or neighborhood tenure with place attachment. This research will focus on the place attachments of multi-unit dwellers in Ballard, a relatively transient population, and supports research showing that new and temporary residents can develop meaningful place attachments (Kaltenborn and Williams 2002).

Finally, the literature shows that there are benefits to incorporating place attachment into the urban planning process, but that challenges exist in doing so (Francaviglia 1978; Manzo and Devine-Wright 2021). The findings of this research will suggest ways that place attachments can be incorporated more intentionally in the urban planning process in order to maintain continuity of existing place attachments and create opportunities for new person-place bonds to form.

# METHODOLOGY



# 5. METHODOLOGY

This research asks how do public green and recreational spaces and their uses contribute to the place attachment of multi-unit dwellers in Ballard? And how can these spaces help maintain continuity of place attachment in a rapidly changing and increasingly dense urban environment?

I sought to answer these questions through a qualitative case study by collecting data through one-on-one interviews with multi-unit Ballard residents to explore their attachments to public green and recreational spaces in their neighborhood. These interviews were semi-structured; I asked everyone the same questions but followed a conversation's natural path. After the interview process, I coded each set of responses through iterative reviews, emerging with six main themes about place attachments that appeared from these conversations. This section will detail the research process, from printing posters and emailing community groups to interviewing neighbors and interpreting findings.

## Research ethics

Before diving into specifics of the research methods, I'd like to mention a few ethical considerations. My positionality as a researcher, a transplant to Seattle, and a white person with few ties to the neighborhood was at the forefront of my mind as I considered how best to engage the community and to understand their collective and individual identities and perspectives.

### *Bias*

My own conscious and subconscious biases act as a filter through which I receive information, impacting my perceptions.  I tried to remain aware that my own theories, ideas, and preconceptions have the potential to influence my work as I went through the interview process. I had a loose plan of topics I wanted to cover in each interview: housing decisions, feelings about the neighborhood and how it's changed, use of and attachment to green space, etc. Because these are all topics I am intrigued by, and because it helped spur conversation along, I sometimes

added some of my own thoughts into the mix. I avoided biasing answers by not introducing a particular viewpoint myself. I tried to balance my positionality as a researcher with being a personable and engaging interviewer.

### *Consent to record and anonymity*

At the beginning of each interview, I asked participants if they were comfortable with me recording the audio of our conversation with the Otter AI app. All participants consented to being recorded. I took care to keep the identities of participants private by assigning each participant an identification number used in the coding process instead of their name. All quotes in this report are anonymous and no identifying information about participants is included.

## Research design

After considering a range of research method types with the help of Creswell and Creswell's *Research Design* text, I decided to conduct a qualitative study in order to provide nuanced insight into place-based relationships. Qualitative studies like Emotional Infrastructure, a thesis that explores place attachment and trauma in post-earthquake Christchurch, New Zealand, allow for a deeper understanding of multifaceted relationships with place and a free-form inquiry into the topic (Durgerian 2019).

A significant proportion of place attachment research has been conducted quantitatively through mail surveys and Likert scale responses. While these studies typically have larger sample sizes than qualitative studies, they are limited in the depth of knowledge they can gather. A checkbox on a written survey puts borders around potential responses and cannot capture the full extent of experiences that exist in the sample population. Though the data collected from this research was pared down and generalized to a few key findings, it reveals a breadth of insight into multifaceted place-based relationships and lived experiences.

This is not a comparative study; I did not systematically compare attachment to public green and recreational space by participants' housing type, proximity to public space, age, or any other

factor. To complete a comparative study would have taken more time than I had and would have required gathering more specific demographic information from participants. This type of comparative study would be interesting to address some of the themes reflected in the literature, and could present opportunities for future research.

## Research timeline

Figure 9 shows a timeline of the interview process, from outreach to analysis. I began seeking participants and contacting community groups in late December of 2021. Interviews were conducted from mid-January of 2022 until the end of February. Data analysis began in late February and wrapped up in early April. The rest of April was spent organizing findings.

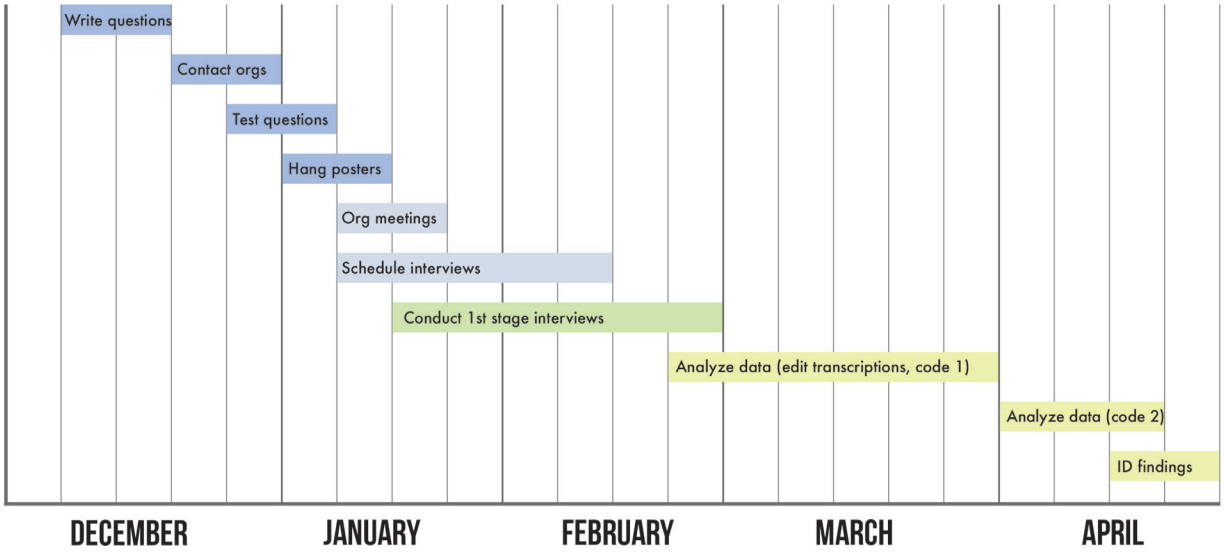



Figure 9. Timeline of research methods.

## Participant outreach

To find volunteers to participate in my research I created a poster (Figure 10) that included a call for participants, key details about my research, and my contact information. I distributed this poster around the neighborhood, including at the Ballard Public Library and in a variety of stores and cafés, primarily in Old Ballard and Central Ballard. I sought participants through several of the larger apartment buildings in the neighborhood by putting posters on community boards

and in building lobbies. My poster made the rounds digitally, both on the Ballard Southwest Buy Nothing Facebook page and the My Ballard Facebook page. I also communicated with community groups in Ballard to get the word out through community meetings, newsletters, and social media pages. These groups included the Ballard Alliance, the Ballard District Council, the East Ballard Community Association, Groundswell NW, the Sunset Hill Community Association, and the Ballard/Fremont section of Seattle Neighborhood Greenways.


Figure 10. Call for participants poster.

## Participant selection

Throughout January and February of 2022, 39 people were interviewed for this research. Most participants volunteered over email to be interviewed after hearing about this project through a reference from another community member or seeing my poster around the neighborhood or on social media.

I was pleasantly surprised by the number of people who were interested in participating in my research. I anticipated conducting 20 interviews, but almost doubled that number due to the high level of interest. Because of the time constraints of this research I decided to stop scheduling interviews in late January, after I received interest from 33 people. All 33 of these people were verbally interviewed. Anyone who contacted me after late January was given the opportunity to participate by answering the interview questions in a written form; six people responded to my questions in this written format.

The only qualifications I had for participation in my research were that participants lived in Ballard and were multi-unit dwellers; if participants met those two criteria, I interviewed them. I did ask about participants' level of access to private open space in the interviews, but decided to not make this a criteria for participation. There is diversity in the level of access multi-unit dwellings have to private open space and I felt it was important for that diversity to be reflected by the participants. So, for example, I would include the owner of a townhouse in West Woodland in my study even if they had access to a small private yard. My primary goal in participant selection was to understand how public green and recreational spaces impact the place attachment of a range of multi-unit dwellers.

## Interviews

Interviews were designed to be semi-structured one-on-one conversations that would last around 30 minutes and could be conducted in person, over Zoom, or in a written format. All participants consented to have their interview audio-recorded with the Otter AI app, which produced a written transcript of each interview.

The interviews covered topics like housing choices and tradeoffs, feelings about Ballard generally, use of and attachment to nearby public green and recreational spaces, change in the neighborhood, and desires for open space in Ballard. The semi-structured nature of the interviews built flexibility into this process and allowed me to follow the flow of the conversation and ask questions in different orders or omit questions based on applicability to each participant (Creswell and Creswell 2017). A complete list of interview questions is shown in Appendix A.

In interviews conducted in person or over Zoom, participants were given a map of the neighborhood to help identify which public green and recreational spaces they were most attached to. Participants or I used physical or digital markers to mark significant locations on these maps. The markings on these maps were compiled into one collective map, Figure 12, in the Findings section to show an overview of significant locations of attachment to public green and recreational spaces in Ballard.

## Data analysis

After all interviews were completed I began analyzing the data collected. I included all 39 participants' perspectives in the data analysis process. I did not reject or throw out any interviews, regardless of participants' multi-unit dwelling type, access to private open space, or opinions. Even if a participant said that public green and recreational spaces were not meaningful to them, their interviews were included in my data analysis process.

I completed three phases of coding in the data analysis process. In the first phase, I listened to each interview recording while, in a Google Doc file, editing the written transcript produced by the Otter AI app. I noted initial observations of themes and ideas that emerged in each interview. In the second coding phase I recorded basic information from each interview, like length of residency in Ballard and unit type, and compiled a list of locations of significant attachment. The third and final phase of coding was completed to sort key quotes and ideas from each interview into a variety of categories, like 'whimsy,' 'belonging,' and 'dynamism,' in an attempt to identify themes and begin organizing findings.

From this iterative coding process I created six main categories of findings, each of which included sub-codes, totaling 20 distinct sub-codes. A visual of these categories and sub-codes is shown in Figure 11 in the Findings section, which details each category and uses quotes from interviews to illustrate the distinct yet interconnected themes.

## Interviews by the numbers

Of the 39 participants interviewed for this research, eight people were interviewed in person, twenty-four on Zoom, one over the phone, and six through written responses. The shortest interview was 16 minutes and the longest was 62 minutes, with an average interview time of 36 minutes.

Participants ranged from newcomers in the neighborhood to long-time residents. At the time of our interview, the participant newest to the neighborhood had lived there for six months and the most long-term participant had lived in Ballard for 25 years. Most participants lived in or near Ballard's Hub Urban Village in Central Ballard; a few participants lived in other sub-neighborhoods like West Woodland, Crown Hill, and Loyal Heights. Participants were all multi-unit dwellers and lived in a variety of unit types, mostly in townhouses, small apartment buildings, or larger mid-rise apartment complexes.

Of those interviewed, there was a roughly even split of renters and owners. I spoke to three parents of young children and two local Ballard business owners. Most participants had little or no access to private open space, while some had access to shared open space.

The Findings section will explore the insights that emerged from these 39 interviews relating place attachment to public green and recreational spaces in Ballard.

# FINDINGS

# 6. FINDINGS

The insights gathered from Ballard community members is at the core of this research and represents a variety of unique viewpoints, priorities, and ideals, all shaped by the lived experiences of those generous enough to participate. Through the 39 interviews I was presented with a waterfall of information; some themes emerged more strongly than others. After going through an iterative coding process, six primary themes relating public green and recreational spaces to place attachment emerged.

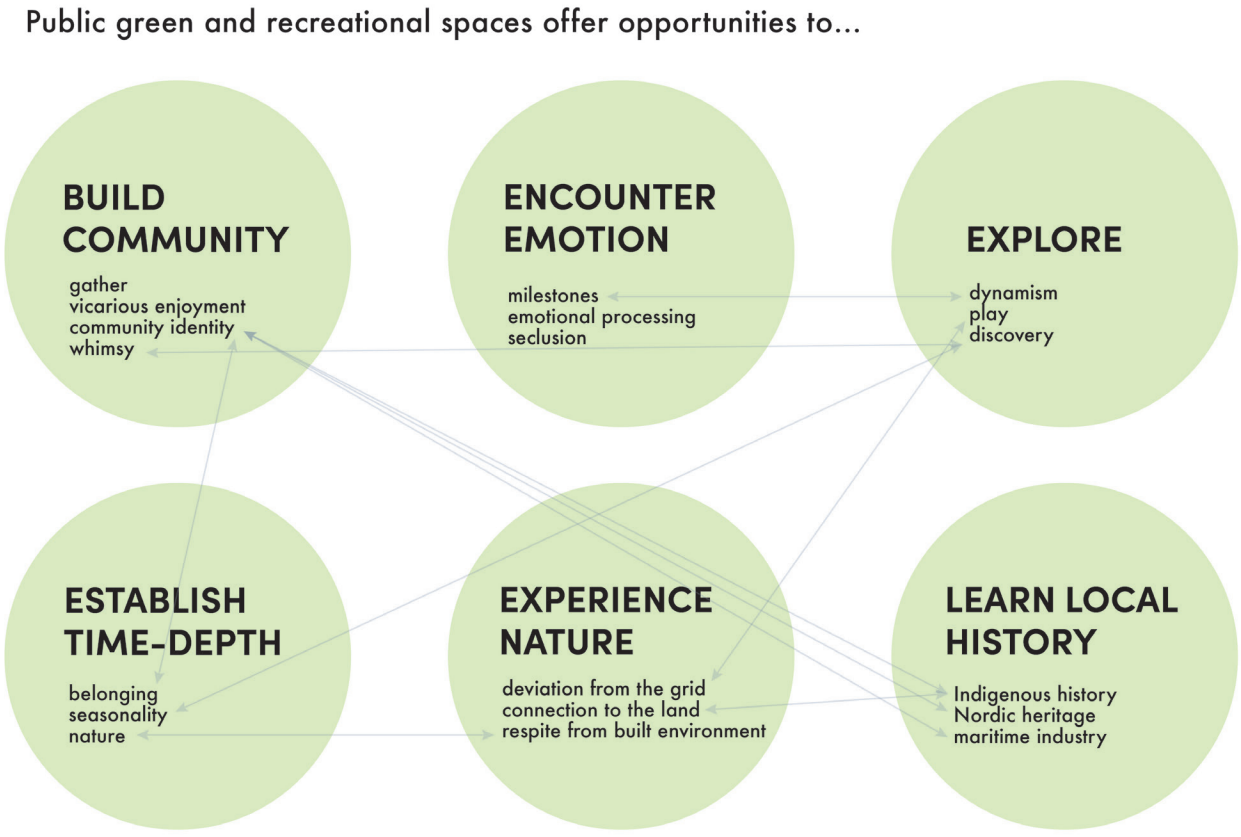



Figure 11. Findings web showing the distinct findings categories and associated sub-codes, and the connections between these topics.

