

RUNNING HEADER: HOUSING CRISIS AND INTERNATIONAL STUDENTS' HEALTH IN
CANADA: A CASE STUDY AT LAKEHEAD UNIVERSITY.

**HOUSING CRISIS AND INTERNATIONAL STUDENTS' HEALTH IN CANADA: A CASE
STUDY AT LAKEHEAD UNIVERSITY**

By

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Author's declaration

I hereby declare that I am the sole author master thesis and has been completed in accordance with the academic requirement of Lakehead University. I further declare that I have not submitted this thesis to any other institution in order to obtain a degree.

Abstract

Objectives

This research seeks to examine the housing experiences of international students, utilizing Lakehead University as a case study site to ascertain the potential effects of the prevailing housing crisis and different forms of housing on international students' physical and mental well-being.

Methods

This study employed a qualitative approach, combining semi-structured interviews and document analysis. Interviews with international students offered in-depth insights into housing experiences, while document analysis review added context on policies at Lakehead University. Purposive sampling identified 15 participants, including students and staff. Using NVivo, a thematic analysis revealed key themes, triangulating findings from both the interviews and institutional documents to capture the structural housing determinants.

Findings

The study found that international students preferred on-campus housing initially, transitioning to off-campus options later due to affordability concerns. Common challenges included high costs, maintenance issues, and landlord-tenant relations. Good housing conditions positively impacted well-being and integration, while poor conditions negatively affected mental health. Coping strategies involved online platforms, social networks, and university support, leading to recommendations for expanded on-campus housing and affordable policy changes.

Conclusion

The housing crisis in Canada significantly impacts international students, who face financial strain, substandard living conditions, and inadequate institutional support. Addressing this requires a comprehensive approach from governments, universities, and housing providers to create affordable, safe, and accessible options tailored to international students' needs. Resolving the housing challenges is essential for international students' well-being, academic success, and integration into Canadian society.

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CHAPTER 1: INTRODUCTION

Overview

The housing crisis issue has been widely discussed globally, with Canada being no exception. This crisis can be attributed to population growth and limited housing supply to meet the growing demand for housing due to a surge in income (Canada Mortgage and Housing Corporation, 2022). Additionally, the financialization and deregulation of the Canadian housing system significantly influenced housing prices (Chisholm & Hulchanski, 2019). Currently, Canada is facing a housing deficit of 3.5 million units. The situation is further compounded by the fact that 1.7 million individuals in the country are experiencing core housing need¹ (Canada Mortgage and Housing Corporation, 2022; Chisholm & Hulchanski, 2019). According to Statistics Canada (2022a), approximately 21% of Canadians allocate a proportion of their earnings exceeding 30% towards housing expenses, indicating a significant financial burden. According to the UN-Habitat (2020) definition, housing expenses that surpass 30% of an individual's gross income are considered to be indicative of unaffordable housing costs. In Canada, vulnerable groups in society are disproportionately affected by this burden, such as low-income individuals and visible minorities, who are three times more likely to allocate a proportion of their earnings exceeding 30% towards housing expenses (Statistics Canada, 2016). Similarly, many international students have housing costs exceeding 30% of their income (Calder et al., 2016a). Although many studies on newcomer housing experiences typically overlook international students due to their temporary immigration status and the perception that their housing experiences are transitory, recent evidence suggests that international students are a particularly vulnerable population in the Canadian rental housing market (Brunet, 2022; Calder et al., 2016a; Pottie-Sherman et al., 2023; Sotomayor et al., 2022). These challenges are attributed to language barriers, inadequate knowledge of the host country's housing market, and finding and maintaining suitable housing (Calder et al., 2016a; Obeng-Odoom, 2012). The repercussions of housing inadequacy, which encompass unaffordability, unsuitability, and insecurity, transcend beyond the housing sector. This crisis significantly affects an individual's physical and mental well-being, rendering it of utmost importance to be addressed to ensure individuals' general health and stability (Morganti et al., 2022; Park & Jung, 2019; Seo & Park, 2021).

¹ The notion of core housing need pertains to the extent to which a household's housing satisfies the criteria of adequacy, affordability, and suitability while ensuring that no more than 30% of its pre-tax income is allocated towards acceptable housing (Statistics Canada, 2022f).

The current housing crisis significantly impacts people's health and well-being, particularly emphasizing the difficulties experienced by international students, many of whom contend with housing needs and broader economic and social assimilation needs (Haverila et al., 2020). The physical and mental well-being of individuals, including international students, can be significantly affected by housing conditions, particularly pest and mold infestations (Suglia et al., 2011). The negative health consequences of residing in poor housing conditions include depressive symptoms, cardiovascular diseases, asthma, and allergies (Braubach et al., 2011; Seo & Park, 2021; World Health Organization, 2018). It is commonly reported that international students frequently express concerns regarding the affordability and availability of housing in Canada (Calder et al., 2016a; Pillai et al., 2021). As a result, international students continue to inhabit unhygienic housing arrangements, notwithstanding challenges such as excessive occupancy, inadequate ventilation and heating, insufficient privacy, and exploitative landlord behaviours (Sotomayor et al., 2022). Accordingly, international students are likely to be affected by health repercussions as they continue to inhabit unhygienic housing conditions in Canada, which is attributable to challenges related to the affordability and availability of housing.

The Canadian government's disregard for student housing is apparent in its exclusion of such provisions from the recent Canadian National Housing Strategy (Government of Canada, 2019a). Additionally, the government has delegated the responsibility for housing provision to municipal governments and private entities (Chisholm & Hulchanski, 2019; Pillai et al., 2021). Given the lack of government attention to housing provision obligations and insufficient funding allocated to postsecondary institutions (Revington & August, 2020), postsecondary institutions have revised their policy strategies to address student housing concerns by facilitating partnerships with private enterprises (Allard & Simms, 2012; Cardwell, 2018). Although there are postsecondary institutions that acknowledge the issue of housing unaffordability and unavailability within the Canadian housing system in their policy statements (McCartney et al., 2018), only a limited number of these documents expressly address the distinct housing issues faced by international students. Despite efforts made by the government and postsecondary institutions to tackle the housing difficulties encountered by international students, these support mechanisms and interventions have proven insufficient in addressing their specific needs.

Consequently, international students have demonstrated creative approaches in light of the perceived insufficiency of government and postsecondary institutions. These innovative approaches include relying on social networks, working extra hours to meet housing expenses, creating advocacy groups to combat exploitative practices, and enhancing physical appearances and employment opportunities (Sotomayor et al., 2022). Recognizing the importance of understanding the distinct challenges faced by international students in the housing crisis context, this study seeks to explore the housing experiences of international students and investigate the potential consequences of the current housing crisis and the

different housing options in Canada on international students' physical and mental well-being, with a specific focus on Lakehead University. By exploring the housing-related issues they face, including affordability and safety concerns, this study seeks to contribute to developing a holistic solution to promoting international students' academic and overall health and well-being. Significant literature has explored students' housing experiences and well-being in postsecondary institutions. However, numerous scholarly sources inaccurately categorize "students" as a collective term that includes both domestic and international students (Lotay & McGovern, 2017; Sotomayor et al., 2022), disregarding the distinct requirements of these diverse groups and inadequately addressing the latter's needs. Thus, this study seeks to offer new perspectives and suggestions in light of international students housing predicament in Canada.

The findings from this study are relevant to key stakeholders, including federal and provincial governments, postsecondary institutions, housing providers, and international students.

Research Objectives

The objectives of the study are:

- Explore international students' housing experiences, including their challenges, preferences, and satisfaction levels.
- Examine the impact of the housing situation on international students, including its effects on their academic performance and social integration.
- Investigate the relationship between housing and the physical well-being of international students, considering factors such as housing type, living conditions, safety, and access to basic amenities.
- To investigate the relationship between housing and the mental well-being of international students by exploring the psychological effects of housing instability, overcrowding, and limited privacy.
- To identify coping strategies international students, employ to navigate housing challenges in Canada, including seeking alternative accommodation, relying on social networks, and utilizing campus resources.
- Provide recommendations and insights for universities, policymakers, and housing providers to improve the housing experiences of international students by promoting their well-being and ensuring their successful integration into the academic community.

Research Questions

This study primarily seeks to examine international students' housing experiences in Canada. The research questions identified in this study are as follows:

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- Do different housing types and conditions affect international students' well-being and academic performance in Thunder Bay, Ontario?
- What are international students' specific housing challenges and experiences in Thunder Bay, Ontario, and how do they affect their physical and mental well-being?
- What coping strategies do international students in Thunder Bay, Ontario, employ to navigate housing challenges?

CHAPTER 2: LITERATURE REVIEW

Introduction

A review of academic and grey literature was conducted to contextualize the research, specifically oriented towards the experiences encountered by international students. The review focused on literature related to international students, the Canadian housing crisis, and the interaction of housing with health. This tailored approach ensured that the study was centered on the specific concerns and difficulties faced by international students in relation to housing.

Internationalization of education

The internationalization of higher education has experienced a notable increase in recent decades. This phenomenon can be influenced by the interplay of various factors, including sociocultural, economic, political and academic, involving several stakeholders (De Wit & Altbach, 2021). The aforementioned trend can be observed in the rise of international students, the proliferation of branch campuses, partnerships between educational institutions, and the heightened worldwide mobility of scholars (Galloway et al., 2020; Hsieh, 2020; Kudo et al., 2020). The "internationalization of higher education" concept pertains to incorporating international and multicultural elements into postsecondary education's objectives, operations, and provision (Knight, 2008). This concept can be classified into two distinct components: internationalization abroad and internationalization at home (Knight, 2004). Internationalization abroad, the predominant kind of internationalization, refers to the transnational transfer of educational activities, encompassing the movement of students, teachers, and programs beyond national boundaries (De Wit & Altbach, 2021; Knight, 2004). Internationalization at home pertains to incorporating international and multicultural elements into formal and informal curricula for all students within the contexts of local educational environments (Beelen & Jones, 2015).

The significance of internationalization of higher education cannot be underestimated, as educational institutions derive advantages from it through teaching and research. The internationalization of education serves as an attractive force for outstanding students and faculty members hailing from especially underdeveloped regions by means of providing them with access to high-calibre educational opportunities (Beelen & Jones, 2015). This process fosters a global outlook, ultimately establishing a dynamic and engaged scholarly community. The internationalization of education has facilitated enhanced collaboration among scholars by bolstering research capability and infrastructure through international publications, patents, and funding initiatives. This collaborative effort has been crucial in addressing global challenges, including the COVID-19 pandemic (De Wit & Altbach, 2021). Although the internationalization of education offers numerous benefits to higher educational institutions, students and researchers, its implementation is not without problems. Many higher educational institutions in developed and developing regions face challenges, including cultural, financial resources,

human competency, governance and structural constraints in implementing internationalization (Moshtari & Safarpour, 2023; Qiu, 2020). These challenges hamper attracting quality students and staff, diversity within the academic community and collaborative research among organizations.

The provision of services and support accompanies the internationalization of higher education worldwide. Higher education institutions offer international students a wide range of support services, including financial assistance, housing accommodations, healthcare and wellness resources, counselling services, and academic and professional development opportunities, among other provisions (Calder et al., 2016a). These support systems aid in the successful integration and assimilation of international students. However, housing poses a prominent challenge for international students upon their arrival in a foreign country (Kuzmane et al., 2017; Obeng-Odoom, 2012). The high cost of rent, lack of affordable housing, limited knowledge of the housing market in the host country, and language barriers are among these obstacles (Calder et al., 2016a; Obeng-Odoom, 2012). In recent decades, there has been a notable increase in the population of international students globally. From 2000 to 2019, Canada experienced a consistent upward trend in the enrollment of international students, with the figures rising from 70,000 to 250,000 (Statistics Canada, 2022b). However, disparities exist between the internationalization objectives of Canadian educational policy and those of higher education institutions and immigration and housing policies (Filipowicz & Lafleur, 2023). The underlying disparities and ongoing housing and affordability crises further intensify the preexisting housing problem and render numerous international students particularly vulnerable to these difficulties in Canada (Balintec, 2023; Filipowicz & Lafleur, 2023). The aforementioned disparities underscore the imperative for educational and governmental institutions to address the housing challenges within the framework of the internationalization of higher education.

Housing crisis in Canada

The housing sector in Canada has undergone substantial transformations in terms of the government's involvement throughout the span of numerous decades. The time under consideration can be delineated into four discrete phases: 1919-1964, 1965-1984, 1985-1993, and 1994 to the present. During the initial phase, the government directed its attention towards the homeownership sector, implementing various measures such as mortgage insurance and mortgage system reforms to facilitate and promote this endeavor. The second stage entails the construction of social housing (non-market housing), encompassing community-based non-profit housing and cooperatives targeted towards individuals experiencing poverty. The third phase witnessed a significant decrease in the provision of social housing for economically disadvantaged individuals by the federal government. The fourth stage is distinguished by the transfer of responsibility for social housing to the provincial government, resulting in a subsequent deterioration of the availability of affordable housing (Chisholm & Hulchanski, 2019).

The insufficient allocation of funds by the Canadian government towards social housing underscores its inability to address the housing needs of all citizens adequately and highlights the persistent housing crisis that has plagued Canada for numerous decades.

Government intervention significantly impacts the Canadian housing market; however, external influences have also played a pivotal part in shaping the current housing situation. The housing situation in Canada is being worsened by two factors: the global financial crisis and the internationalization of higher education (Filipowicz & Lafleur, 2023; Walks, 2014). The former contributes to rising housing prices, while the latter exacerbates the existing housing deficit² of 3.5 million (Balintec, 2023; Chisholm & Hulchanski, 2019; Walks, 2014). The latter can be attributed to disparities in the objectives of Canadian educational policy, immigration policies, and housing policies (Filipowicz & Lafleur, 2023). To address this problem, the Canadian government introduced the National Housing Strategy in 2017 to address the housing crisis the Canadian population faces.

The Canadian housing market is facing a crisis that has significantly impacted its population. This trend is due to a surge in income, population growth, and limited housing supply to meet increasing demand. Housing prices have increased due to financialization and speculation in the housing market (Teranet, 2021). Consequently, Canada has experienced increased inequality and financialization of housing and urban land (Chisholm & Hulchanski, 2019). The housing shortage³ in Canada has led to exorbitant prices, causing both renters and homeowners to spend a significant portion of their income on housing (Canada Mortgage and Housing Corporation (CMHC), 2022). According to Statistics Canada (2022a), approximately 21% of Canadians allocate 30% or more of their total income towards housing expenses, indicating a significant financial burden. In many communities throughout Canada, numerous individuals cannot afford to buy a house or even rent one because their income does not meet housing costs (Canadian Urban Institute (CUI), 2019; Homeless Hub, 2021; University of Toronto, 2022). Two-thirds of the total housing deficit, which amounts to 3.5 million, is concentrated in Ontario and British Columbia.

² The term "housing deficit" pertains to the number of dwellings that lack sufficient conditions for habitation and the insufficient number of housing units available (Monkkonen, 2013).

³ A housing shortage refers to the disparity between the current quantity of residential properties and the hypothetical quantity that might exist in the absence of regulatory constraints on supply (Corinth & Dante, 2022).

Communities and individuals worldwide are becoming increasingly concerned about the rising cost of housing, which is outpacing income growth. In Canada, low-income individuals (seniors and people requiring assistance), Indigenous people, and visible minorities, are three times more likely to allocate more than 30% of their total income towards housing expenses (Statistics Canada, 2016). As a result, low-income individuals often live in inadequate housing or experience homelessness because of their inability to afford suitable shelters (Canadian Urban Institute, 2019; Hulchanski, 2021). Finding affordable housing has become increasingly challenging for individuals and families because of the growing gap between housing costs and income. The financialization⁴ and deregulation⁵ of the housing system have resulted in a significant increase in high-income households and a decline in middle-income households. This trend has led to a growing gap between low-income and high-income households (Chisholm & Hulchanski, 2019). Although the rate of homeownership has dropped below 60% in recent times, individuals eligible for support through mortgage insurance funds can still access the opportunity to own a home (Chisholm & Hulchanski, 2019). The provision of financial assistance through mortgage insurance funds plays a crucial role in enhancing the affordability of homeownership for individuals who may otherwise lack the financial resources to own a property. In addition, stimulus packages were created by federal and provincial governments in Canada specifically for first-time homebuyers to lower their homeownership expenses (Canada Revenue Agency, 2009). However, many young people struggle to afford homeownership due to income levels and the increasing cost of homeownership (Chisholm & Hulchanski, 2019; Hulchanski, 2021). These events highlight the intricate factors affecting the housing market, such as income inequality, government policies, and differences in homeownership among generations.