This section will delve into these primary themes, each with unique sub-themes. Direct, anonymous quotes from interviews are used to illustrate these themes and their nuanced connections within Ballard. From interviews with multi-unit residents in Ballard, I found that public green and recreational spaces contribute to place attachment and maintain a sense of continuity in a changing world by offering opportunities to...

***Build community***

Deep social and place-based attachments can form when people have the ability to gather, observe, express creativity, and whimsically engage with others in public green and recreational spaces.

***Encounter emotion***

Through good times and bad, public green and recreational spaces are witnesses to our lives, providing venues to celebrate, grieve, process emotions, and develop personal attachments.

***Explore***

Whether in a formal public park or in the center of a traffic circle, public green and recreational spaces offer opportunities to discover new things within the built environment.

***Establish time-depth***

Public green and recreational spaces may be able to accelerate time-depth and serve as places of continuity amidst a rapidly evolving residential landscape.

***Experience nature***

Within a highly engineered built environment, public green and recreational spaces allow for people to connect with nature and become more in tune with the surrounding environment.

***Learn local history***

Becoming familiar with a place's backstory can help people more fully understand the context of a location, as one would get to know a friend by learning about their past.

Before delving into each of these six themes, a few other findings stand out. Each participant shared which public green and recreational spaces they feel most attached to in Ballard; a map of these significant locations is shown in Figure 12. The largest circles, signifying the places that were mentioned by the most participants as being locations of significant attachment, include the Ballard Locks, Golden Gardens Park, Sunset Hill Park, and the Burke-Gilman Trail.

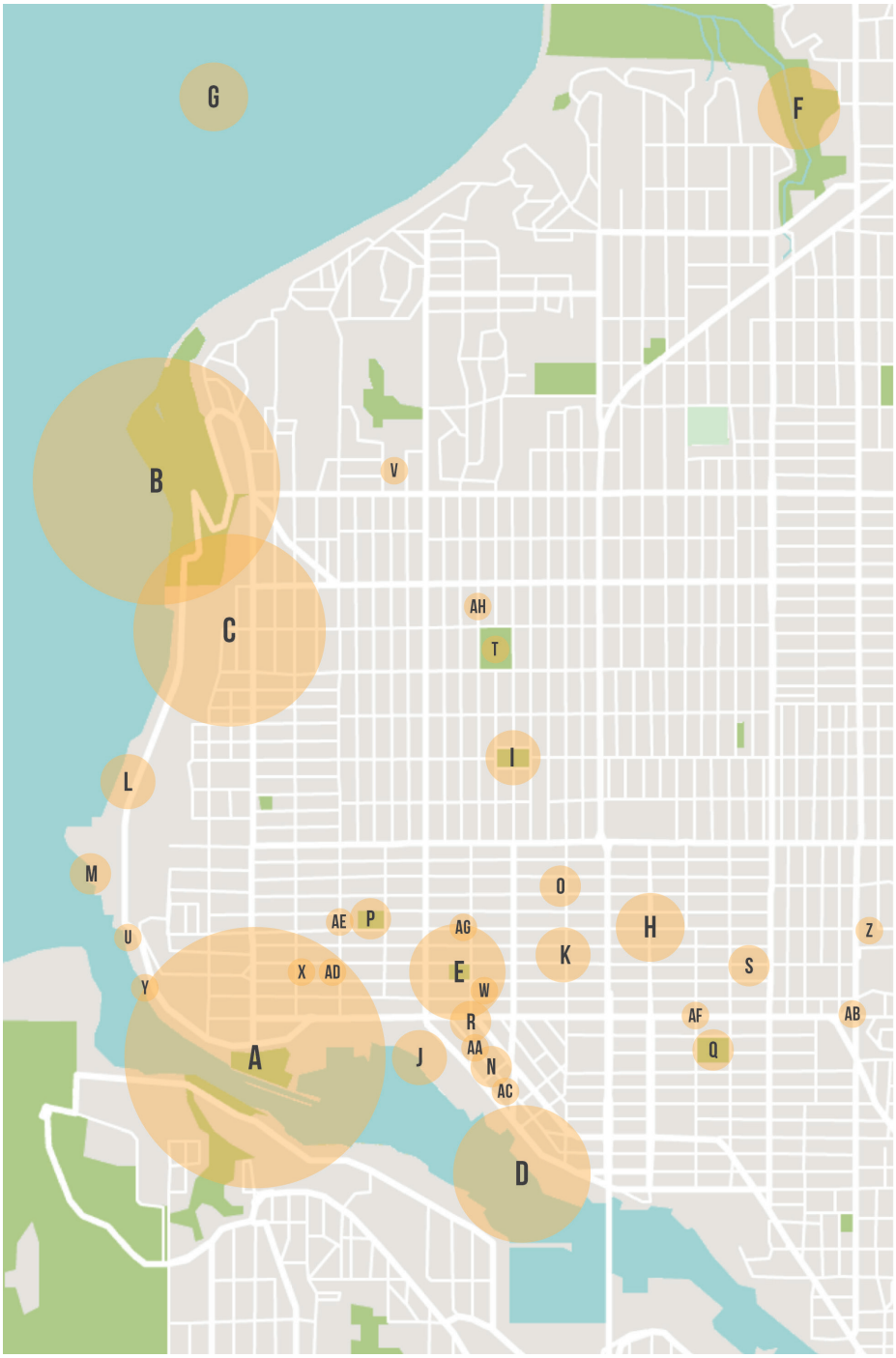



Figure 12. Map of attachment to public green and recreational spaces in Ballard. The bigger the circle, the more participants mentioned holding a significant attachment to the location.

A. Ballard Locks
B. Golden Gardens Park
C. Sunset Hill Park
D. Burke Gilman Trail
E. Ballard Commons Park
F. Carkeek Park
G. Puget Sound/Salish Sea
H. Gemenskap Park
I. Salmon Bay Park
J. 24th Ave Public Dock
K. 17th Ave Stay Healthy Street
L. Seaview Ave NW
M. Secret Beach
N. Ballard Ave NW
O. Ballard Corners Park
P. Ballard Playground
Q. Gilman Playground
R. Ballard Farmer's Market
S. NW 58th St Greenway
T. Loyal Heights Playfield
U. NW 60th St Viewpoint
V. Ballard P-Patch
W. Ballard Branch Library
X. Thyme Patch Park
Y. Double Secret Beach
Z. Phinney Ridge P-Patch
AA. Marvin's Garden
AB. Greenwood Triangle
AC. Brambling Cross seating
AD. Cherry blossom trees
AE. Adams Playfield trees
AF. Oak trees

Notably, several participants reported being attached to Ballard Commons Park, but reflected a range of associated emotions, including loss and sadness. This park is currently closed to the public and was previously occupied by a homeless encampment. The continued mention of this park as a location of significant attachment, even though its meaning has changed for many participants, shows the complex variety of emotional bonds that place attachments can reflect.

Another question asked of each participant was whether public green and recreational spaces impact their attachment to their neighborhood. The majority of participants responded with a resounding yes, and a few said that these spaces are a nice perk, but aren't sure how much they impact their neighborhood attachment. Two people said these public open spaces do not impact their attachment to Ballard, and that people have a larger impact on their place attachment. These responses reflect the depth and complexity of our attachments to place, which are shaped by a variety of unique factors. Regardless of attachment to public green and recreational spaces themselves, these places often serve as venues for interacting and gathering with fellow community members and are places where social attachments can develop.

The last question asked in each interview was about each participant's wishlist for open space in Ballard. Appendix C includes a summary of this list, compiled from all participants' responses. The most commonly desired features were more public open spaces and playgrounds throughout the neighborhood, improved pedestrian and bike infrastructure, increased transit service to public open spaces, and a dog park in Central Ballard. In Appendix B, barriers affecting the access of multi-unit dwellers to public green and recreational spaces are explored. Now, let's explore each of the six primary findings themes.

## Build community

Public space is "where we encounter other people who we may not necessarily know and where contact and connection occurs in a more open, democratic, inclusive and yet unpredictable way" (Low and Smart 2020, 2). These spaces offer opportunities for neighbors to meet on common ground, gather as a community, and witness the enjoyment of others. Particularly for multi-unit dwellers who often lack access to private open space, public green and recreational spaces can serve as a communal front yard; space that is shared by many yet personal for all who use it. These places can take on an emotional quality for users, as attachments to place are "dynamic and socially produced" (Manzo and Devine-Wright 2021, 139). Social connections can lead to deeper and more long-lasting attachments to place, as meaning becomes ingrained in the place itself.

Public green and recreational spaces also allow for abstract community connections. Described by one participant as "whimsical community engagement," these interactions may not happen face to face, at the same time, or in the same place, but do allow for communication between neighbors and have potential to strengthen social attachments and community identity.

### *Gather*

Many of the multi-unit residents I spoke with expressed that the public green and recreational spaces that are the most meaningful to them are significant in part because they serve as a meeting place to gather and interact with friends and neighbors. Smaller parks, like Gemenskap Park and Sunset Hill Park, were mentioned as offering opportunities for community gathering.

> Of Sunset Hill Park, one resident said, "*I feel like it's kind of a little neighborhood magnet in some ways for lots of people to walk up there.*"
>
> A participant who lives near Gemenskap Park noted, "*The parks give you a reason to go outside and meet people. I have my tiny postage stamp of a front yard but it's not the same as going out to the park…I've gotten to know people better as a result of that park.*"

Many participants mentioned social interactions with friends and neighbors in public green and recreational spaces as being significant components of their attachment to their neighborhood. Gemenskap Park, a two-block stretch of green space that replaced a median and row of parking in East Ballard, has become an important gathering place for the community. Coincidentally, the word "gemenskap" means "community" in Swedish.

> Of Gemenskap Park, one participant said, "*I love that people enjoy human interaction. It's a really good place for that to happen…seeing people converse over their dogs and seeing families celebrate their first child's birthday…I feel like if this park weren't there…we wouldn't have that central place that everyone values.*"

Figure 13. Gemenskap Park.

Gemenskap Park, which opened in 2018, is a relatively new public space. Attachment to the park wasn't immediate for some nearby residents; it often takes time and experience for deep attachments to develop.

> One Ballard resident said, "*I remember when they first put in the green space on 14th Street and they put some cool little things or artsy kind of things around it…I just wasn't sure how I felt about it. I was like, 'what is this here?' And now I love it… when I see a mom walking her kid in a stroller it makes me feel like there are families here, and there is some longevity here.*"

The Ballard Farmers Market, held on Sundays year-round, serves as another significant location of social attachments for residents as they get to know other market-goers and farmers. Temporary adaptations of the built environment present opportunities for people to experience places and deepen attachments in novel ways.


Figure 14. Ballard Farmers Market.

One resident said, "*I think Ballard Farmers Market feels like such a community focused space between all the farmers markets, you know, like the whole meet the farmer thing. All the shops are always open and doing specials, we always run into a bunch of people we know. And it's such a draw for the whole city like it does feel like everyone is there we go.*"

Another noted, "*It's really nice to interact with local farmers and we go to enough of the food vendors and they recognize us now. It feels like a community spot and it's there year-round.*"

Creative adaptations of public space have, in part, resulted from the Covid-19 pandemic; interventions like Stay Healthy Streets, in which local streets are closed to through traffic, were implemented around the city to give pedestrians and cyclists more room to safely recreate. Besides being safe and car-free spaces, these interventions activated previously inaccessible spaces as they became new places for neighbors to gather.


Figure 15. 17th Avenue NW Stay Healthy Street.

One participant spoke about the Stay Healthy Street on 17th Avenue NW, saying, *"it de-emphasized the functional nature of the street in favor of making it more of a place for recreation. I've even seen people throw block parties in the middle of these streets. Even though they're not supposed to, people will set up a basketball hoop or a grill or something in the street. And that's not something that I ever saw in 2019 or in any previous year except for like a big street festival or something. So I feel like people have really started to make more active use of the street.*"

Another impact of the pandemic was the closure of many third places, locations outside home and work that are important to social networks, like local businesses and community centers. For some Ballard residents, outdoor public space filled the void of lost gathering space.

One resident noted, "*I like being reading in cafés and surrounded by people, but since that was not an option during the pandemic, Thyme Patch Park was a pleasant substitute.*"

## *Vicarious enjoyment*

Participants expressed enjoyment of sharing public green and recreational spaces with other users, even if they weren't directly interacting with one another. This interaction, referred to here as vicarious enjoyment, allows for feelings of community and familiarity to grow through mere proximity, as people enjoy other uses of the space.

One participant who lives near Ballard Commons Park recalled early memories of the park. "*Back in the day, when it was first built, I could hear the skateboarders coming down the street on their way to the skate park and I just thought it was the most charming sound like, oh look, they're going to have fun.*"

Of Gemenskap Park, one resident noted, "*The first time it snowed, we had a snow storm, I couldn't stop watching the kids having fun. Everybody came out. It truly is a gathering place and I can't say it enough, it has improved the quality of a life.*"

## *Community identity*

Groups often develop collective identities based on culture, beliefs, or characteristics. On the neighborhood level, community identities might center around shared values, significant events, and meaningful locations. Community identity can blend with personal identity, as seen through several interviews with Ballard residents.