Many Canadians struggle to find stable and affordable rental housing, resulting in insecurity regarding their tenure. In Canada, rental households are growing faster than homeowners, yet the government has overlooked the demand for rental housing since the mid-1980s, reducing its availability (Chisholm & Hulchanski, 2019; Statistics Canada, 2022e). The cancellation of the federal government's subsidy plan

⁴ Financialization is a term used to describe the trend in which finance capital is gaining significance, resulting in a greater dependence on financial innovation within the economy (Epstein, 2005). Financialization of housing markets is defined as the process by which housing is treated as a commodity, a means of accumulating wealth, and often as security for financial instruments that are traded and sold on global markets (United Nations, 2017).

⁵ Deregulation in the housing finance sector entails the removal of regulations and incentives that have been imposed on financial firms (Stephens, 1993).

for private sector rental housing supply was evident in this case. The number of renter households witnessed a surge of 21.5% in the renting sector, surpassing the 8.4% growth in homeowners, with this housing option being popular among millennials (Statistics Canada, 2022g). The stagnant supply of rentals in Canada has made it challenging to afford rental properties, even for run-down properties in urban areas (Hulchanski, 2021), contributing to the low vacancy rate of 1.9% experienced in the country (Statistics Canada, 2018b). The proportion of renter households facing unaffordable rates in Canada is 33.2% as of 2021 (Statistics Canada, 2022g). The high financial burden associated with rental expenses, especially for newly available properties, contributes to housing instability and the risk of homelessness (Hulchanski, 2021). In addition, according to Markovich (2021), housing stakeholders in Canada argue that inadequate tenant protection and eviction procedures exacerbate the eviction issue. The sale of property by landlords disproportionately affects marginalized groups, resulting in homelessness affecting 30% of Canadians and eviction experienced by 12% of renters (Statistics Canada, 2021a). Although property sales by landlords substantially contribute to homelessness and eviction among marginalized groups, it is important to acknowledge that other reasons are also at play. These factors include situations where the landlord requires the unit for personal use, conflicts between tenants and landlords, instances where landlords opt for demolition or major renovations, and cases where tenants fall behind on their rental payments.

The Canadian government's uneven allocation of housing resources, favoring private-sector housing over social housing, has contributed to the growing income disparity and wealth inequality in Canadian society (Chisholm & Hulchanski, 2019; Walks, 2014). Unfortunately, the Canadian housing market also exhibits discrimination and racism, whereby tenants are mistreated by race, income, gender, disability, and status as newcomers (Ages et al., 2021). The discrimination and racism within the housing market limits the options of marginalized groups, including black, Indigenous, people of color and LGBTQ2S+, in accessing housing. In addition, obtaining mortgages can be challenging for the above-mentioned marginalized groups owing to these social injustices within the housing market (Ontario Real Estate Association, 2022). As a result, these marginalized groups are saddled with inadequate, unsuitable or unaffordable market and non-market housing options, which affects their well-being.

Housing challenges in Canadian cities

The housing crisis has resulted in many housing difficulties inside urban centres in Canada. This crisis stems from housing policy narratives spanning the post-World War housing policies to the current Canadian National Housing Strategy, which saw a radical shift from an emphasis on social housing to the financialization and deregulation of the housing sector (Chisholm & Hulchanski, 2019). In addition, there has been a notable surge in population growth in urban regions of Canada. The phenomenon under

consideration is evidenced by the fact that census metropolitan areas (CMA) have registered a population growth of 5.2% between 2016 and 2021 and that a significant proportion of the Canadian population (73.7 %) resides in urban areas (Statistics Canada, 2022a). However, it is noteworthy that there has been a decline in the housing supply, as indicated by a steady decrease in the quantity of newly built residential units (Carter, 2012). Specifically, there has been a reduction from 246,533 completed dwellings in 1977 to 198,761 in 2020 (Statistics Canada, 2018a). Furthermore, the significant increase in immigrants, reaching 250,000 since the 1990s, who choose to settle in urban areas exacerbates the existing circumstances (Carter, 2012). The current increase in population exerts a significant strain on pre-existing infrastructure, including housing, transportation, and various other services. The current pressure experienced in the housing industry can be attributed to various factors, including the rise in population and household growth, as well as inter-provincial and international migration, all of which have contributed to an increase in the demand for housing (Carter, 2012). Consequently, this has led to a swift escalation in housing costs, rendering it inaccessible to a significant segment of the populace. Housing affordability is a prevalent issue in urbanized and remote regions of Canada. Nevertheless, there are variations in these experiences among the different provinces of Canada, whereby British Columbia and Ontario are deemed the most unaffordable provinces, with Toronto and Vancouver being the most unaffordable cities in Canada (Canada Mortgage and Housing Corporation 2022). Furthermore, the province of Quebec, formerly characterized by relative affordability, has experienced a decline in affordable housing compared to other provinces that have primarily maintained their level of affordability. The marginalized population, including racialized groups, is significantly affected by housing affordability issues (Ontario Real Estate Association, 2022), despite different Canadian cities experiencing variations in housing unaffordability. There has been an increase in housing prices observed in Canadian urban centres. The cost of purchasing housing has increased by over \$100,000 since the start of 2023, and rising interest rates are a major factor contributing to this surge (P. Evans, 2023). A significant proportion of the increase in property values occurred within the Greater Toronto Area and the British Columbia Lower Mainland. The widening income gap between homeowners and renters leads to an escalation in rental prices due to the conversion of rental properties into condominiums intended for homeownership (Hulchanski, 2021). This conversion reduces the availability of rental housing, thus impacting its affordability.

In contrast to homeownership, the escalation of rental rates and widening income inequality across several Canadian cities are notable trends (Hulchanski, 2021; Statistics Canada, 2022g). The period from 1982 to 2019 witnessed a notable income disparity in Canada, as seen by the substantial difference in income growth between the lowest 90% and the top 10% of the population (Green et al., 2017). While the income of the bottom 90% increased by a modest 2%, the top 10% had a significant spike of over 75%. This trend coincided with a considerable rise in property prices, which escalated the average

housing prices from \$150,000 to \$500,000 during the same time, particularly in major urban centres across Canada (Sopchokchai & Zhou, 2020). The presence of a disparity in income levels between homeowners and renters is evident in prominent major cities in Canada, including Toronto, Calgary, Vancouver, and Montreal. Specifically, homeowners in these areas exhibit greater income levels, with median after-tax incomes of 85%, 65%, 64%, and 111% higher than renters, respectively (Hulchanski, 2021). Insufficient housing supply in numerous urban centres across Canada has failed to keep pace with the escalating demand for housing, which can be attributed to rising incomes, population growth, and a sustained decrease in interest rates (Canada Mortgage and Housing Corporation, 2022). Canada projected a yearly growth rate of 2.7% for the duration of the year 2022 (Statistics Canada, 2023a). This was accompanied by a corresponding increase in Canadians' real median income (after tax), amounting to 6.7% or nearly \$39,600 (Statistics Canada, 2023b). Despite Canada's historically low interest rates (Carter, 2012), the increased demand for housing resulting from increased income and population growth has caused a situation where the demand for housing surpasses the available supply. This has led to the current housing supply gap that Canada is currently grappling with and an affordability crisis. The aforementioned occurrences led to a significant rise in homelessness throughout multiple urban regions across Canada, as seen by the increase in the number of individuals experiencing homelessness from 200,000 on a particular night in 2013 to 350,000 on a specific night in 2016 (Gaetz et al., 2016; Gulliver-Garcia, 2014). According to Gulliver-Garcia (2014), an examination of homelessness rates in Canadian cities reveals that Toronto, Calgary, Edmonton, and Vancouver exhibit the most significant instances of homelessness. The prevalence of homeless people in these cities, as determined by the 2013 point-in-time counts, is estimated to be 0.19%, 0.29%, 0.27%, and 0.27% of their respective total populations. The homeless population in Canada comprises various age groups, with individuals between the ages of 16 and 24 accounting for 20% of this population. In Canada, it has been observed that approximately 80,000 post-secondary students are experiencing various forms of homelessness, such as engaging in couch-surfing, residing in vehicles, and seeking refuge in shelters (Weissman et al., 2019).

Canada faces three primary housing challenges: affordability, inadequacy, and unsuitability. According to Statistics Canada, (2022f), a significant proportion of the Canadian population is impacted by various housing-related concerns. Specifically, 77.1% of Canadians have obstacles related to housing affordability, while 4.4% face issues of inadequate housing. Additionally, 5.5% of Canadians encounter problems with unsuitable housing, and 13% contend with a combination of these aforementioned challenges. In urban centres across Canada, there were evident indications of housing needs in key downtown districts, with a core housing needs rate of 18.4%, and in census metropolitan areas, the rate stood at 11.2%. Hulchanski (2021) argues that Canada's housing stock is getting old, with

approximately 60% of its rental units constructed before the 1980s and 50% constructed between the 1940s and 1990s. Additionally, Canada introduced the Residential Rehabilitation Assistance Program to combat the aging housing stock. Nonetheless, the program was limited in scope because of reduced funding, which rendered it incapable of adequately preserving and refurbishing the deteriorating housing inventory (Suttor, 2016). Ensuring access to secure, affordable, and adequate housing is of utmost importance in light of the housing issues faced in Canada, both at the individual and community levels.

Towards mental wellbeing: The role of housing conditions in shaping social interactions and sense of belonging

A significant portion of the existing research about the relationship between health and housing primarily examines housing as a setting where individuals are exposed to various physical health hazards, including pests, molds, and dampness (Hernández, 2019; Swope & Hernández, 2019). In recent studies, it has been discovered that housing conditions have a significant influence on mental well-being (Pevalin et al., 2017; Rollings et al., 2017a). However, a significant limitation of many housing-mental health research is the failure to comprehensively examine the ⁶social-ecological determinants of health, encompassing the physical and social environment and interpersonal connections associated with housing (Kloos & Shah, 2009). The physical environment has two key aspects: housing quality, which refers to the state of walls and the provision of suitable heating, and neighbourhood quality, which pertains to access to transport and the overall condition of structures within the community (Boydell et al., 1999; Newman, 1994). Additionally, the social environment encompasses the social aspects associated with communal existence, such as the sense of affiliation and the assurance of protection and security within the area (Kloos & Shah, 2009). The interpersonal ties in housing revolve around the social interactions between landlords, neighbors, and roommates (Kloos & Shah, 2009). These housing-related social-ecological determinants of health stated above impact mental health.

Promoting mental health is crucial as it enhances social capital and solidarity and is essential for a functioning community (World Health Organization, 2022). Adequate and suitable housing conditions significantly impact mental well-being. Suglia et al. (2011) argue that housing conditions, directly and indirectly, influence mental and physical well-being. For example, the immediate impact of structural

⁶ The concept of social-ecological determinants of health refers to the social and ecological elements as fundamental aspects of the health and well-being of both present and future populations (Gislason et al., 2021)

deterioration in a residential setting, including challenges in addressing repairs, concerns regarding tenure security, unfavorable living conditions such as pest infestations, and instances of homelessness, can significantly affect mental and physical well-being. Other indirect factors such as location-accessibility to services and facilities, neighborhood features such as parks and recreational areas, and the social connectedness of a community also play a significant role. Also, continuous exposure to these housing conditions factors is associated with declining mental well-being (Pevalin et al., 2017). For instance, in Canada, a notable prevalence of substandard housing exists among a population of around 520,000 individuals affected by mental health conditions (Mental Health Commission of Canada, 2008). The youthful population, particularly those who reside alone in crowded dwellings and lack direct access to outdoor areas, are particularly vulnerable to mental health issues stemming from housing conditions (Groot et al., 2022). This underscores the importance of addressing the physical aspects of housing and the wider community setting in eliminating mental health concerns related to housing conditions.

Housing conditions are essential for establishing positive relationships and social connections as they allow the development of social networks and support systems (Wilcox et al., 2005). Additionally, social support systems affect individuals. Numerous scholarly articles have outlined the significance of housing conditions in social interactions with individuals (Dumford et al. 2019; Pais et al. 2019). Positive social interactions within housing conditions can effectively alleviate anxiety-related behavior and cognitive impairments. Moreover, these relationships have been shown to bolster resilience and decrease the probability of experiencing stress among individuals. These aforementioned benefits emphasize the connection between housing conditions, social interactions, relationships, and support. Housing conditions also significantly influence social belonging in a community. Garvey et al. (2020) argued that housing conditions shape a sense of belonging through physical aesthetics and providing a secure residential environment. For instance, several aspects of housing conditions, including upkeep, cleanliness, aesthetics, and functional utilities, impact individuals' sense of belongingness. A significant relationship has been identified between inadequate housing conditions and reduced sense of belonging (Ng et al., 2005; Tester et al., 2011). For instance, the sense of belonging to a community can diminish in the presence of "housing incivilities," which comprise several issues, such as litter on one's property and living in housing needing maintenance (Brown et al., 2003). Therefore, promoting hygiene in individual and communal areas is crucial in fostering a sense of belonging (Lewicka, 2010). Also, positive interactions, community building, clear communication, information sharing, pleasant surroundings, and secure residential areas can improve the sense of belonging (Garvey et al., 2020). Accordingly, beyond their primary purpose, housing conditions affect social interaction, community involvement, sense of belonging and mental health.

Contributions of housing challenges to physical well-being

Inadequate housing conditions, characterized by overcrowding, insufficient safety measures, and suboptimal environmental conditions, can adversely impact individuals' physical health outcomes. The presence of inadequate housing conditions, including water leakage, insufficient ventilation, unclean carpets, and pest infestation, has been linked to negative physical health consequences such as asthma and allergic sensitization (Braubach et al., 2011; D'Alessandro & Raffo, 2011; Do et al., 2016; World Health Organization, 2018). Furthermore, there is a correlation between exposure to extreme temperatures and the incidence of cardiovascular disorders (World Health Organization, 2018).. Marginalized populations are more likely to experience adverse health outcomes because of their tendency to reside in substandard housing conditions (D'Alessandro & Raffo, 2011; Peters et al., 2007; Swope & Hernández, 2019). Moreover, suboptimal environmental conditions characterized by indoor air quality, thermal conditions, acoustical quality, and lighting quality (Sakellaris et al., 2016) affect health outcomes. Literature suggests an association between these factors and respiratory diseases, general health symptoms, and skin diseases (Anwar et al., 2021; Savelieva et al., 2019; Schreiber et al., 2023).

The proximity of housing to various services and facilities, as well as the characteristics of its neighbourhood, such as the availability and access to parks and recreational areas, play a crucial role in promoting the well-being of individuals. A positive correlation has been observed between the proximity to these services and facilities and physical health outcomes, primarily mediated by increased engagement in physical exercise (Kohl III et al., 2013; Machón et al., 2020). Consequently, improving the proximity of these amenities to residential areas can facilitate the adoption of a health-conscious lifestyle, contributing to the prevention and mitigation of a range of health issues such as cardiovascular disease, diabetes mellitus, osteoporosis, hypertension, obesity, and metabolic syndrome (Kohl III et al., 2013). These potential benefits underscore the importance of these amenities in enhancing physical health through their proximity to residential areas.

The housing conditions have a significant impact on the social interactions and relationships of individuals. Evans (2003) asserts that housing conditions significantly impact individuals' physical well-being and also their social interactions and relationships. Evidence suggests a correlation between higher population density, social disengagement, and decreased socially supportive relationships (G. W. Evans, 2001; G. W. Evans & Lepore, 1993). Furthermore, individuals' social interactions and connections are significantly influenced by neighbourhood characteristics, including the presence and ease of access to open spaces (G. W. Evans et al., 2003). For example, individuals residing in high-rise structures lacking sufficient access to these amenities exhibit diminished social contact and relationships with their neighbors. As a result, the insufficient presence of both high-quality and

abundant social contacts and relationships has been found to have adverse effects on physical health, such as an increased risk of obesity, diabetes, cancer, and cardiovascular disease (Engebretson et al., 2014; W. J. Lee et al., 2013; Rutledge et al., 2004; Shaya et al., 2014). This statement recognizes that while housing and environmental factors are crucial for maintaining physical well-being, they also significantly contribute to developing interpersonal connections, substantially impacting an individual's physical health.