> One participant said, "*I just see myself as a Ballard person at this point, you know?*"
>
> Of the importance of Gemenskap Park, a participant said, "*That park and really just being able to access it has definitely helped me really enjoy and fall in love with Ballard even more, for the community aspect of it and it just makes it feel like home.*"

On a variety of scales, the symbolic attachment to social bonds, or social attachment, can add layers of meaning and emotional depth to physical locations and help form community identity (Woldoff 2002). Many Ballard residents spoke of the importance of public green and recreational spaces as venues for meeting new people and spending time with friends and family.

> One participant describes a location's meaning by saying, "*The dock that I spent social time on during deep Covid will always have a special place in my heart. That's true. I would meet friends there. I don't think I ever went down there on my own.*"
>
> When asked about their emotional attachment to public green and recreational spaces in Ballard, one participant said, "*I feel one to Golden Gardens because I spent so many nights there with friends, I have a lot of memories associated to it.*"

For some participants, belonging to community organizations that work to improve the access, health, and maintenance of public spaces is important to their attachment to both their community and these meaningful spaces.

> When speaking about Golden Gardens Park, one participant noted, "*I really like the community aspect of like everybody gets together and does the cleanups. And they really hold value to that area as well.*"
>
> Another participant spoke of their work experience as a significant component of their attachment to the area. "*I was advocating for the protection and restoration of Puget Sound for many years…I don't know if ownership is the right word, the sense of responsibility.*"

Place identity, how people relate to the environment and define aspects of themselves connected to it, can be developed at both the individual and collective scale (Manzo and Devine-Wright 2021). Shared public spaces can serve as important anchors for community identity, as they are where people gather, interact, and share experiences.

> One Ballard resident noted the importance of public space to identity by saying, "*People have to have public spaces to congregate in and I think that's tied into your feeling of community…even if it's just a sidewalk in front of your building, public space gives you an identity of who you are as a part of where you are.*"

Cultural and societal norms, as well as laws and regulations, impact how people use and interact with public space. In Europe, where some large cities are denser than Seattle and a greater proportion of residents live in multi-unit buildings without private outdoor space, public spaces are used differently. These uses have the potential to impact how community identity forms.

> One participant noted these cultural differences, stating that Europeans "*make their own outdoor public spaces in whatever space they have available…people might be just living on a regular city block in an apartment building but they'll turn the sidewalk into their own outdoor space and they'll have meals out there and get togethers and everything. Americans are more restrained in that way…I'm just sitting here imagining people in my building going out onto the sidewalk and taking over a sidewalk as a public community space. I don't think it would happen.*"

## *Whimsy*

Outside of their role as physical gathering places, public green and recreational spaces allow for informal community adaptations and interaction. Often existing outside of formally designated public spaces like parks and trails, adaptations appear in planting strips, front yards, and roadway medians. These adaptations are created informally by individuals or community groups and are often rooted in sharing with others, displaying art, or telling stories.

Adaptations of the built environment by and for a community have an air of authenticity that state-sponsored projects often lack. Community members may feel more inspired to interact with these local, informal adaptations because they represent a connection to neighbors and community members. Deep social and place attachments can develop through these interactions.

> One participant said, "*I used to go on long walks and something that blew my mind was the amount of, I want to say community engagement, but as measured by little free libraries. Because in Ballard I have three within a block of me, and some of them are really charming and delightful. And even just walking through Wallingford, maybe I didn't pick the right streets, but it's like there's less of that whimsical neighborhood engagement. It feels to me like…people in Ballard are really engaged with their neighborhood.*"

These whimsical features offer an opportunity for indirect and informal interaction with others. An action as simple as leaving a book in a little free library can be a form of communication, as a passerby takes that book and leave another, an interpretive back-and-forth. This process of discovering features, developing familiarity, and noticing changes allows for a deeper relationship with the neighborhood and community, as if you're passing notes with a friend.

Preferences for built environment features like community adaptations may affect which routes community members take to navigate their neighborhood; people may also choose routes that feel more familiar, safe, or enjoyable. Focused primarily on choices relating to safety and survival, Mindy Thompson Fullilove calls our preferred routes through our daily lives "mazeways" (2016).

Figure 16. Little free library.

One participant alters their mazeway to purposefully coincide with Gemenskap Park, saying, "*I usually walk alone and I prefer this route for its serenity and book boxes along the way. Given Covid's forced separation the greenbelt offers me a type of connection to my neighbors and nature that I find comforting. The book boxes on the path for example offer us insight into each other's shared interests.*"

Mentioning a specific community adaptation along their mazeway, one participant said, "*I don't know what house it is, but someone has The Iron Giant from that movie…there's always rocks in his hand so the kids come by and switch out little objects in his hand…there's a personality there that creates some kind of familiarity.*"

Another participant expressed appreciation for informal adaptations in the Phinney Ridge P-Patch, saying, "*I don't even have a garden, but I kind of feel like it's my garden and people put really funny little things in the garden, like somebody hung string puppets there and they'll put these little miniature dollhouse furniture…I love going up and down and it's like, 'oh look, they've got a new string puppet'.*"

Informal community adaptations are not always static and sometimes appear as a temporary physical occupation and activation of space. The lines between public and private space blur in these moments, as private interventions become amenities for the public.

> When asked about meaningful public spaces in Ballard, one participant said, "*You know what became really special during dark, dark deep Covid…right across from Macleod's and Lock & Keel there's a space, I think it's Brambling Cross. And they had built this outdoor seating area…but they couldn't use it because everything was closed and it became this space. The Lock & Keel was selling drinks and people would come out with their guitars and serenade and hang out in this space during deep Covid and it was like this magic. Somebody upstairs from Macleod's was blowing bubbles out the top window. It was magical for a little while there, to the point where when things opened up, I was almost a little disappointed because that had become this sort of community gathering front porch for people who lived in that part of the neighborhood.*"

Whimsical, informal, and spontaneous adaptations and reclamations of public space can reflect a community's creativity and identity, communicate secret knowledge between neighbors, allow people to find personal identity in their surroundings, and offer the opportunity for people to connect without physically being together.

## Encounter emotion

Meaningful personal attachments to public green and recreational spaces can be built through experiencing significant milestones or emotional moments in these places. These places are witnesses to our lives in good times and in bad, places to celebrate accomplishments, gather at significant turning points, and spend time alone to process emotions. As if sharing important moments with friends, we can create relationships of trust and attachment to public spaces.

### *Milestones*

Places are often associated with specific periods of our lives. These memories root us in time, give depth to relationships with place, and instill meaning. As a friend is there to celebrate or support us during important moments, public green and recreational spaces experience the milestones in our lives with us. These public open spaces may be especially important to people without access to private outdoor space, as they serve as primary venues to gather.

> One participant mentioned significant events in public space, saying, "*I mean that little Couch Park, that's the signifier of, 'Oh, that was my first apartment'...I took my mom for Mother's Day at Sunset Hill Park, or my 21st birthday at Sunset Hill Park. There's all of these milestones or special things have happened there.*"

Figure 17. Sunset Hill Park.

Another recalled memorable events on the Burke-Gilman Trail. "*Favorite memory of the Burke is the time I walked it end to end in the rain. Or the time I ran it end to end as a marathon training run. Or the time I finished a century bike ride along the trail to Golden Gardens.*"

Neighborhood attachment can also be deeply associated with personal milestones. The place is more than a landscape on which these events take place; it may represent a part of our evolution and who we have become in the place.

One participant said, "*I do have an emotional attachment here...less of the green spaces but Ballard in particular, so many anchor points or reference points of my life happened here. Between getting engaged, getting married, having our son, this is always going to be one of our homes.*"

## *Emotional processing*

As detailed in the Literature Review, restoration and stress relief are two of the many health benefits of natural spaces. Several participants mentioned meaningful public green and recreational spaces where they spent time alone, processing thoughts and emotions. Just as we rely on friends for supporters during difficult times, public spaces can become trusted confidants, providing venues where we feel safe and heard through emotional processing. Rather than turning to a person for help, one might revisit a meaningful place for support.

Of Golden Gardens Park one participant said, "*It's very peaceful to me, personally. Very calming. I like to go there and journal and just process thoughts.*"

Another participant spoke about how the meaning of the Ballard Locks has changed over time to them. "*I remember like a few times in my life where I was going through a breakup or I was going through an emotionally challenging thing and spending time at the Locks and just sitting there. Now maybe I would just process that differently.*"

Figure 18. Golden Gardens Park.

Just as place attachment is not inherently positive, attachments to public green and recreational spaces can represent a range of complex emotions. Places may be mentally associated with particular periods of time, events, or interactions. These contexts may affect our associations to place, resulting in complex feelings of attachment to these places.

> One participant recalled, "*Golden Gardens is where I burned my wedding memorabilia after my divorce. It's also where I've mourned a death, and walked when I was depressed. It's a deeply contemplative place for me.*"
>
> Another participant related places with mental health, stating, "*I've taken anxiety walks to this park, so I actually have more of a negative emotional connection…I feel an emotional connection to the canal and Gas Works because that feels more like an individual connection, those walks I did for myself to make myself feel better.*"

## *Seclusion*

Places that feel secret, secluded, and undiscovered are an important part of the network of public spaces. Spending time alone in a public space can be like spending time with a friend you feel very comfortable with; you can sit in silence without feeling uneasy, recharge your batteries, and observe what is around you.

Of discovering new public open spaces, one participant said, "*It is like a little secret. It does feel personal, even though you share all these spaces with a bunch of other people and everybody kind of knows about them too. But I feel like everybody has their own experiences there.*"

Figure 19. Sunset at Golden Gardens Park.

There is magic in secret urban places that become increasingly difficult to find as cities grow. As Ballard becomes more dense, a growing number of multi-unit dwellers will rely on public green and recreational spaces to recreate and relax. Broader discovery of secret places has the potential to change the meaning of these places for those who hold emotional attachments to them.

A long-time Ballard resident said, "*There is the Secret Beach which I also don't go to anymore, in part because I feel like everybody's discovered it. Back in the day that was a nice little spot to feel like you knew a secret. Yeah, that one doesn't tug at my heartstrings anymore...I guess what makes it special was that it was secret. And now that it's kind of not, it doesn't have quite the same meaning to me.*"

## Explore

Public green and recreational spaces allow for a sense of exploration and wonder to persist in the built environment. Elements of discovery can be found at all scales, from large destination parks to pocket parks, providing an opportunity for an evolving relationship between people and places as we learn about and get to know our surroundings as they grow and change. Through these experiences memories are made, and new areas of our mental map are activated.

Dynamic spaces that allow for a multiplicity of uses and a diverse array of users have potential for broad place meaning; the physical form of a space and the uses offered there set parameters of what the place might mean to users (Stedman 2003). The more activities a space welcomes and the more users who spend time there, the broader the opportunities are for development of attachment. A place that offers a mix of uses welcomes different demographic groups simultaneously, serving as a venue for people to gather and experience people different from themselves.

Functional attachment, also called place dependence, occurs when attachment is based on what the space allows the user to do and gain (Manzo and Devine-Wright 2021). This attachment can develop through frequent use of public green and recreational spaces, as these are often venues for recreational activities like biking, kayaking, walking, and rolling. This attachment may be less emotionally-driven, instead focused on the ability to recreate through access to these places.

### *Discovery*

When asked about meaningful public green and recreational spaces, many participants recalled the first public spaces they remember visiting in Ballard. These visits are often tinged with a sense of wonder and excitement at discovering a new place. This sense of discovery can make lasting impressions, as people remember the first time they visited a place even after they've made dozens of more recent visits.

> One participant recalled visits to Sunset Hill Park, saying, "*I would go up there so much when I was brand new, and so there was just the sense of exploration and wow, I found this gem that's in the neighborhood that has this beautiful view over the water.*"
>
> Another participant described her earliest experiences in the city, saying "*I did meet-ups when I first moved out to Seattle, and my first meet-up was at Golden Gardens. So I've always felt a little connection with the area itself.*"

This sense of discovery and exploration can wane over time. This may cause place attachment to shift from away from emotional attachment and towards functional attachment, increasingly focused on the practicality of fulfilling one's needs.

> One participant said, "*The exploration of Seattle is kind of gone for me, which kind of sucks. Everything just seems so familiar...now they're usually just a means to an end I guess. Like if I want to fly my kite I'll go to Gas Works park because I know it has a nice hill and it's close by, but I always have a purpose when I go to parks now. I haven't gone to a park to just check it out.*"

## *Dynamism*

People are dynamic, so places should be also. Public spaces must accommodate a wide variety of desired uses and needs; one park user wants a quiet place to rest, another has a desire to exercise outdoors, and a couple wants to take their toddler to play. Creating dynamic, welcoming spaces that can adapt to users' needs and encourage coexistence between different uses is key to a functioning open space network.

> One participant enjoys bringing their child to Golden Gardens, saying, "*There's 7 million things to watch. They have a playground...and you can go to the little stand and get a popsicle, and her day is made...You know, obviously a lot of Seattle shares that because it can be crowded on really nice weather days, but it's still really nice.*"

Another participant spoke about the variety of users who spend time at Gemenskap Park. "*Every night at 8 o'clock everybody goes out there with their dogs to play, especially in the summer. What I've noticed this year is more people are out there at night than used to be, and its neighbors. And then the high school kids use it too…they'll come down and sit there and eat their lunches…You see people from the local businesses coming to eat their lunch there.*"

One participant mentioned the dynamism of the Locks, both functional and recreational. "*I like the fact that if I want to just walk down to the Locks and, you know, watch the boats and fish and people.*"

Open spaces without defined uses contain endless possibilities for recreation and place meaning. Vast open space is scarce in urban areas, and Ballard is no exception.