In public health, it is noteworthy to acknowledge that injuries occurring within the confines of one's home carry a substantial burden on overall well-being. These injuries, which transpire in domestic settings, account for roughly one-third of all injuries sustained globally (Peden et al., 2008; Turner et al., 2011). Ormandy (2009) suggested that inadequate and insecure housing is causally related to many household injuries, such as burns, smoke inhalation, falls, lacerations, and collisions with objects. This underscores the interdependence of housing and physical health consequences and the significance of tackling these concerns to augment the welfare of individuals and societies.

Housing crisis, well-being and international students

The current housing crisis has greatly affected people's health and well-being. The crisis has resulted in financial strain, inadequate housing, insecurity, and homelessness. International students in Canada face the problem of finding and maintaining adequate housing (Calder et al., 2016a). In addition, they face difficulties finding suitable housing due to inadequate knowledge of the host nation's housing market and language barriers (Obeng-Odoom, 2012). Housing affordability and availability in Canada are the most frequently reported issues among international students (Calder et al., 2016a; Pillai et al., 2021). It has been observed that international students allocate more than 30% of their income towards housing expenses, as stated in the study by Calder et al. (2016).

In addition, overcrowded living conditions, poor housing, and insufficient amenities worsen affordability. Owing to Canada's vacancy rate of 1.9% (Statistics Canada, 2018b), finding a place to live as an international student is becoming increasingly challenging. As a result, international students struggle with exorbitant housing prices due to intense competition caused by a shortage of available options. Landlords' discriminatory practices based on race and sex are also significant barriers in the Canadian housing market (Fagan, 2020; Gupta & Su, 2023; Sotomayor et al., 2022). For instance, many landlords fail to inform international students about yearly rental increases that exceed the legal limit (3%) (Sotomayor et al., 2022).

The financial burden imposed on international students attending Canadian postsecondary institutions, primarily exorbitant tuition fees, significantly hampers their capacity to get affordable housing, resulting in housing instability (Calder et al., 2016a). Furthermore, many international students are

unaware of their rights and responsibilities as first-time tenants, which can lead to exploitation by landlords and eviction if they fail to comply. In a volatile housing market, students become vulnerable and are at the mercy of landlords because of the limited eviction protection (Sotomayor et al., 2022). This contributes to issues of tenure insecurity and housing instability experienced by international students. These issues are the widespread effects of the current housing crisis in Canada.

Numerous scholars have emphasized the connections between housing affordability and tenure with the well-being of individuals (Bentley et al., 2016; Chung et al., 2020; Park & Jung, 2019; Seo & Park, 2021). The type of tenure, whether owned or rented, significantly affects well-being. Homeowners' well-being is minimally impacted than renting shelters (Park & Jung, 2019). Rental housing is common among international students: 78% choose to rent alone or with their family members (Canadian Bureau for International Education, 2018). The high demand for rental housing and unaffordability in Canada may negatively impact international students' well-being. The provision of housing for international students may be characterized by substandard quality, excessive occupancy, and inadequate safety measures (Gupta & Su, 2023). These encounters have the potential to create divisions among students based on their economic and social backgrounds, leading to varying housing situations that can significantly affect the well-being and health of students (Sotomayor et al., 2022).

Postsecondary institutions such as universities, colleges, and governments have integrated international student support, resources, and guidance into their mandates. These services are vital, especially for international students' academic and personal development journeys. International students have various needs, including economic, housing, and social assimilation (Haverila et al., 2020). This support significantly enhances international students' well-being (Jou & Fukada, 1997; J.-S. Lee et al., 2004). Housing plays a significant role in student academic performance. Access to suitable housing also significantly contributes to the high retention of international students and better academic performance (Haverila et al., 2020; Sotomayor et al., 2022). Housing plays a significant role in retaining international students, although it has often been overlooked. The housing challenges faced by international students have frequently been disregarded, as their concerns are commonly discussed solely within the framework of their student status. Furthermore, there has been a notable shift in the priorities of post-secondary institutions, as many have begun to place less emphasis on the provision of affordable housing despite experiencing a rise in student enrollment. In response, postsecondary institutions increasingly seek housing alternatives from private entities, creating upscale facilities that are mostly financially unattainable for a significant portion of the international student population (Pillai et al., 2021). It is essential to provide international students with suitable, affordable, safe housing options and robust support systems to address housing challenges and promote their overall health and well-being.

The concept of well-being involves both the subjective experience of quality of life and the capacity of individuals and communities to make meaningful contributions to society (World Health Organization, 2023b). The idea of well-being encompasses three distinct outcomes: physical, mental, and social health (World Health Organization, 2023a). This research aims to explore the housing experiences⁷ of international students by analyzing its impact on their physical and mental well-being. Statistics Canada (2021) utilizes a range of indicators to evaluate the housing conditions, experiences, and well-being of individuals and households across the nation. These indicators comprise various elements, such as the tenure status of households, shelter costs, housing affordability, housing suitability, dwelling conditions, core housing needs, dwelling satisfaction, neighbourhood satisfaction, and household living arrangements. The primary focus of this study will be on a specific collection of indicators, including the tenure status of households, shelter cost, housing affordability, dwelling characteristics, dwelling satisfaction, and household living arrangements. Therefore, this study will analyze the effects of these markers on the physical and mental well-being of international students. The selected components of wellness were especially delineated to shed light on the unique health concerns and needs encountered by international students in connection with their housing experiences.

Support systems and interventions for students

Providing sufficient support systems and interventions is critical in effectively addressing housing challenges and promoting overall well-being. As one of the primary stakeholders in providing housing for international students, the state plays a key role in allocating these responsibilities. However, it is worth noting that the Canadian National Housing Strategy does not reference housing specifically designated for students (Government of Canada, 2019a). The aforementioned observation indicates a significant lack of concern on the part of the government towards the housing predicament experienced by international students. The devolution of housing provision at the subnational level by the state has prompted a discourse on the allocation of responsibility for the provision of affordable housing to postsecondary students, with the government advocating the assignment of this responsibility to private providers and municipal governments (Chisholm & Hulchanski, 2019; Pillai et al., 2021). With the exclusion of Montreal, only a few cities with universities are identified in the official planning

⁷ The concept of housing experiences is multifaceted, encompassing the assessment of housing conditions and the impact on the health and overall welfare of individuals and households within a community. This assessment is conducted through the use of various indicators, such as the tenure status of households, shelter costs, housing affordability, housing suitability, dwelling conditions, core housing needs, dwelling satisfaction, neighbourhood satisfaction, and household living arrangements (Statistics Canada, 2021b).

documents as having provisions for student-specific housing, apart from a small number of supplementary plans (Pillai et al., 2021). This underscores the insufficient housing assistance provided to international students by the municipal governments. This predicament is further compounded by the limited assistance that international students receive regarding rent regulations accessible to other demographics (Sotomayor et al., 2022). The government's limited involvement in providing student housing has prompted postsecondary institutions to implement innovative strategies to assist students with housing.

In the past, diverse government funds facilitated the provision of student housing (Revington & August, 2020). However, there is currently a dearth of such funds, leaving universities to rely solely on their budgetary allocations. Accordingly, several postsecondary institutions have shifted their policy plans away from constructing university-owned student housing and have instead opted to collaborate with private institutions to tackle the issue of student housing (Allard & Simms, 2012; Cardwell, 2018). The aforementioned phenomenon can be attributed to the scarcity of student housing in Canadian universities, as well as the inclination to expand enrollment on a global scale to attract high-calibre individuals, such as students, staff, and faculty (Cardwell, 2018; La Roche et al., 2010). The increasing demand for internationalization in higher education has exerted considerable pressure on the existing student housing supply in two distinct ways: firstly, by its inability to accommodate the growing enrollment numbers, and secondly, by a shift in students' attitudes and preferences towards their university experience (Pillai et al., 2021). The excessive dependence of postsecondary institutions on private organizations has resulted in the infiltration of the private sector into student housing to advance the globalization of higher education. Additionally, the emergence of public-private student housing in Canada, coupled with the prospect of generating higher returns, reducing costs, and resisting economic downturns, have made this venture attractive to private firms (Patterson, 2016; Revington & August, 2020; Smith, 2005; Smith & Hubbard, 2014). This trend has resulted in elevated profits for this category of student accommodation, as they are perceived as premium commodities, consequently prompting investors to raise rental rates (Revington & August, 2020). The observed trend has led to a persistent escalation in the costs associated with this category of student accommodation, as housing is viewed through the lens of commercial exchange rather than a public welfare service. The relaxation of rent control restrictions and the high turnover rate of student housing have resulted in the establishment of new prices whenever there is a vacancy (Sotomayor et al., 2022). Accordingly, only 3% of students reside in student housing facilities in Canada (Revington & August, 2020), indicating the unaffordability of student housing.