One participant expressed a desire for green open space, noting, "*I think about other cities where they have these very expansive grassy parks where everyone can just have picnics or do freakin frisbee or something. I think we actually are kind of lacking that. I think the closest thing might be like the botanical gardens by the Locks but I don't see very many people really using it that way.*"

## *Play*

Availability of safe places for children to play is a priority for many families, particularly those living in multi-unit buildings without access to private outdoor space. Presence, or lack thereof, of safe public places to play can influence housing decisions for young families living in dense areas.

One participant said, "*Having real playgrounds would be something that would lead us to stay here more. Definitely see that as a huge gap.*"

Another participant had a different perspective, saying, "*You don't need a playground. The kids will find a way to play.*"

Figure 20. Salmon Bay Park playground.

Ballard Commons Park is the closest public green space for many people living in the most dense areas in Ballard. When the park was built in 2005 it served as a play area and hosted community events like movies in the park. Access to Ballard Commons Park has been fragmented since the beginning of the Covid-19 pandemic, a controversial topic in the neighborhood. The park offers infrastructure that many other public spaces do not, including public restrooms and drinking fountains. These resources made the park a relatively hospitable place for unhoused neighbors, and an encampment formed as the pandemic progressed. After an increasingly contentious struggle over access to the space, Ballard Commons Park was swept of people residing in the park in December of 2021 and has since been fenced off. According to the City of Seattle's website, the park is closed for rehabilitation for six to twelve months, as of December 2021.

While participants presented diverse views on the encampment and subsequent sweep in Ballard Commons Park, a sense of frustration over current lack of access to the park was a common theme. Many participants expressed a desire for Ballard Commons Park to become a place for children to play, especially as many families who live within walking distance to the park lack private outdoor space.

One participant said, "*If they can make the Ballard Commons back into a family spot, I would be thrilled. Absolutely thrilled.*"

Another participant referenced plans for a new playground in the park, saying, "*It'd be really cool to go to Ballard Commons, I'll be real happy when they put in a playground…I have grandkids and I could take them right over there to the park.*"


Figure 21. Ballard Commons Park.

The ability to play in public space is an important experience for both adults and children. Benefits to physical and mental health and opportunities for creativity and relaxation abound. Welcoming a variety of park users includes inviting adults to play in public space.

One participant said, "*If I could snap my fingers, I would love to have a bigger playset near my house…I like being able to go on the swing. Child at heart, I guess.*"

Another participant said, "*I would love a circuit exercise course nearby. This is something I used to enjoy in Phoenix, but haven't seen here.*"

Another participant talked about flying a kite, saying, "*It was an octopus with eight rainbow colored tentacles…You can just lie down and your kite just tugs on your arm a little bit in the wind. It's very soothing, very therapeutic.*"

## Establish time-depth

Much of the early place attachment literature positively correlates place attachment with time or length of residency; the longer someone lived somewhere, the more attached they are expected to be. More recent literature suggests this may not be the case; people who have recently moved or are just visiting can develop deep attachments to place (Kaltenborn and Williams 2002).

Of the Ballard residents who participated in this research, eleven have lived in the neighborhood for two years or less, reflecting the relative transiency of people living in the neighborhood. Combine this with the fact that the built environment in certain parts of Ballard looks drastically different than it did 20 years ago. This context leads to the second research question asked in this report: how can public green and recreational spaces help maintain or restore continuity of place attachment among Ballard's rapidly changing and increasingly dense urban environment?

Time-depth is one answer. Just as we can develop a strong relationship with a friend quickly and feel as if we've known one another for years, it is possible to grow a deep attachment to a place in a short period of time. Seasonality, natural features, recurring visits to a location, and significant events may help establish a feeling of time-depth and subsequently a deeper attachment to place. In this way, public green and recreational spaces may serve as locations of continuity amidst a rapidly changing residential landscape.

### *Belonging*

Place attachment as it relates to neighborhood tenure can bring up questions of legitimacy and belonging, as long-time residents and newcomers coexist while they independently develop personal place meanings and attachments. There is no timeline for attachment to place; it can be affected by personal factors, life events, social relationships, and daily routines.

Public green and recreational spaces offer opportunities to accelerate time-depth and develop meaningful place attachments, which can contribute to a feeling of belonging and legitimacy in a neighborhood. This can occur through social bonds, place dependence, or familiarity with and knowledge of a place.

When asked about their attachment to Ballard, one participant said, "*This is something I've tried to have conversations with people who have lived in Ballard for a long time, like generations and raised kids, and they often use that as leverage to claim that Ballard is more theirs than mine because I've only lived here for a few years...there's this feeling that I'm not particularly tied to the neighborhood.*"

The participant went on to refute this claim, stating that because of their familiarity with  and dependence on the neighborhood, they are attached and do belong there. "*Especially not owning a car, when I was looking for places to live I wanted to find a neighborhood that I can consider myself to be at home in, as opposed to having to get in a car and drive to where things are. So I spend almost every hour of almost every day in this neighborhood and not just in my house.*"

## *Seasonality*

Experiencing seasonal changes and cycles of regrowth can help establish time-depth and create a rootedness that connects to the natural environment. As the next section will discuss further, city dwellers are often disconnected from the natural world because of the built environment. Opportunities to experience seasonality aid in the development of time-depth, creation of memories, and emotional attachment to place.

Figure 22. Cherry blossoms.

When asked about meaningful public spaces, one participant mentioned the Ballard Locks, saying, "*It's one of the places I like to go and see the seasons change because there's enough trees there where you can sort of mark the time changing.*"

Of Sunset Hill Park one participant said, "*When we get snow days I'll walk up there and get the view from there too, with the wind blowing and the snow falling on the evergreens. I've seen that park in all stages of the year, so I have that bond with it. I went up there Christmas in 2020, when that was the first year ever I didn't go home for the holidays. It has a significance to me a little bit.*"

## Nature

While many of Ballard's buildings are unrecognizable from decades past, some public natural spaces have remained relatively unchanged, allowing vegetation to grow. This vegetation, particularly mature trees, helps reduce the urban heat island effect and improve air quality, along with other significant health impacts (Nowak and Heisler 2010; Shishegar 2014). As one participant noted, mature trees can also add to a feeling of time-depth within the neighborhood.

One participant said, "*I love the oak trees. To me, they just look so old, and it makes me feel like there's a time depth there. I don't really like new developments, like when I go down to Target and I think they did take out some trees and they've got new trees, new landscaping, they're just like little sticks...I just feel like our trees are great. And it just feels like you can see how long Ballard has been there.*"

However, tree canopy coverage isn't enjoyed equally throughout the city, or even in Ballard. Historical discrimination continues to leave a mark through a lack of canopy coverage.

One participant said, "*This neighborhood was clear cut at the turn of the century to build shingle mills and it was never re-treed, so our tree canopy is actually as bad as it is on the south end. Not as bad as the industrial district, but we have really low tree canopy, and so it feels very exposed and kind of naked.*"

> Another noted the disparity in canopy coverage. "*The north parts of Seattle just have so much better tree coverage than parts of South Seattle and I feel really lucky to live in the neighborhood and definitely feel like the privilege of living in Ballard.*"

Like we notice that a friend has gotten a haircut, we are aware of changes in familiar places, particularly places along our mazeway that we visit frequently (Fullilove 2016). Acknowledgement of small changes, like the bloom of a new flower, can deepen a relationship with place.

> One participant said, "*At Sunset Hill, there's this one tree and it's my boyfriend and I's favorite tree and we can see it from the rooftop of our apartment and it's just a weird little wonky tree. So many like memories of my time in Ballard have been at these places, so definitely I feel like there's an emotional connection. I like being able to go and see like, oh, something's changed or some things are exactly the same. If that tree ever goes away I'm gonna be so sad.*"

During the pandemic-related lockdowns, many people remained at home for long periods of time, spending more time in their neighborhoods than ever before. This allowed people to notice more about their surroundings, see changes over time, and deepen their attachment to place.

> One participant noted, "*I think it's probably just a result of where I was in 2020 in terms of just on lockdown, at home; walks were my one good thing for months that year. And I think that's what made me just a little bit more observant of a lot of things. Because I made it such a part of my routine, I could notice, 'oh, it's spring, the tulips are coming out of this tree but two weeks ago they weren't there.' If I go through a little patch where I just don't go on a walk for a few weeks or a month, I'll come back to it and be like, oh, man, I missed this whole, bloom of daisies or something...I think that kind of solidified I guess the attachment to just normal trees along my walking route.*"

## Experience nature

One of the primary benefits of public green and recreational spaces is their ability to connect city dwellers to the natural environment, and to remind us of the history of the land on which we live and the Indigenous peoples who have lived here since time immemorial. Some of these places offer the opportunity to be surrounded by lush vegetation, others allow access to water, and others provide vantage points to see breathtaking views. These areas can serve as a respite from the built environment, allowing us to deviate from the urban grid and move freely.

Access to nature is desired at a variety of scales. Biophilic design can help incorporate greenery into urban environments, while distant natural spaces offer additional breathing room and opportunities for recreation. Attachments to these natural features can develop for their beauty alone, for the activities they allow us to experience, and for the closeness to the land itself.

### *Connection to the land*

It's not uncommon for city dwellers to go an entire day without stepping on natural ground. From the front door, to the sidewalk, to the bus, to the University of Washington's winding paved paths and back again, I rarely am immersed in nature during my daily routine. Unless sought out, it can be difficult to find nature within the built environment.

> One participant thoughtfully noted, "*I feel like cities inherently distance us from the land, and so I think it's that I more feel the distance from the land itself than I'm able to feel the land itself, but that's kind of our fault, not the land's fault.*"

Urban environments can be anything from concrete canyons to green oases. The entire range can be seen in the city of Seattle.

> One participant observed, "*I wanted to live in a place where outdoors and the city merged a little bit more than they do in most American cities and metropolis has still won in Seattle and it's still a large city that is mostly pavement, but there's a lot more carve-outs for nature and beautiful things in Seattle than in other places.*"

While there are many barriers to accessing public green and recreational spaces, as detailed in Appendix B, connections to wild and natural spaces exist in Ballard. These areas often bring us a step closer to the natural environment, to ecological cycles that city dwellers rarely get to observe.

> One participant mentioned going to Piper's Creek in Carkeek Park every autumn, saying, "*Even if you get out into deep wilderness it's really hard to find a native salmon run that's actually functioning, and to be able to just go to one in the middle of the city is really special.*"
>
> Another participant discussed community gardens, saying, "*That little garden patch I was talking about, I love that representation of what it looks like to actually grow things, because we all buy these things at the grocery store, and so to be a little closer to it and have that, connects you back to the root thing that we're all trying to get at, which is to eat good food that comes from the earth.*"

Due to Ballard's hilly topography and coastal location, several public spaces offer views of the surrounding landscape, particularly to the west towards the Olympic Mountains. Views like these encourage people to stop for a moment and appreciate the landscape's natural beauty.

Figure 23. Olympic Mountains.

> One participant described the significance of having access to views of the Olympics and of Puget Sound. "*Something that I almost crave is to be able to experience that type of view…I'm still in a city environment, so it's not like it's pristine hiking with old growth trees or anything, but it's the fact that I'm able to see and experience that feeling of the outdoors… It helps in terms of surviving the gray, oppressive, cloudy days of Seattle.*"

Ballard's natural amenities also include access to the water, a feature that impacts the housing decisions of some residents. For some, water access is crucial to their well-being or way of life.

> One participant said, "*Something was missing in my life and it was proximity to water. And I don't mean just a river, I needed to be near boats, I needed to be near open water…Just the freedom of being out on the water with the wind in your hair and in the sails…up into the Sound, just that joy, that lightness, the weight of the world just disappears and all you're thinking about is what's going on on the boat.*"

> Another participant referred to the restorative benefits of water access at the docks in Ballard. "*There's one at the end of our street, which is 24th, and then there's one behind the Nordic Museum on 28th. And that's usually just if we're out for a quick walk we'll stop there for a few minutes and just let the water calm us.*"

Despite Ballard's coastal location, access to water is rather difficult because much of the Lake Washington Ship Canal in Ballard is used for industrial purposes. The closest water access is either along Seaview Avenue in west Ballard or in Fremont to the east, meaning that many people who live near water as the crow flies can't access this amenity in practice.

> One participant noted the lack of waterfront access in the neighborhood, saying, *"Ballard has a very long waterfront…and unfortunately the Ship Canal is fairly built up, densely built up with commercial activities. So that's the one thing I think that's lacking for Ballard is waterfront open spaces, because it's just cram packed with commercial shipyards and warehouses and so forth.*"

Another participant has a desire to access this space, saying, "*We have Golden Gardens but maybe down where I live along the water, it's all industrial which, maybe they need that space, but I always wish I could just take my dogs to the water real quick, but I don't know where to go.*"

## *Respite from the built environment*

Public green and recreational spaces offer an opportunity to take a breath of fresh air away from the hustle and bustle of urban areas, to find peace within the city. The restorative benefits of natural areas have been cited as being positive for self-regulation and emotional well-being (Korpela 1989; Kaplan 1995; Korpela and Hartig 1996). Particularly for city dwellers who lack private outdoor space, public spaces that offer respite from the built environment are important.

One participant highlighted the importance of natural spaces, saying, "*If I'm going to be in a city, these touchstones are so important to kind of be rejuvenating just by being in them. Like they're these places where we stop being so defined as humans who are doing a specific thing and instead you're just surrounded by life that's just creating all the time and I think that's why I go to these places and I would not be able to be in Seattle, if not for them.*"

Another participant said, "*My close greenbelt definitely is a large component of my attachment to Ballard. It serves to restrict traffic through the area and connects me to nature and the softer side of life. It is like exercise for the soul, my daily retreat away from technology and connecting me to what I find most important - peace.*"

Ballard's larger destination parks that draw more users, both from the neighborhood and outside of it, received the most praise from participants for their restorative qualities.