Numerous Canadian universities have policy documents to address housing availability and affordability, with some policies focusing solely on availability and others focusing on both availability

and affordability (McCartney et al., 2018). Nonetheless, only a limited number of policy plans have addressed the issues of housing availability and affordability, with the majority focusing solely on availability. This highlights the failure of postsecondary institutions to adopt a comprehensive and holistic strategy to address the housing challenges faced by students, particularly those from foreign countries. Therefore, international students are responsible for devising inventive methods for navigating a housing market fraught with problems.

International students often depend on various resources, such as social networks, including friends, Facebook, Places4Students, and Kijiji, to cope with the housing shortage beyond the assistance offered by postsecondary institutions (Bhargava, 2022; Sotomayor et al., 2022). Despite the availability of various channels to secure accommodation, students resort to alternative and resourceful approaches, such as increasing their work hours to meet rental expenses, enduring lengthy travel times, navigating exploitative practices, and devising innovative tactics to address housing challenges (Sotomayor et al., 2022). Concerning exploitative practices in navigation, students have established advocacy groups to assist their peers by disseminating information on exploitative practices, sharing personal experiences, and offering advice on renting. Moreover, students have developed inventive strategies, such as modifying their physical appearance to the landlord and emphasizing the employment-related aspect of the program with the landlord to persuade them to grant rental (Sotomayor et al., 2022). For instance, students enrolled in arts-focused programs may choose to emphasize the technical parts of their program, rather than solely focusing on the creative or artistic elements. This deliberate emphasis aims to challenge prevailing preconceptions and stereotypes associated with artists, particularly those about their perceived low income and limited employment opportunities. Despite these coping mechanisms, insufficient institutional backing and a lack of systemic modifications in housing conditions can impede students from experiencing the comprehensive university journey advertised by postsecondary institutions and the internationalization of higher education (Sotomayor et al., 2022). The failure of postsecondary institutions and governments to address the housing challenges faced by international students can affect their academic performance, as well as their physical and mental well-being, leading to a sense of alienation among these students (Pillai et al., 2021; Sotomayor et al., 2022).

Conclusion

The housing problem in Canada has been greatly influenced by the several stages of government intervention that have shaped the evolution of the country's housing industry. The current situation is exacerbated by external reasons, including the global financial crisis and the increasing globalization of higher education, resulting in a shortage of housing and policy discrepancies. The current housing scenario is characterized by the interplay of several factors: increasing income levels, population

increase, and restricted housing availability. This predicament is further compounded by the influence of financialization and speculative activities within the housing market.

The housing challenges in Canada have significant implications for the country's populace. Low-income individuals, seniors, Indigenous people, and visible minorities see a disproportionate impact, as they allocate a substantial part of their income towards housing expenditures. The presence of rental housing issues exacerbates instability and increases the likelihood of experiencing homelessness. The presence of discrimination and racism within the housing market has significant consequences for marginalized communities, as it serves to reinforce social inequities and negatively affect overall well-being.

International students represent a particularly susceptible demographic in the housing crisis, as their distinct housing difficulties have received limited attention in previous scholarly investigations. These students frequently encounter substandard housing conditions, which can substantially impact their physical and mental well-being, resulting in various health issues. It is of utmost importance to note that there exists a substantial dearth of scholarly investigations about the housing experiences of international students.

In light of these problems, international students have demonstrated resourcefulness through utilizing social networks, engaging in additional employment, establishing advocacy organizations, and auguring their employability. The primary objective of this study is to fill the existing research void by examining the housing experiences of international students, with a specific emphasis on Lakehead University. This study aims to investigate the implications of the ongoing housing crisis on the physical and mental well-being of international students. By examining their distinct problems, this research endeavors to provide insights and contribute to developing strategies that enhance their academic performance and overall well-being. This study holds significant importance as it focuses on the noticeable dearth of research about the housing experiences of international students, hence emphasizing the necessity to fully understand and effectively solve the issues they encounter in relation to housing.

CHAPTER 3: METHODOLOGY

This segment of the proposal delved into the fundamental justification and structure that directs the qualitative investigation methodology, specifically emphasizing positionality, implementing a case study design within the framework of social constructivism, methods for garnering data, interview guide development, data analysis, ethical considerations, strength and limitation of the study and knowledge translation. The aforementioned are founded on acquiring a comprehensive and intricate understanding of international students' housing encounters.

Positionality

As an African male student, the opportunity to pursue my education abroad, specifically in Canada, was a highly coveted achievement. However, my relocation to Canada brought about numerous obstacles, including being part of the lower social strata and facing prejudice and bigotry. Amidst the housing crisis in Canada, my personal experiences of encountering racism and adjusting to a new housing market during my quest for adequate housing sparked my interest in investigating the housing experiences of other international students. As an international student, I have first-hand experience with the challenges of obtaining adequate housing in Canada. This provided me with insider knowledge of international students' housing experiences. Although possessing valuable insights and perspectives, prioritizing personal experiences or making assumptions about international students' experiences hindered the validity and rigor of gaining a more nuanced understanding of the study.

As the researcher responsible for conducting this study on the housing experiences of international students, it was imperative to acknowledge and critically reflect on my positionality and its potential impact on the research process. As an African male student with firsthand experience as an international student in Canada, I contributed my perspectives, cultural values, and personal encounters to this research endeavor. It was imperative to recognize that these factors have the potential to influence perceptions, interpretations, and interactions with participants. To uphold the integrity and objectivity of the research, I am dedicated to conducting a thorough analysis of my assumptions, biases, and preconceived notions regarding housing experiences and international students. By maintaining a conscious awareness of these potential influences, I mitigated their effects and approached the research with a receptive mindset, ready to question any pre-existing assumptions that emerged and embraced any contradictory findings.

Furthermore, I know the inherent power dynamics within the researcher and participant relationship. Ensuring a secure and all-encompassing setting was incumbent on me, wherein participants freely expressed their experiences and perspectives without apprehension regarding criticism or exclusion. I actively listened, acknowledged and affirmed the participants' viewpoints and cultivated a sense of trust

that encouraged transparent and sincere communication, including their ability to share any positive experience.

During this research, I actively engaged in continuous reflexivity, consistently reflecting on my positionality, biases, and potential impacts on the study. This reflection was done by taking a detailed account of my biases, thoughts and feelings that arise while interacting with the data. This ensured that I remain conscious of my own perspective and potential influences on the research process. The strategy above of keeping a detailed account was duly considered in my reflexivity during data analysis processes, thereby ensuring high transparency and methodological rigor in the research.

By acknowledging and critically examining my positionality, I sought to augment this research's credibility, dependability, and ethical soundness regarding international students' housing encounters in Canada. Incorporating reflexivity into the research process enhanced the depth and complexity of comprehending the research findings. It promoted meaningful interaction with participants, thereby improving the overall quality of research outcomes.

Rationale for a qualitative approach to inquiry

As per the research objectives, this study explored the housing experiences of international students in a postsecondary institution in Canada. Recognizing the profound impact of housing on international students' physical and mental well-being, it was crucial to analyze the various factors contributing to their housing experience comprehensively. By employing a qualitative methodology, a deeper and more comprehensive understanding of the complexities inherent in human experiences and phenomena were achieved. It was imperative to acknowledge that adopting qualitative research for this study does not lessen the significance of quantitative research, nor does it suggest an inherent restriction. However, qualitative research was chosen for this study to capture the nuances and complexities of international students' housing experiences and well-being. This involved observing phenomena in natural environments and interpreting them based on the subjective meanings attributed to individuals (Denzin & Lincoln, 2011).

Open-ended research questions guided the semi-structured interviews, enabling participants to give detailed and context-rich responses. This approach was conducive to capturing nuanced perspectives and contextual meanings, which, in turn, facilitated the emergence of themes, patterns, and meaning within the data collected. Open-ended questions enabled participants to elaborate on their experiences and viewpoints, contributing to a more profound interpretation of international students' experiences. To accomplish this, the research adopted a case study research design rooted in a social constructivist interpretive framework. The case study approach was particularly suitable for investigating international students' housing experiences, as it thoroughly examined real-life instances in a

contemporary context over an extended period. This case study was conducted throughout the data collection phase during the 2023/2024 winter semester. A rich qualitative dataset was gathered from the selected postsecondary institution through comprehensive data collection techniques incorporating multiple sources of information, including semi-structured interviews and document analysis. This provided an in-depth understanding of international students' housing experiences and their effects on well-being and contribute valuable insights to the field.