One participant said, "*Shilshole is really just a beautiful place to walk because again, you have this open air feeling and you see something beyond just buildings. I feel one thing that's happened with Ballard is it's gotten to be Canyonlands in terms of buildings, and it's nice to have more open space.*"

When speaking about Golden Gardens, a participant said, "*If I want to get away from that city feel again and just admire nature, I like to go there and it just feels really peaceful.*"

One participant mentioned the Locks, saying, "*It always feels like just an extra point removed from city life, like it feels like you kind of enter the botanic garden and you're in a different place.*"

Figure 24. The Ballard Locks.

There are challenges in finding respite in natural spaces in Ballard. To be detailed more fully in Appendix B, public spaces that are overcrowded or poorly maintained fall short of providing significant well-being benefits for users. There is a disparity between different parts of the neighborhood in enjoyment of vegetation within the residential landscape.

One participant spoke of these shortcomings in a relatively dense neighborhood like Ballard. "*Golden Gardens is great, it's a great park, and I don't go there because already there are too many people there. So some of the getting out into nature is wanting to get away from people…and I'm not sure how we would do it.*"

> Another participant expressed a desire for a more natural setting, saying, "*I want to look out of my window at trees. We want to hear songbirds, that's really important to us. You don't hear any bird life up here. It's all just crows.*"

Biophilic design, incorporating natural elements into the built environment, is one strategy to incorporate vegetation into areas, like Ballard, that are already substantially developed. Besides providing a swath of benefits to environmental and physical health, greening urban areas can bring city dwellers in closer contact with natural cycles, even within the built environment itself.

> One participant said, "*My place attachment tends to be keyed to biophilic design, which is beauty…I always feel better when I'm in biophilicly rich places.*"

> The same participant said, "*In terms of Ballard, so much would have to change and a greater emphasis on biophilic design…We need to incorporate place making and beauty into our norms and laws and policies. We don't even use that language.*"

Private open space, like front yards with trees and gardens, can be considered a public amenity even though they don't add to the square footage of space available to the public. On an environmental level, private green space benefits many species and the health of the environment. These spaces can also benefit human health; when walking past a large tree in someone's private yard, we enjoy its shade and find respite from heat. These spaces are also visually appealing, as the public can appreciate the beauty and creativity of private open spaces.

> One participant recalled a 2014 study by Groundswell NW, saying, "*There needs to be other ways to create green space in the neighborhood. So what are the opportunities for traffic circles, what are the opportunities for…shutting down the street, making it more of a recreation boulevard…So are there other ways to achieve public space without having to make it a designated park? Are there incentives that people who have yards and parking strips can use to enhance their greenspace, make pollinator pathways, that kind of stuff…We need to recognize that the city doesn't have money to purchase land anymore, especially not in a neighborhood like Ballard, but we still have a lack of public green space.*"

## *Deviation from the grid*

If I charted my walking route through my neighborhood, it would look mostly like a gridded map, full of right-angle turns to navigate the street grid. There would be deviations, however, when I pass through a park or walk along a trail; these are some of the few areas where my path would create loops and curves, meandering spontaneously. Public green and recreational spaces offer opportunities to deviate from the grid and experience more freedom of movement.

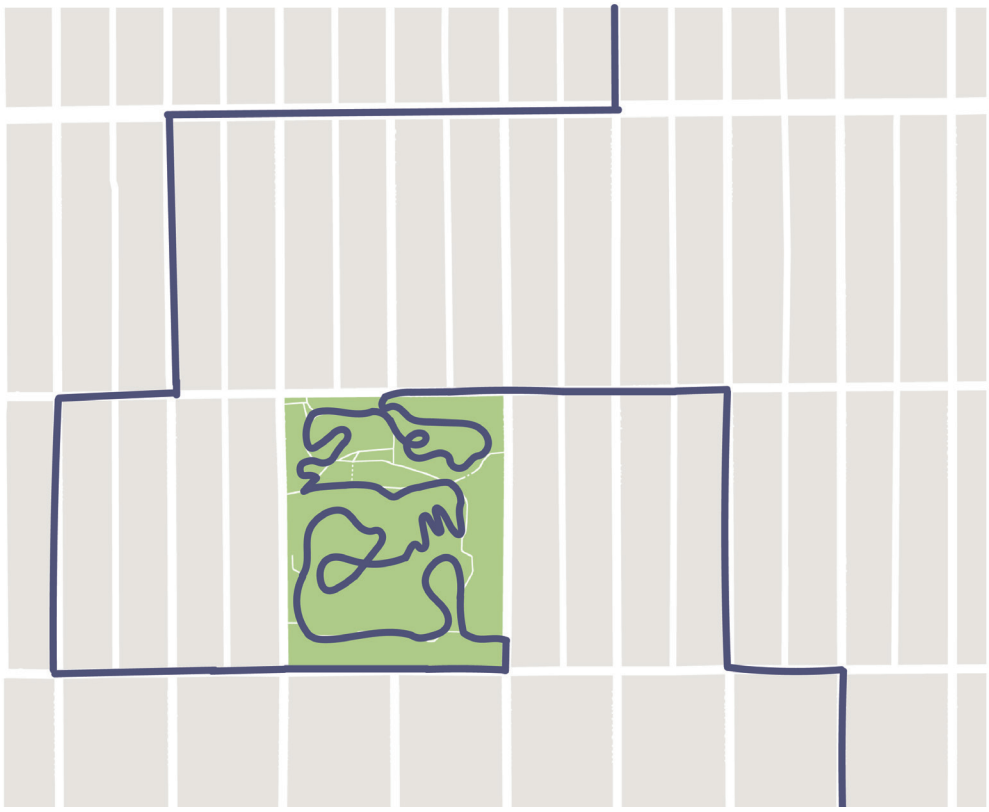


Figure 25. Visualization of deviation from the grid at Salmon Bay Park.

One participant said, "*There's a lot to be said for small pocket parks and how they enhance the community of denser neighborhoods…it breaks up the monotony of dense residential areas…as you're walking in the defined public space on a sidewalk, all of a sudden you come to a little pocket park like the Couch Park, 'Oh, this is someplace that I can deviate, get off of the sidewalk and go into another public space'…It gives you freedom of experiencing open spaces of different types and formats and uses without being confined to the narrow public streets and sidewalks.*"

Figure 26. Salmon Bay Park.

> Another participant said, "*I love Salmon Bay Park…I grew up in suburbia. So it makes it feel more like a suburban park because it's sort of hilly and has those trails that wind around. It's not divided into grids. It feels more natural.*"

Natural spaces outside of cities offer further opportunities to deviate from the urban grid. The natural features surrounding the Puget Sound region allow for immersion in nature, and receipt restorative health and well-being benefits. Whether these places are accessible, however, impacts to what extent people can enjoy and develop attachments to these natural environments.

> One participant noted how Ballard's location impacts access to distant natural spaces. "*We've noticed what we call the 'Ballard tax' where it takes you like 20 minutes more to get to I-5 and to get out to the trails.*"

> Another participant observed a conflict between access to natural spaces and availability of parking in the city. "*While they may not need a car on an everyday basis, there's a lot of people who moved to the northwest because they want to go hiking or skiing or climbing or boating or whatever, and they need a car to get to that point or to carry their kayak. It's ridiculous that they think none of these people are going to need a car and I'm sure there are a lot of people who are like, Yeah, I don't need a car. I can get by without it or I can use a Zipcar, but there's limitations.*"

## Learn local history

Just as a friend's background is critical to their identity, learning about a location's history is important in knowing the place. Knowledge of who and what used to be there, how it got there, and how it changed is important context to public places. As a neighborhood, Ballard already has a strong history and community identity; unique public spaces provide an opportunity to deepen this knowledge of history even more and create a stronger community.

### *Indigenous history*

For countless generations, the Duwamish Peoples lived in the area that eventually became Ballard. The landscape we see today in Ballard, and in the city of Seattle more broadly, is virtually unrecognizable from the landscape in which Indigenous people lived little more than a century ago. The original stewards of this land are often overlooked in conversations of Ballard's history, as white settlers dominate historical narratives. It is critical that Indigenous perspectives and histories are genuinely amplified and consulted in planning processes, as much of the change taking place today is yet another installment of occupation on stolen land.

> One participant reflected, *"A lot of these places do have a sense of history...but I've also been thinking more about the Indigenous people, and obviously none of this was what they wanted or expected. I'm part of the Ballard Facebook page, and I've seen communications where people go 'Ballard's not what it used to be like,' and someone pointed out to someone that this person was maybe born in 1960. But the number of years between 1960 and now is more than when Sam and Charlie, the last Indigenous people, lived in a shack on Shilshole Bay and when that person was born. And so people talk about 'oh, things have changed so much.' They changed a lot more between when it was almost all Indigenous to 1960. It's good to keep some perspective."*

Place identity, distinct from place attachment, is focused on how a person relates to an environment and identifies with certain aspects of the environment. One participant observed

that throughout their career working across the country, Indigenous peoples had a particularly strong place identity, as if they were attached by *"an umbilical cord to the land."*

## *Nordic heritage*

One of Ballard's most well-known features is the neighborhood's history of Nordic settlement that continues to influence the neighborhood. From the National Nordic Museum to Scandinavian-inspired artwork, from the annual Syttende Mai celebration to Nordic-inspired restaurants and shops, Nordic heritage resonates in the neighborhood today.

Ballard's Nordic heritage has lasting impacts on the neighborhood's identity, and among communities within Ballard. This unique element of the neighborhood bonds people together, even those who do not share cultural backgrounds.

> One participant relates Ballard's history with present-day neighborhood identity. *"Ballard was its own city, and then was incorporated into the city of Seattle in 1908 or something like that. So there's always been this little rebellious thread in Ballard, like, 'we got taken over by Seattle,' which is ridiculous because it was more than 100 years ago, but it's still kind of quirky and fun."*
>
> Another participant said, *"Ballard has retained its own identity and there's still a very strong Scandinavian community here and the Swedish center is just down the street from us and so there's some very close knit ties for a lot of people in Ballard to the history of Ballard and it's been fun learning about that history and sort of realizing the origins of the community and the people here."*

While development and gentrification have transformed many parts of Ballard, elements of the neighborhood's authentic Nordic heritage still exist, presenting opportunities to develop deep knowledge of and attachment to place.


Figure 27. Syttende Mai parade.

One participant said, "*I don't have any Nordic ancestry but I really appreciate that Ballard still has that connection to it, and I talked to a lot of people who complain that it's getting homogenized out of existence with all the new development, and it's true, you can't just snap a Scandinavian place name onto an identical looking apartment or townhome complex and say, well, this is authentic Ballard now. But we still have, with the exception of the last couple years, things like the Norwegian Constitution Day Parade and street festivals and institutions that celebrate a history to that kind of heritage, which I think is really neat.*"

Another participant recalls fond memories of Syttende Mai, the annual Norwegian Constitution Day celebration. "*All the little old Norwegian ladies come out in their traditional outfits, and motorcycle guys come and kick off the parade with their little motorcycle choreography, and kids from elementary schools come out and parade down the street. It's such a local fun thing to have to really mark the neighborhood and it's something that I look forward to and really appreciate, and it's those types of things that have helped me create a sense of attachment to the neighborhood.*"

## *Maritime industry*

Because of the neighborhood's coastal location, bordered by the Lake Washington Ship Canal to the south and Shilshole Bay to the west, one of Ballard's primary industries in the 20th century was fishing. Other industries like lumber mills and, more recently, construction materials, have had a historical presence in the neighborhood, specifically along the south waterfront facing the Ship Canal. Ballard's industrial businesses are important to the neighborhood's history and help shape neighborhood identity.

> One participant described how the maritime industry impacts the neighborhood today. "*Ballard, it was the Scandinavian community, it was the fishermen community, it was working class. And so there's a little bit of grit to it, there's the industrial area, there's this history of the ties to Puget Sound and the fishing community. All of that, I think, has led to a really rich history about the neighborhood and sort of flavor.*"

> Another participant said of current members of the maritime industry, "*When the fishing season is over, they come back to their homes in Ballard, so that tradition from the very beginning of the community is still here and it's still very strong.*"

Several of the public green and recreational spaces in Ballard serve dual purposes, both as a place for the public to recreate and as functional infrastructure. The Ballard Locks accommodates diverse uses, as a transportation route for water vessels, a safe passage for salmon, and a natural retreat for members of the public. Public spaces like the Ballard Locks can aid in development of place attachment because of their unique features and ties to the neighborhood's history.

> One participant spoke to the uniqueness of the Ballard Locks' recreational uses, saying, "*I have a brother who lives in the Boston area and there's a lock near him and I said 'oh, did you ever go to visit that?' And he said, 'how would I ever do that?' I looked at it, it's like a piece of industrial infrastructure in Boston, there's no decorative English garden around it. It's just something that's purely functional, so it's really special what we have here.*"

> Another participant said of the Ballard Locks, "*I think it's a very special place that Ballard has, because it has all this significance in terms of marine activity with all the boats and also the wildlife there. There's a huge great blue heron colony up there in the trees, and then just, it's of interest to other people, the engineering of it.*"

As mentioned in the previous section, public access to the waterfront is relatively limited in Ballard due to the industrial uses along the Ship Canal. There is a conflicting desire among some Ballard multi-unit residents to gain public access to the waterfront along the Ship Canal, yet preserve the functionality of industrial areas and the neighborhood's maritime character.

> One participant said, "*I enjoy the fact that there's very intense commercial activity along the Ship Canal. I think that's a very important element of Ballard, you know, it's very historical. That's why Ballard was Ballard in the first place, because the Scandinavian fishermen had a place to get their boats in, you know, safe harbor away from the dangers of Puget Sound…and, you know, develop a community where they lived and worked. So I wouldn't want to destroy that…but it would be nice to have a few places where you could get to the water, you know, in a public access way, you know, through the commercial area without disturbing or destroying the commercial activity of the Ship Canal.*"

Perhaps stronger than the desire for public waterfront access is the push for the Burke-Gilman Trail Missing Link, a 1.4-mile section of trail just east of the Ballard Locks, to be connected. This is one of the most hotly debated issues in Ballard, as industrial businesses and bike and pedestrian advocates struggle to compromise, balancing a desire for business to go on as usual against a desire for safer non-motorized pathways through southern Ballard.