Use of case study research

The case study methodology entailed an examination of real-life scenarios within a contemporary context. The aim was to thoroughly understand complex events by scrutinizing these phenomena within their natural contexts and collecting comprehensive and elaborate data from various sources (Creswell & Poth, 2018). This methodology was utilized to examine the housing encounters of international students, as it enabled a thorough understanding of their experiences, obstacles, and determinants that impact their housing experiences within the particular context of a Canadian postsecondary institution. Case study research provided an opportunity to delve more deeply into the housing experiences of international students compared to other theoretical approaches, specifically phenomenological research. The case study methodology was adept at elucidating the underlying mechanisms and causative factors that inform "how", "why", and "what" questions (Sheikh et al., 2002). Phenomenology is particularly useful in capturing the experiential aspects of the phenomenon under investigation, including the "what" and "how" dimensions (Moustakas, 1994). This highlights the justification for utilizing a case study approach, as it enables a thorough comprehension of a phenomenon beyond merely observing "what" and "how" it was experienced.

By leveraging multiple data sources, this approach facilitated a comprehensive analysis of diverse facets, including obstacles, inclinations, effects on well-being, and mechanisms for managing difficulties. In addition, a case study enabled an examination of the housing experiences of international students within wider social, cultural, and institutional frameworks, thereby promoting a more profound comprehension of the intricate interrelationship between housing and the overall well-being of international students. Furthermore, the utilization of the case study methodology yielded a wealth of qualitative data from various sources, enabling a comprehensive and nuanced comprehension of international students' experiences, encompassing a range of perspectives and contextual interpretations.

In accordance with the research objectives, case study research demonstrated its suitability for conducting a comprehensive and in-depth exploration of the housing experiences of international students and the potential impacts these experiences have on their well-being. This method facilitated the production of comprehensive qualitative data, advancement of theoretical frameworks, and

acquisition of valuable perspectives that enhanced the quality of housing encounters and the overall well-being of international students.

Social constructivism framework

The social constructivist framework is a hermeneutic tool that enabled a deeper understanding of our lived experiences by emphasizing their subjective meanings. The framework acknowledged the importance of multiple viewpoints and social interactions in shaping broader meanings influenced by individuals' social and cultural contexts (Creswell & Poth, 2018). In the context of this study, adopting the social constructivist framework was highly relevant and significant, as it recognized the pivotal role of social interactions and meanings in shaping the housing experiences of international students.

By employing the social constructivist framework, this study aimed to thoroughly examine diverse perspectives, meanings, and interpretations to gain a comprehensive and nuanced understanding of international students' housing experiences as they constructed their own realities. This approach acknowledged that the experiences and interpretations of international students are not homogenous but rather shaped by distinct cultural and social contexts. Moreover, the application of the social constructivist framework provided an opportunity to explore housing experiences in broader cultural, social, and institutional contexts. This approach facilitated an in-depth exploration of the impact of social, cultural, and institutional policies and the power dynamics of international students' housing experiences, leaving room for potentially positive experiences that informed winning strategies that will enrich the study. By considering these contextual elements, this study aimed to unearth the intricate and demanding circumstances international students faced in relation to housing.

A case study approach was consistent with the social constructivist framework by comprehensively examining the intricate nature of housing experiences among international students within their social and cultural contexts. This enhanced our comprehension of their realities and provided insights for developing effective strategies to enhance their housing situations. The effects on the well-being of international students were assessed through the viewpoints shared by interviewees. This approach comprehensively examined the subjective aspects of their housing experiences.

Data collection

This study employed two data collection methods: interviews and document review analysis. The rationale for employing semi-structured interviews in this research was to acquire extensive, varied, and contextually rich data on the housing experiences of international students. In contrast to structured interviews, which adhere to a pre-established set of enquiries, semi-structured interviews offered adaptability and enabled a thorough examination of respondents' viewpoints and encounters. This approach allowed for the thorough examination of the intricacies of each participant's housing

experiences. Tailoring the follow-up questions and adjusting the conversation flow as needed ensured that the interview process remained attuned to each international student's unique background and perspective. This adaptability facilitated a deeper exploration of the nuances and complexities of their housing experiences and provided a richer understanding of their viewpoints and interpretations.

In addition to semi-structured interviews, document analysis was conducted in this study to garner comprehensive, diverse, and contextually rich information on international students' housing experiences. This involved reviewing relevant documents, including university policies, housing guidelines, reports, and other documents related to housing services and international students. The primary benefit of employing document analysis as a data collection method was its ability to contextualize housing-related policies, initiatives, and official documents. This methodology provided significant contributions to understanding the development of housing strategies and the institutional framework throughout history. Moreover, document analysis facilitated a thorough examination of pre-existing reports and authoritative documents, contributing to establishing a solid theoretical foundation and contextualizing the experiences of the individuals involved. The rationale for deploying a combination of qualitative data collection methods was to achieve data completeness (Adami, 2005; Halcomb & Andrew, 2005), thereby enhancing the comprehensiveness of the phenomenon. The semi-structured interviews represented an opportunity to garner information from international students and staff from the international student's office using one-on-one interactions, while the document analysis sought to garner relevant housing information available to international students from the selected postsecondary institution. The study conducted individual interviews to gather comprehensive accounts of international students' housing experiences and perspectives. A document analysis complemented and validated the outcomes of the comprehensive interviews. Comprehensive and diverse data collection was achieved by facilitating the interchange and dissemination of perspectives through interviews. The integration facilitated the interchange and dissemination of viewpoints, enriching the understanding of international students' housing experiences.

Interviews were conducted on Zoom at a convenient and comfortable location for international students and staff to share their experiences. Each interview had a duration ranging from 30 minutes to one hour. Informed consent was sought from international students and staff to participate and record the interviews. This approach ensured that the study captured the viewpoints and narratives of staff and international students' housing experiences.

Participant selection

This investigation section explored several crucial elements fundamental to the research procedure. This pertained to location rationale, sampling and inclusion criteria, recruitment, and ascertaining a suitable

number of participants. Each constituent performed a pivotal function in guaranteeing the authenticity and dependability of research outcomes.

Location rationale

The escalation of the internationalization of higher education and the concomitant surge in the number of international students in Canada over the past few decades, along with the housing crunch, has sparked my growing interest in investigating their housing experiences and the effects of these phenomena on international students' well-being. Consequently, for a detailed outlook of the situation, the province of Ontario was selected for analysis due to its reputation as a prominent center for internationalization, as evidenced by the fact that 52% of international students opt to pursue their studies there (Akkaymak, 2023). Although Ontario is a popular destination for international students, it is crucial to recognize that housing difficulties, namely unaffordability and deficits, significantly influenced its appeal as a study location (Canada Mortgage and Housing Corporation (CMHC), 2022), which necessitates a comprehensive investigation of this phenomenon at a designated postsecondary institution within the selected region, specifically focusing on Northern Ontario.

The study was conducted in Thunder Bay, the largest city in Northwestern Ontario, for convenience regarding the researcher's place of education. Thunder Bay is an amalgamated city comprising Fort William and Port Arthur, with a population of 108,843 (Statistics Canada, 2022c). The urban area has witnessed a notable surge in the enrollment of international students, with Lakehead University and Confederation College, the two prominent higher education institutions, reporting a substantial growth of 247% and 315%, respectively, during the period spanning from 2012 to 2017 (Northern Policy Institute, 2020). The growth of international students in the two prominent higher education institutions in Thunder Bay exceeds the patterns observed in large cities in Ontario, such as Toronto, where there has been an annual growth rate of international students exceeding 11% in the past decade (City of Toronto, 2018). Notwithstanding its appeal as a prominent hub for international students, Thunder Bay continues to grapple with a significant core housing need experienced by 8.4% of households as of 2021 (Statistics Canada, 2022d). In Thunder Bay, a significant proportion of the population, namely 19.3%, resides in unaffordable housing (Statistics Canada, 2017). This issue is even more pronounced among individuals who rent their homes, with a substantial 42.6% experiencing the challenge of unaffordability. The high incidence of chronic homelessness in Thunder Bay, affecting around 62.9% of the city's population, can be linked to the low vacancy rate of 1.8% (Canada Mortgage and Housing Corporation, 2022; TBDSSAB, 2022). Given Thunder Bay's severe housing affordability challenges, its geographic isolation and its status as the largest urban center in Northwestern Ontario. This highlights the uniqueness of Thunder Bay due to these aforementioned factors. The findings can contribute to understanding international students housing experiences in northern and remote locations.