> *One participant said of the Missing Link, "That's a hard space, because I like the maritime businesses that are there. I mean, it was what built Ballard and I like the working waterfront, but there's got to be some way to come to an agreement.*"

The next section looks further into barriers to accessing public green and recreational spaces in Ballard.

## Barriers to access

During the interview process, many participants mentioned various barriers that prevented them from accessing, enjoying, or developing attachments to public green and recreational spaces. Concerns about each topic were nuanced and varied, and each topic could easily be pursued as a separate research project. Because of the intricacies of each issue I cannot address them in depth. However, it is important to acknowledge that these barriers exist. Appendix B includes a detailed exploration of the barriers impacting access to public green and recreational spaces for multi-unit dwellers in Ballard. A brief list of these barriers is provided below.

- Open space quantity and quality
- Pedestrian and bicycle infrastructure
- Transit access to urban public spaces
- Access to distant natural spaces
- Homelessness
- Safety
- Inclusion
- Gentrification
- Housing affordability

# DISCUSSION

# 7. DISCUSSION

Through this research I sought to understand how public green and recreational spaces and their uses contribute to the place attachments of multi-unit dwellers in Ballard, and to what extent these places can maintain or restore continuity of place attachments in rapidly changing urban environments. I found that public green and recreational spaces offer opportunities to develop place attachments through gathering, encountering emotions, exploring, establishing time-depth, experiencing nature, and learning about local history.

Unsurprisingly, I found that attachments to place are unique; no two participants had the same bonds to the same places for the same reasons. While these attachments are as individual as fingerprints, themes emerged to show that public green and recreational spaces are deeply important for the social cohesion, belonging, and overall well-being of multi-unit residents in Ballard. Findings also revealed that public green and recreational spaces, and the connections built through these spaces, can provide continuity and comfort in an evolving community.

The findings of this research confirmed a number of general place attachment principles explored in the literature. Many participants described the social connections that give meaning to public green and recreational spaces, reflecting the prevalence of the topic of place attachment related to social bonds in the literature (Scannell and Gifford 2010). Participants expressed a desire for dynamic, adaptable, interpretive spaces that leave room for broad place meaning that transcend a location's physical characteristics (Stedman 2003). Experiencing nature helps many participants connect to the land itself and offers opportunities for attachments to place to develop (Zhang et al. 2015). Ballard's neighborhood history was instrumental in the attachment of several participants, reflecting sociocultural bonds (Hosseini et al. 2021). Time-depth was also shown to be a significant factor in development and continuity of place attachment, and a way that newer Ballard residents developed deep emotional bonds to place over a relatively short period of time (Twigger-Ross and Uzzell 1996).

The findings demonstrate that public green and recreational spaces must be a primary consideration of urban planners and other stakeholders who care about creating opportunities

to improve the health of communities and the environment. Incorporation of place attachments in planning and design processes can benefit place-based professions; work informed by community values and visions more completely aligns the goals to design and plan for thriving and resilient communities (Manzo and Devine-Wright 2021).

There are countless ways to intentionally incorporate and plan for meaningful public green and recreational spaces in urban environments; this section suggests only a few. Only communities themselves will know which elements of history, culture, nature, and design are appropriate in their neighborhood's context; it is the job of urban planners to help communities bring their vision for the built environment to fruition. This section suggests implications of this research for urban planners, details limitations of this study, and finally proposes topics for future research.

## Planning implications

In typical urban planning processes, place attachment and other similarly abstract yet important topics are rarely considered by decision makers. More tangible and quantifiable factors like cost and time take precedence in most cases. I argue that attachment to place, which can contain deep ties to community, history, and culture, should have a place at the table alongside quantifiable factors. In a rapidly evolving residential and commercial landscape like that of Seattle, attention and consideration must be given to the physical spaces that hold unique meaning to communities.

The findings of this research have many implications for urban planners. A rather obvious one is that more public green and recreational spaces should be created at a variety of scales, both to promote health and well-being and to offer opportunities for development of meaningful place attachments. Another is that access to and within these spaces must be improved so that all community members can enjoy them. Urban greening initiatives and biophilic design strategies should be prioritized in public spaces, particularly in neighborhoods with low tree canopy or limited access to open space. The notion of private greenery and open space as a public good for everyone to visually enjoy should also be adopted. Finally, there should be stronger requirements

and incentives for developers to incorporate landscaping, open space, and biophilic design into new developments of all scales.

The planning implications below go beyond these initial observations to suggest more nuanced ways that urban planners can incorporate place attachment into the planning process. These suggestions, drawn directly from the findings of this research, include shifts in mindset more than policy. The planning implications below are not exhaustive; different strategies may be appropriate in different places, depending on community priorities. And while these suggestions may be helpful, the best way to nurture place attachment within communities is simple: ask the community what they care about.

## *Public engagement*

In some interviews I asked participants which public green and recreational spaces they used the most frequently before asking which of these places they held the greatest attachment to. These two questions elicited very different responses. In telling me about which spaces they used the most participants simply recalled their routines, but when describing their emotional attachments to public spaces participants delved deep into the meanings these places hold, how those meanings formed, and the emotions associated with various significant places. While it's not realistic for urban planners to conduct one-on-one interviews with all community members, lessons from the methodology of this research could apply to broader public engagement processes.

Planners could begin community engagement conversations not by telling a community about itself through maps and demographic data, but by asking the community about its own identity. What physical and historical elements of the built environment does the community value? Why are these places important and what meanings do they hold? What changes are the community most apprehensive about and what opportunities do they hope for?

Asking these questions can help urban planners understand a community's collectively held place attachments and values, and better balance this knowledge with tangible and quantitative

priorities. This deeper understanding can translate into a built environment that better serves the community's needs and desires. Awareness of the history of neighborhoods can also help community members, local organizations, and planners tell stories through public space.

## *Creativity*

Whimsical, informal, and spontaneous adaptations and reclamations of public space can reflect the creativity and identity of a community, and offer the opportunity for people to connect by both physically gathering and through distant communication. Urban planners can help incorporate creativity into the built environment in several ways.

One strategy is to support communities in their adaptations of the built environment. Features like informal art installations or resource sharing are difficult to encourage as an outsider of the community; involvement from local government may make these adaptations seem inauthentic to community members. Community organizations and community members themselves add character and personality to a neighborhood in this way; local governments can only ease the way to doing so. Planners could aid communities by providing funding to local organizations or by reducing regulations to make it easier to create adaptations to public space.

Another way planners could help incorporate creativity into the built environment is by considering the desire for discovery and seclusion in public space. While large destination parks can serve a greater number of users, small pocket parks nestled within neighborhoods provide an opportunity to feel as if a place is secret and undiscovered. These spaces are vital for overall well-being and for the development of deep, personal attachments to place. As neighborhoods like Ballard become increasingly dense and gain more public space users, local governments would do well to understand the importance of and prioritize creating private, secluded, and seemingly secret places where people find solitude in the city. The feeling that there are still new things to discover, even in a place that has been home for decades, is imperative for maintaining vibrancy within communities.

Providing opportunities for free, safe, and creative movement within the urban grid is another way that creativity can be incorporated into the built environment. Deviation from the grid can be incorporated through winding trails, interpretive paths, and elements of exploration in public open spaces. Permanently adopting and expanding programs like Stay Healthy Streets in order to provide safe places for people to walk, ride, roll, and play is another strategy urban planners should consider. Prioritizing development of traditional and natural playgrounds near residentially dense areas will increase the ability of young families to remain in urban areas and welcome users of all ages to public space.

## *Sharing*

Encouraging sharing in public green and recreational space is increasingly important as urban areas become more densely populated and fewer people have access to private open space. Urban planners can help encourage sharing of various types in public space. First, consideration should be given to the Indigenous-led land back movement, as the public green and recreational spaces that city dwellers enjoy today exist on Indigenous lands.

To best serve the needs of the public, open spaces should offer a broad range of activities and welcome a diverse array of uses. Oases within the built environment, these places have the potential to be dynamic venues to explore and play in shared space, where a broad range of place meanings are possible. Urban planners can consider dynamism in public green and recreational spaces by designing and planning for dynamic space that incorporates a broad range of uses desired by communities.

As planners encourage city dwellers to share public space, they should also promote inclusion in these spaces. Safety and inclusion of all users should be prioritized, particularly in groups historically excluded from public space, like Black, Indigenous, and people of color (BIPOC) and disabled community members. Needs of community groups of different cultures should be considered when designing public spaces, as people often use public space differently; some people prefer to visit parks in large groups to gather, others prefer to recreate alone (Derose et al. 2015). Coexistence between housed and unhoused users of public space could be encouraged

through public education and by providing resources to unhoused public space users.

Sharing resources within public space can help create strong social bonds and resilient communities. Urban planners can encourage and contribute to the development and expansion of community gardens, as these spaces encourage overall well-being and social cohesion (Veen et al. 2016). Planners can also support the local sharing economy by providing funding for programs like tool libraries and book libraries, empowering community organizations to facilitate community connections and promote resource sharing.

## *Events*

Public green and recreational spaces, even temporarily, often serve as venues for events that bring people together and help communities tell stories, establish rituals, celebrate milestones, and deepen community identity. The Ballard Farmers Market is one example of an event that is meaningful to the community. Participants in this research discussed their affinity for the social bonds created at this event, particularly between farmers and market-goers, and for the reciprocal gift-giving that occurs in this space.

Urban planners can help promote opportunities for place attachment by either organizing or providing funding for local community organizations to hold events; beginning or continuing traditions can help strengthen community ties, encourage belonging, and accelerate experiential time-depth. Developing inclusive, creative, and seasonal programming for public space alongside local community organizations can promote social bonds and breed familiarity in a short amount of time.

## *Natural cycles*

Urban public green and recreational spaces offer glimpses of nature, connecting city dwellers to the natural environment. In addition to benefiting environmental and physical health, these spaces provide a retreat from the built environment. Investment in these spaces and their ability to promote well-being, creativity, and recreation should be a priority among local planners.

Vegetation and landscaping that is native and seasonal, with visible growth cycles, offer an opportunity to experience the seasons and notice changes in the urban landscape. This seasonality can contribute to a feeling of time-depth and encourages deep personal connections to place. Preserving mature trees, creating wildlife habitats, and encouraging pollinator pathways are other ways to promote time depth, well-being, and environmental health in urban areas.

## Limitations

The data collection and analysis processes had several limitations that I'd like to acknowledge, including impacts of the Covid-19 pandemic and potential sampling bias. Time constraints were also present, so perspectives from several relevant communities were not intentionally included in this research.

### *Covid-19 pandemic*

Interviews for this research took place in January and February of 2022, as the Omicron variant of SARS-CoV-2 was peaking in Washington state. I had planned to conduct all interviews in person, but due to concerns about transmission many interviews took place virtually. It would have been ideal to interview everyone in person in the neighborhood due to the potential for disruptions and limitations of Zoom, but I was able to adapt.

### *Sampling bias*

Because participation in this research was voluntary, people self-selected by volunteering to participate. Self-selection lacks the objectivity of random sampling, so bias may exist from this type of data collection process. Community feedback can be like a Yelp review; people rarely take the time to share their thoughts if they feel ambivalent about a topic, so the feedback gathered skews positive or negative. Participation in this study may have attracted people with a background or interest in the built environment, urban planning, and public space access, which may affect the data gathered.

## Data analysis

The iterative coding process through which I analyzed findings from interviews with participants was done manually; I did not use coding software. The manual coding process was time consuming and tedious but did allow me to thoroughly process and interpret responses, making it easier to eventually organize disparate ideas into coherent findings. Coding software would have streamlined this process and may have presented additional insights about themes that appeared in interviews.

## Diversity

Participants in my research reflected a range of qualities and identities; I spoke with recent college graduates and retirees, new renters and long-time owners, Seattle locals and fresh transplants. I did not systematically collect demographic data about the participants in my research, and instead gathered anecdotal background information. As a neighborhood, Ballard is less racially and ethnically diverse than Seattle as a whole, which is important to acknowledge and contextualize as these demographic details have potential to impact the findings of this research (Balk 2021).

## Additional perspectives

If I had more time for this research, I would try to intentionally engage a broader range of perspectives and identities. Indigenous perspectives about Ballard, its public green and recreational spaces, and the history of this land are important to include. Indigenous communities, as the first people to inhabit this land and from whom this land was stolen, may have unique perspectives about relationships to place, nature, and change. Other BIPOC communities should also be engaged, as experiences of BIPOC individuals in public spaces can vary greatly from those of white public space users. Considerations of safety and inclusivity through a racial justice lens would be a welcome addition to this research.

Because all participants were housed multi-unit dwellers, the unhoused perspective was not included in this research. Unhoused individuals who live in public spaces are often forced to leave,

as access of housed park users is typically prioritized. It would be beneficial to include voices of those who are unhoused in these conversations, as people who live in the parks may have particularly relevant insights about and attachments to these public spaces, and ideas for how to create dynamic, functional, and inclusive public spaces.

The perspectives of disabled community members and disability advocacy groups would also be a tremendous addition to this research. The built environment itself, often through poor design, can disable people from accessing spaces. Disabled community members may be able to lend insights on how public green and recreational spaces can be made more accessible and enjoyable for people of all abilities.

## Topics for future research

Many related and tangential topics came up during interview discussions. Due to time constraints, I could not explore these topics in depth, but they present rich opportunities for future research. These topics include:

- Exploring how events and programming in public space impacts place attachment, time-depth, and community identity.
- Examining how small dwelling units, like apodments, impact community ties and residential affordability.
- Investigating the housing choices of young families in urban areas, as they navigate housing affordability, walkability, and density.
- Conceptualizing ways to improve transit access to distant natural spaces, including exploring rideshare options

## Concluding thoughts

Through a qualitative case study of multi-unit dwellers in Seattle's Ballard neighborhood, interviews revealed six primary ways through which public green and recreational spaces offer opportunities to develop meaningful place attachments: the ability to gather, encounter emotions, explore, establish time depth, experience nature, and learn about local history. These findings confirm that public green and recreational spaces are significant to the general place attachments of multi-unit dwellers, and that these spaces can serve as locations of continuity amidst a rapidly changing urban environment.

As neighborhoods grow, change, and become more residentially dense, public green and recreational spaces become increasingly important. As the findings showed, multi-unit dwellers rely on these places for a range of everyday activities, like socializing, recreating, and recharging. Public green and recreational spaces hold purpose and meaning beyond their functions; these places can serve to connect the community, relay history, reflect time depth, and establish belonging.

What do these findings mean for urban planners? This research attempts to express that public green and recreational space and the opportunities for place attachment development they provide needs to be more intentionally considered as our neighborhoods change and develop. As expressed in the Planning Implications section, the public engagement process must be improved to better understand what communities value and what elements of the built environment they hold attachment to. Creativity must be incorporated into the urban fabric to allow for whimsical adaptations and reclamations of public space. A cultural shift towards sharing public space and resources with a diverse community is needed. Holding events in public space can help accelerate time depth, create reciprocal relationships, and encourage belonging. Finally, it is imperative to incorporate seasonality and natural cycles into the built environment in order to provide respite to city dwellers, contribute to a feeling of time-depth, and improve environmental health and personal well-being.

Public green and recreational spaces are no one's space to claim. They should be communal,

inclusive, and adaptable. They hold vast meaning for many people, not because of their size but because of the community found there, the respite they provide from city life, and the comfort they bring to someone feeling alone. Urban planners must use their tools to empower communities and envision a more resilient and creative future of public green and recreational space in Ballard.

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# APPENDIX A: INTERVIEW QUESTIONS

A complete list of questions asked in the interview process is included in this appendix. The interviews were semi-structured, meaning that questions were asked in different orders depending upon the flow of conversation. Some questions were omitted in some conversations because of time constraints or applicability to the participant's experience in Ballard.

**Housing**

- How long have you lived in Ballard?
- What is your unit type?
- Do you have access to outdoor space at your residence, either shared or private?
- Do you see yourself staying in this place long-term?
- You've chosen, for a variety of reasons, to live in Ballard in a multi-unit building.
    - What went into your housing decision?
    - In reference to open space, do you feel like you've had to make any trade-offs?

**Neighborhood**

- How do you feel about Ballard in general?
- Do you feel attached to Ballard?
- When you think of Ballard, what words come to mind?

**Change**

- What changes have you seen in your neighborhood since you've lived there?
    - How do you feel about these changes?
    - Do these changes impact the way you feel about your neighborhood?

**Public green and recreational spaces**

- Using this map of Ballard as a reference, which public green and recreational spaces in Ballard do you feel most attached to?
    - What do these places mean to you?
    - Do you feel that you have an emotional bond to this place?
    - Have the meanings of these places changed?
    - Do you have a favorite memory of this place?
- Do these places have an impact on how attached you are to Ballard? Are they an important part of how you feel about the neighborhood?
- If you had a wish list for open space in your neighborhood, what would be on it?

# APPENDIX B: BARRIERS TO ACCESS

During the interview process participants mentioned a variety of barriers that prevent them from accessing, enjoying, or developing attachments to public green and recreational spaces. There was nuance and a diversity of opinion about each topic. Because of the intricacies of each issue I cannot address them in depth; each of these topics could easily be pursued as its own research project. But it is important to acknowledge that these barriers exist and impact access to, use of, and attachment to public green and recreational spaces for some participants. This section explores these barriers and their impacts to multi-unit dwellers in Ballard.

## Open space quantity and quality

As mentioned, much of the Central Ballard area lacks access to public green and recreational spaces within a short walking distance, around a half mile. Ballard's Hub Urban Village and Crown Hill's Residential Urban Village are more densely populated parts of the neighborhood, zoned to accommodate relatively dense residential and commercial development. The inaccessibility of Ballard Commons Park, currently closed due to rehabilitation as of December 2021, means that there is an even larger gap in open space access for people who live in Old Ballard and Central Ballard.

> One participant said, "*We do have a fair amount of open space but also, we've lost a certain amount of open space in that the Ballard Commons, now that it has been cleared, it is now closed for 6 to 12 months for reconditioning and refurbishment…I think we're facing a deficit in terms of having open space that's generally accessible. Given how many more people are coming in, I think that's something that we need to be investing more time and energy into keeping those places up.*"
>
> Another participant said, "*During deep Covid, like first lockdown, it was really noticeable the lack of somewhere to be outdoors that felt safe.*"
>
> One participant noted which scales of public open space are accessible in Ballard. *"If I think about greenspace day to day, if I just want to go sit in a park and have*

*a coffee or have kids in a playground, that's kind of challenging in Ballard. That middle level of I'm going to drive or bike 5 or 10 minutes and spend an hour walking around a big park, that's great in Ballard because we have so many places really close. And then the really big park experiences are also pretty challenging. The middle isn't missing for public space.*"

Several participants noted that the current open space in the neighborhood does not feel adequate to serve the local population and that the accessible public spaces are often uncomfortably crowded.

One participant noted overcrowding in accessible public spaces, saying, "*With the Commons as an encampment, Ballard Corners Park is kind of the only real park in the neighborhood, and so that means it's very busy all the time. Just a lot of people trying to pack a very small space, the garbage can is always full, the ground itself is pretty worn out. So it definitely seems like there's not enough green space.*"

The same participant shared what this lack of open space means for their young family. "*Other than the Locks, there isn't really that much super high quality green space in the neighborhood itself. That is definitely the downside for us as we're thinking about what daily life looks like with a kid.*"

Maintenance of public green and recreational spaces was also mentioned by participants as a barrier to their enjoyment of and attachment to these spaces.

One participant said, "*Litter really bothers me. That interferes with my place attachment because I'm so distracted by what I'm seeing on the ground.*"

The same participant said, "*The public spaces that we do have in Ballard are not well taken care of. They're frequently dirty, there's a lot of car idling, there's a lot of trash. The homeless situation has been very complicated and has kind of gotten in the way of public use of parks. Honestly, I leave Seattle to go to other neighboring cities' open space.*"

Participants had a range of ideas for increasing access to public green and recreational spaces, and desires for what these spaces would ideally be like. One way to increase access to open space is through school playgrounds and playfields, spaces that are often closed to the public.

> One participant said of Loyal Heights Elementary, "*When the school first opened, they kept [the open space] locked. The neighborhood rebelled and the school finally relented and so now it's open in non-school hours for people to use, but that was another greenspace that was locked away from community members in a neighborhood that, since it's all single family homes, there's very few green spaces when you go north of 65th, east of 24th, all the way up to about 90th.*"

> The same participant expressed a desire for access to local, casual open space that invites a broad range of uses. "*Golden Gardens is fantastic, it's wonderful. It's a destination, though, with kind of a specific, intended use. I think having that more backyardy type green space, each person who comes there has a different idea of what they want to do in that space, whether it's a picnic, whether it's yoga, whether it's plopping down a chair and reading a book. It doesn't have to be molded into something.*"

## Pedestrian and bike infrastructure

Safe access for pedestrians and cyclists throughout the neighborhood was a significant concern for many participants. For many multi-unit residents in Ballard who don't own a car and whose primary mode of transportation is walking, rolling, or biking, infrastructure like sidewalks, multi-use trails, and greenways are particularly important. Participants expressed that they sometimes alter their chosen route based on the safety conditions for pedestrians or cyclists.

> One participant said, "*The route that I choose is more like green space or at least like car avoidant space.*"

While improvements to pedestrian infrastructure benefit the public, they are especially important for people with disabilities, people with children, and older adults. Improvements to maintain

accessible sidewalks and provide places to rest in public space can help people with a broad range of abilities feel comfortable and safe while using public space.

> One participant shared, "*I know that they're really concerned about the [tree] canopy, but along in front of our building, this isn't unique, but they're old trees and the roots are all on top of the soil, they're breaking up the sidewalks, making it hazardous to walk and the city won't consider replacing. That becomes a trip hazard, especially for an older population, of which there's a lot in Ballard.*"
>
> The same participant said, "*My one friend that has MS, when we walk it's almost impossible to find someplace for her to sit. Sometimes we just have to find a step that she can sit on to rest because there's nothing for blocks.*"

Unsafe conditions along the Burke-Gilman Trail, due to poor design, lack of maintenance, danger of vehicle traffic, and conflicts between users of different modes, was one of the most commonly expressed concerns.

> One participant compared the Burke-Gilman Trail along the waterfront in Fremont to Ballard, expressing a desire for a safer and more pleasant connection between the neighborhoods. "*In Fremont there's the steps that lead down to the water, that spot is magical, particularly in the spring and summer. And I walked it once and it was like, part of its industrial and part of it's also like, okay, where do I go?...So if that was cleaned up and organized and more fluid, I would use that space and walk that route so much more. But as it is now, it's just kind of like, where am I walking?*"
>
> Another participant expressed safety concerns for pedestrians using the Burke-Gilman Trail. "*You don't walk on the Burke-Gilman, you'd get killed. I mean, bicycles go 40 miles an hour when you get down to the regular part of the Burke-Gilman. It can be hazardous to walk on the Burke-Gilman.*"

The Burke-Gilman Trail can serve as a critical connection point to other parts of the city, particularly from Ballard, which is not as central as other nearby neighborhoods.


Figure 28. A reroute on the Burke-Gilman Trail in Ballard.

Figure 29. The Burke-Gilman Trail in Fremont.

One participant said, "*The Burke is the trail I learned to run on, and the place I've done many long runs for many races. It's also how I commute to work. It feels like a blood vessel carrying the lifeblood of North Seattle.*"

Another said, "*Crossing Leary is crappy but just the fact that it is like a connector to almost all of the rest of Seattle. You can go to Gas Works Park and all the way to UW and you can stop for coffee or ice cream. It's just a world of possibility.*"

Participants noted existing built environment features that have improved safety for people walking, riding, or rolling.

One participant said, "*The 17th Stay Healthy Street was amazing for us. My kid is learning to ride a bike and we bike to get everywhere now…I would like the Stay Healthy Street to be 100% no cars…I want to be able to send my kid out to walk around on her own and not worry she's gonna get run over.*"

Another mentioned improvements of the Burke-Gilman Trail near the National Nordic Museum. "*They recently have been working on that area of Market Street, they've expanded the sidewalks, which is great because now there's like a dedicated bike path and a super wide sidewalk. I love that because it gives me more space to walk my dogs.*"

Figure 30. The Burke-Gilman Trail in Ballard

Participants gave several suggestions about improving pedestrian and cyclist safety and connectivity within Ballard. Many of these ideas involve creating a built environment that prioritizes space for non-motorized activities over vehicle access.

> One participant said, "*I like the idea of closing down certain streets and giving them back to pedestrians. The car has been king for the last 50 or 70 years, I think we need to stop giving priority to the automobile. Bikes, strollers, walkers should have equal footing with cars.*"
>
> Another said, "*I would love it if they made Ballard Ave carless.*"
>
> Another participant said, "*Golden Gardens Drive, which was closed to car traffic for a few months during the pandemic as part of the "Safe Streets" program, should be closed again. It's a narrow road without shoulders that is too dangerous to walk or ride a bike on.*"

Other improvements to pedestrian infrastructure, like safer crosswalks and sidewalks throughout the neighborhood, were also commonly mentioned priorities. Participants also expressed a desire for improved pedestrian access across the Lake Washington Ship Canal.

> One participant said, "*I wish there was good pedestrian infrastructure to cross the canal in Ballard because crossing on the Ballard Bridge sucks and is dangerous and the Locks are unpredictable and crowded.*"

## Transit access to urban public spaces

Several participants shared that they don't visit certain public green and recreational spaces as often as they'd like to because of the lack of adequate transit access to these areas. As more and more multi-unit housing in Seattle is being built without parking, it is critical that public transportation allows people to access natural spaces in the city (Gutman 2018).

> Golden Gardens and Discovery Park, two of the largest public green and recreational spaces near Ballard, are significantly lacking in transit access. One

participant said, "*I do like to go to Golden Gardens, but I only go if I can get a ride because there's no direct bus route for me to get there…I only live less than two miles away, but there's just not the best route…Same with like Discovery Park. It's a beautiful space, but I don't go very often because, again, there's just no good, easy direct bus route from where I live. I'd have to go downtown first and then back up.*"

Another participant shared the same sentiment. "*In the summer at Golden Gardens there should be some kind of shuttle bus from the corner of 32nd and 54th that would run until midnight. There's no public transportation beyond that to Golden Gardens. It prevents those of us who need to drive there from using it in the summer because it's too crowded and you can't find a parking spot.*"

Of transit access to urban and regional natural spaces one participant said, "*Something that's bugged me is that the public transit to big green spaces like Discovery Park or Carkeek or Green Lake, or even like we were talking earlier about hiking on the east side, it's very, very, very limited. I try to drive a car as little as I can, and it feels like I'm always having to get in a car to go to outside, which feels counterproductive and counterintuitive. I would love to be able to get to outside without having to get in a car.*"

## Access to distant natural spaces

The Trailhead Direct program, sponsored by King County Metro and King County Parks, provides transit access from the Capitol Hill and Mount Baker Link light rail stations in Seattle to two of the most popular natural recreation areas east of the city, the Issaquah Alps and the Mount Si area in North Bend (Trailhead Direct, n.d.). This program allows city dwellers to easily access the natural beauty of the region in the summer months.

As exciting as this program is, it is too limited to serve the entire city; having only two pick-up points means that some Seattleites would have to travel a significant distance from their residence to even get to the light rail stop. The program also could be expanded to provide access

to additional natural areas, besides the two it already provides transit to.

Rideshare programs, like Zipcar, allow individuals to reserve vehicles for short periods of time. These programs could serve as an alternative to private vehicles in accessing regional natural spaces. Rather than owning a car, which can be expensive and inconvenient in dense urban areas, city dwellers could rent a car for just a few hours to hike outside of the city. Rideshare vehicle fleets would need to be expanded to include vehicles that can handle poorly maintained roads, as many access points to outdoor recreation are inaccessible to conventional sedans. This would be an interesting idea to explore; how could local governments invest in rideshare programs to supplement existing transit access?

## Homelessness

Homelessness came up in most of my interviews, about which participants expressed a wide range of perspectives. This is a sensitive, nuanced, and pressing issue both in Ballard and citywide that cannot be adequately addressed here. However, this was one of the most oft-mentioned factors affecting access to public green and recreational spaces during the interview process, so a sample of these perspectives are shared here.

> One participant, who shared that they had previously been homeless, expressed their perspective, saying, "*While I was fortunate enough to only spend two months in a tent, followed by brief residency in a Tiny House community before finally getting into an apartment, others still have nowhere to go and parks have provided safe albeit cold and wet refuge. This has deprived neighbors of their usual activities in some cases; a sad side effect only cured through repeated "sweeps" of parks as a continual version of musical chairs plays out…So far, only once did I see a person sleeping in my neighborhood greenbelt. They were tightly wrapped in a comforter on what must have been a very cold, very hard marble style bench. This disturbed me only for my desire that no one should have to sleep this way. I remembered never being able to get warm while I lived in a tent. Every day and every night seemed like an eternity.*"

One participant noted impacts to accessing public space, saying, "*To me, a lot of the green spaces in Seattle are sometimes hard to access because they can have houseless neighbors on them or they're not well maintained.*"

Another participant shared their emotions on the subject, saying, "*Like in many areas of Seattle, there is a serious problem of homelessness, which makes me sad (though not mad or threatened).*"

Several participants described how encampments or a perceived lack of safety altered their chosen path, or mazeway, through their neighborhood.

Of Ballard Commons Park one participant said, "*I used to go there a lot…I would take my dog there to get a little bit of a walk…And unfortunately, during the pandemic, it was very unsafe to walk around there. And that felt like a loss for us because that was the closest greenspace…It was a little bit emotional when that park near us became a place that we couldn't just not visit but also didn't really feel safe. Walking near I got yelled at and harassed a number of times until I was like, I'm just not walking around that park anymore, unfortunately. And that's kind of a weird thing to have that adjustment…that changed the vibe of just walking in that direction.*"

Another said, "*What we have now is just chaos in our park. There are never any children there because who would go to the park?…Now that they've got it fenced off, we're better off, so no one can use it…They used to do Movies in the Park…it was part of where we lived, now it's a part of where we avoid.*"

The encampment in Ballard Commons Park and subsequent sweep bring up different emotions from participants; some feel sad that unhoused park users were forced to leave, others feel a sense of relief, and an almost universal frustration exists at the ongoing lack of access to the park.

One participant said, "*I actually live right next to the Ballard Commons Park, but they swept it a couple months ago and it's been closed off ever since. So that's*

*disappointing, first of all, because I don't think people should be forced to leave during the winter and because now it's a space that nobody can use for like six months to a year.*"

Another participant said, "*The last couple of years have been really tough. We've experienced a lot of homelessness that is caused from drug addiction and mental health issues, so very challenging. A lot of damage to the building, a lot of break-ins. Some people don't feel particularly safe and won't go out at night because of it…The fact that we got the park cleaned up a month ago, that's made a big difference. And you kind of see the vibrancy coming back to the shops and restaurants.*"

A respect for the privacy of those living in the park conflicts with the desire of housed users to access the park. While people often feel comfortable sharing public space with other uses, like a birthday party or frisbee game, an encampment's public display of traditionally private space impacts some potential users' willingness to use the space.

One participant observed, "*Since Ballard Commons feels like someone's home, it doesn't feel right to try to hang out there actively.*"

There is a desire for coexistence between housed and unhoused users of public space. This ideal is sometimes difficult to envision and remains virtually untested in the United States, yet it is an ideal to strive towards.

One participant said, "*The Commons Park is currently closed off. I wish that there was a way that all the residents could use it. Our unhoused neighbors need a space to stay, I think ideally they would be in housing, but, having heard from the people who live near the park, like I do, they also want to use the space and it wasn't really a possibility. So in a fairytale world I wish there was a way that we could share it."*

Public spaces often serve as a microcosm of the issues playing out within our larger society and can be important venues through which to see and understand systemic inequities.

One participant said of Ballard Commons Park, "*Since the pandemic started there was a large unhomed people's encampment there…I felt like these spaces provide such a touchstone for us to look at ourselves and see what's going on. So for a lot of business owners and residents, they dislike the fact that they had to walk past there and see people who are unhoused, who were making different choices than they might make with their life, but I thought it was so important to not just hide the fact that things are unequal. People don't have the same opportunities, people don't feel good all the time and aren't able to make the priorities to keep a house over their head and who are we to say that we'd do any differently given those life circumstances? And so I wouldn't say I liked it or disliked it, I just thought it was important to have that visual for so long and to not just brush it under the rug and move it along. I think the same is true for any of these wild places, like if I run back in the hills in Golden Gardens, I'll find tents or places where people clearly were living. And so they provide this incredibly important juncture between wild nature and our society.*"

Another said, "*The camping in Commons Park has been somewhat inconvenient, but perhaps a very needed reminder of the horrible inequality that we have these days.*"

## Safety

Feelings of safety, or lack thereof, impact how people use and experience public space. Perceptions of safety are not universal; past experiences, preferences for environmental design, discrimination, and other factors often affect how safe we feel in a particular space. Some participants expressed feeling very safe in Ballard, while others stated that increased crime in their neighborhoods prevent them from accessing public green and recreational spaces.

Several participants described the lack of safety they feel in Ballard's public spaces. One said, "*There's crime everywhere, and people don't want to go into the park and be a victim. I don't want my grandkids to go and be a victim and find open needles.*

*Not interested. And so until we have better protection, the parks will struggle.*"

Another participant said, "*One of the things that has changed about Ballard is just getting to Market Street, I don't walk at night as much. I'm very cognizant and I would say that's happened in the past year or so.*"

Several other participants expressed a different perception of the neighborhood's safety.

One participant said, "*I feel safe. I've never had issues with going out at night or being near people that are facing more issues than I am.*"

Another stated, "*The part we live in feels very residential, it's very quiet, there's a lot of families. I feel super safe walking around. It almost feels like you're in the suburbs, but then you get all the benefits of being in a city.*"

## Inclusion

BIPOC communities have been historically excluded from or been victims of violence in public space (National Health Foundation 2020). Systemic racism and discrimination persist today, and members of BIPOC communities may feel unsafe in public space. Safety of BIPOC community members must be prioritized in the effort to create truly public, democratic spaces.

Ballard's relative lack of diversity compared to Seattle as a whole was noted by several participants as a shortcoming of the community (Balk 2021).

One participant noted, "*I have one friend who's like 'Ballard is so white.' I'm like, 'Well, that's why I moved in, trying to color it up a little bit.' So those are some of my friends' critiques.*"

Another participant stated, "*The one thing in the minus column for Ballard was honestly racial diversity. Like we're all a bunch of white folks.*"

Another participant said, "*I definitely feel the privilege of living in Ballard. This is*

*not about the parks, but moving from Capitol Hill where it's so lively and diverse and moving to Ballard where it's largely white has also been different, so it's been interesting to move to a more homogenous, family oriented space.*"

## Gentrification

A lack of affordability and increased development in the neighborhood has brought changes to Ballard in terms of the built environment, community culture, and social make-up of the neighborhood. Several participants expressed feeling saddened by these changes, as they may alter the identity of and attachment to Ballard itself.

One participant said, "*I really appreciate my neighborhood for the history that it has. The quirkiness is something that I most appreciate and some of that is changing and that's some of the loss that I feel about all the changes happening.*"

Another participant noted demographic changes in Ballard. "*I've seen the demographic switch from one with a variety of jobs and lifestyles to a younger wealthier one. My neighbors used to be a social worker, a preacher, a railroad worker, a retired Studebaker salesman, a coffee shop owner, a waitress, and a musician… These people moved. The property owners sold and the renters were priced out. My new neighbors are primarily tech workers. There are significantly more young children and that is a nice thing…[Because of these changes] I have a deeper appreciation of the things I like about it. But my ability to live here happily seems tenuous.*"

One participant reflected upon their role in the neighborhood's changes. "*We bought in Ballard at a time when it was starting to gentrify, and one of the things that I liked about it is I grew up relatively blue collar, and it still had sort of a blue collar ethos to it and it wasn't completely gentrified. I guess I was a gentrifier.*"

## Housing affordability

One question I asked in each interview was, "Do you see yourself staying in Ballard long-term?" While this question elicited a range of responses, many participants shared anxieties and frustrations about the lack of housing affordability in Ballard. In the city of Seattle and throughout the broader Puget Sound region, housing costs are high and availability is low, culminating in a housing crisis that has people on edge (Bertolet 2021).

> One participant described changes in development in Ballard and expressed a desire for increased affordability. "*Many of the single-family homes in my neighborhood have been destroyed to build expensive condos. I have no problem with density, but I wish some of these new buildings were affordable to working people. We need more supportive, low-income permanent housing for those living unhoused.*"

Current housing market conditions impact whether people can afford to live in Ballard, and could affect their attachment to the neighborhood and its public spaces. Several residents expressed that they are unsure how long they can stay in Ballard due to high housing costs.

> One participant said, "*With all of the news about housing markets, I would say it's a real source of sadness that I can afford to live here now as a renter and I don't think I will ever be able to afford to live here again.*"

> A condo owner in Ballard considers how long they can remain in the neighborhood, saying, "*Over the years it just seems like more and more people move in and then housing gets more and more expensive, so the vibe is just different now. I often wonder, when is it time for me to move to the suburbs?*"

Some participants described how increased density has decreased the amount of vegetation in Ballard, as single-family homes with yards are replaced with large multi-unit buildings that lack significant landscaping. While I would argue that increased density is generally positive for housing affordability, the loss of private open space can be experienced as a loss of a public good,

as passersby can enjoy this space visually and vegetation benefits overall environmental health.

> When asked about what tradeoffs they made in their housing choice, one participant said, "*Initially no [tradeoffs]. The neighborhood had lots of private gardens along the sidewalks and several public parks were within walking distance. Since then, the private open/green space has been replaced with lot covering 3-story row houses and the open feeling has been greatly diminished…The dramatic increase in population density, decrease in gardens, loss of long-term neighbors, and so on as significantly reduced the quality of life in the neighborhood.*"

# APPENDIX C: BALLARD OPEN SPACE WISHLIST

The final question asked in each interview was, "If you had a wishlist for open space in Ballard, what would be on it?" This question elicited a broad range of responses from participants, including desires to access specific types of open space, hopes for transit infrastructure, and ideas for requirements for landscaping around new developments.

The table below categorizes and summarizes these desires as a comprehensive wishlist for open space access in Ballard. **Bolded items** were mentioned by at least 3 people.

| Category | Wishlist items |
|---|---|
| Pedestrian infrastructure | • **Safer Burke-Gilman Trail in terms of pedestrian safety and crime**<br>• **Permanent and carless cafe street on Ballard Avenue**<br>• **Safer and more accessible sidewalks**, esp. north of NW 85th street<br>• Permanent, completely carless Stay Healthy Street on 17th Ave NW<br>• Safer pedestrian infrastructure to cross the Ship Canal<br>• More pleasant mixed-use running trail<br>• Golden Gardens Drive closed to car traffic |
| Bike infrastructure | • **Completed Missing Link of Burke-Gilman Trail**<br>• Permanent bike and pedestrian infrastructure<br>• Improve greenways with speed bumps and pothole repairs, specifically on the NW 53rd St Greenway<br>• Reduce car traffic on greenways by eliminating street parking, making traffic one-way, and adding separated bike lanes |
| Transit | • **Improved transit access to urban parks**<br>• **Easier access to regional parks**<br>• Summer evening shuttle bus to Golden Gardens from the corner of 32nd Ave NW and NW 54th St<br>• Increased connectivity through light rail to downtown Ballard<br>• Water taxi from Gasworks Park to downtown Seattle |
| Biophilic design | • More greenery near rights of way in traffic circles and planting strips<br>• Green traffic circles at intersections of streets where private greenspace was replaced with structures<br>• Inclusion of biophilic design and placemaking into laws and policies<br>• Stronger city standards for vegetative privacy and landscaping<br>• Incentives for developers to incorporate biophilic design<br>• Requirements to maintain landscaping in new developments |

| Category | Wishlist items |
|---|---|
| Water | • **Water access to the canal from Old Ballard** |
| Play | • **More playgrounds, especially in multi-family areas**<br>• Playground in Ballard Commons Park<br>• Bigger playground for bigger kids and adults |
| Rest | • **More outdoor seating like benches and tables** |
| Open space availability | • **More open space within a 5-10 minute walk, without having to cross a busy arterial**<br>• **Dog park near downtown Ballard**<br>• More pocket parks<br>• Accessible Ballard Commons Park<br>• Accessible school fields/playgrounds after hours<br>• Extension of Gemenskap Park from Ballard High School to Ship Canal<br>• More walking paths near the water |
| Design | • **More mature trees, increased canopy cover and shade**<br>• Expansive grassy areas<br>• Space without defined uses<br>• Better design for Ballard Commons<br>• Nooks and crannies in open space to create a cozy feeling<br>• More secluded, calm green spaces<br>• Circuit exercise course |
| Safety | • Safer parks<br>• Coexistence of housed and unhoused users in public space |
| Private space | • Requirement for open space to be incorporated in new development<br>• Cultural shift towards private green space as public amenity<br>• More pollinator pathways in private open space<br>• More sky views than current setbacks and height restrictions allow |