The selection of Lakehead University as the study site was based not only on its proximity and accessibility to the researcher but also on its relevance and appropriateness in assessing the research problem. Lakehead University, known for its diverse student body of more than 1,500 individuals hailing from 70 countries worldwide (Lakehead University, 2023), presented an excellent opportunity to conduct a comprehensive examination of the housing experiences of international students. This case study offered a valuable platform to gather insights and perspectives from various international students.

Sampling and inclusion criteria

The study utilized a purposive sample technique to find and choose participants who match the precise criteria that are relevant to the research. This study interviewed students to gain insight into their personal experiences with housing in Ontario, Canada. The inclusion criteria for this study include being a Lakehead University student who possessed a minimum of one year of housing experience and have resided off-campus, as well as their voluntary inclination to disclose details regarding their housing experiences. The rationale behind this approach was to gather insights from international students with first-hand housing experiences in Ontario, Canada. Given the constraints of limited resources, including time and budget available for data collection and analysis, along with the detailed nature of the data collection process, a restricted sample size was adopted.

In addition, a complete investigation of the housing experiences of international students at the chosen postsecondary school was conducted using a two-tiered approach. A snowball sampling approach was used to identify university officials in the international students' office at the selected postsecondary institution. These officials were interviewed to gather information about the housing resources available to international students and provided perspectives on the ways to improve the housing situation for international students. This combined approach facilitated an in-depth and comprehensive analysis of the collected data, enabling a thorough examination of the housing experience of international students. The use of document analysis compiling relevant documents pertaining to housing and international students at Lakehead University, interviews conducted with university staff, and interviews conducted with international students provided a multi-dimensional understanding of the housing situations and the initiatives implemented to cater to the requirements of international students.

By selecting a restricted sample of both students and officials, this study allocated sufficient time and resources to delve into the intricacies of international students' experiences. This approach enhanced the study's ability to capture the nuanced aspects of international students' housing experiences, resulting in richer and more detailed findings. Furthermore, this increased the likelihood of obtaining valuable insights into the unique challenges and perspectives of international students in relation to housing. The sample size utilized in the study is extensively discussed in the subsequent sections.

Number of participants

This study involved recruiting 15 participants from the selected postsecondary institution. Specifically, it included twelve (12) international students and three (3) institutional officials from the international student office. The international students group constitute nine (9) undergraduate students and three (3) graduate students from different racialized backgrounds. Limiting the sample size to 15 participants was driven by practical constraints, including time limitations allocated to the Master's program and budgetary considerations. Existing literature indicated that achieving data saturation typically required a sample size of at least 12 participants in a qualitative study (Braun & Clarke, 2016; Fugard & Potts, 2015; Guest et al., 2006). Therefore, the sample size chosen for this study ensured its adequacy in capturing the research objectives and generating meaningful insights warrants careful consideration.

Data saturation was monitored throughout the data collection process to assess whether additional participants are necessary to comprehensively understand the phenomenon under investigation. Data saturation occur when new information and themes ceased to emerge from the collected data (Saunders et al., 2018), indicating that the sample size sufficiently captured the breadth and depth of participants' experiences. This was a crucial factor in determining the sufficiency of the sample size. To ensure that the sample size was adequate to produce rich and nuanced findings, a comprehensive evaluation of participants' experiences was conducted to determine if data has reached a state of saturation. The forthcoming analysis entailed rigorous examination and interpretation of the data, guaranteeing that key insights are extracted and represented precisely.

Recruitment

The recruitment of participants was facilitated through a combination of social media, recruitment posters, and university newsletters or bulletins. The dissemination of information was facilitated by placing posters at strategic locations within Lakehead University, Thunder Bay campus, as well as distributing newsletters or posters via social media. This endeavor was carried out in partnership with international student offices and student associations.

Depending on the participation rate, a snowball sampling approach was used to recruit additional participants, build rapport with initial participants, and leverage their networks to encourage referrals and boost participation. Additionally, officials from the international students' office were approached via email and asked to participate in this study voluntarily. Implementing these recruitment approaches aimed to expand the cohort of international students and institutional officials interested in the study.

Interview Guide Development

To ensure the collection of comprehensive and contextually rich data, semi-structured interviews was administered to both international students and staff affiliated with the International Student Office at

Lakehead University, Thunder Bay campus. The interviews afforded a chance to investigate the various dimensions of international students' housing experiences and the measures undertaken to cater to their housing requirements. The interview questions targeting international students (see Appendix) was designed based on key themes, including their previous and present housing experiences, satisfaction levels, preferences, and the impact of housing on their self-reported physical and mental well-being. The focus of self-reported well-being was on students' subjective interpretations and perspectives concerning their health rather than any objective assessment of their well-being. By adopting a self-reported well-being approach, this study aligned with the qualitative research approach that aimed to investigate international students' subjective meanings and experiences. The open-ended questions have been carefully crafted to stimulate participants to express their personal perspectives and direct experiences about housing.

Similarly, the interview questions posed to university authorities (also included in Appendix) was focused on key themes, including housing support and accessible resources, security protocols, institutional regulations, collaborations, and prospects for improving housing experiences. Using open-ended questions yielded significant and irreplaceable knowledge regarding the university's approaches to efficiently tackling international students' housing difficulties and enhancing their general housing circumstances and well-being. The rigorous methodology in producing the interview guide guaranteed a comprehensive examination of the subject matter.

Data analysis

The interviews were recorded using Zoom and transcribed to conduct a thorough data analysis. The collected data was cleaned, and the participants' personal information was anonymized using pseudonyms and other identifiable removed to ensure confidentiality. The thematic analysis involved reading and memoing the data to ascertain significant themes and patterns, acknowledging the role of social interactions, shared meanings and the influence of social context in shaping participants' interpretations and constructions of knowledge of their experiences and their impact. This process involved constructing and interpreting narratives that reflect the diverse perspectives and meanings within the data.

In addition, the collected data were coded to identify meaningful phrases, considering the social construction of knowledge. This involved generating initial codes and subsequently refining them into more comprehensive themes that accurately captured the fundamental aspects of the data while acknowledging the influence of social interactions, cultural influences and context. Utilizing the NVivo qualitative analysis software facilitated the completion of this task, allowing for a more nuanced exploration of the social constructs present in the data.

The coded data analysis was conducted to explicitly examine the relationships between the discovered themes and the study objectives (Braun & Clarke, 2006). This procedure entails the recognition of the nuanced negotiations of meanings within themes and the recognition of the substantial impact of social interactions on the interpretations made by participants. Single-case patterns was used to identify similarities and differences in data, acknowledging the diversity of social constructs within the study. The explanation and interpretation of data were used to form a narrative connecting themes and sub-themes, which will facilitate drawing conclusions and implications for the research questions while considering the social constructivist perspective.

I thoroughly analyzed the interview transcripts to identify the main themes about how students see their housing arrangements affecting their well-being and academic achievement. The thematic analysis method scrutinized and combined codes from the interview transcript into all-encompassing themes that embraced self-reported physical and mental well-being, social integration, and intellectual performance. A thorough document analysis of international students housing augmented this. The second study topic was explored using an inductive and iterative coding technique to reveal students' main housing challenges. The codebook comprehensively recorded the diverse classifications of issues, their fundamental roots, and the subsequent ramifications. A cross-case display synthesized themes by case to evaluate patterns in the attributes and responses to various housing situations. Examining the interview codes using descriptive statistical techniques yielded quantifiable estimates of the prevailing challenges. To establish coping strategies for research question 3, codes were assigned according to the various forms of coping identified through the raw interviews using an inductive approach. The process of thematic analysis involves grouping codes to form overarching themes that represent the main coping techniques and their perceived effectiveness.

To enhance the interview data, this study also employed document analysis to acquire pertinent information on housing facilities for international students at Lakehead University, Thunder Bay campus. A comprehensive review and analysis of relevant institutional documents, such as those published by the institution regarding housing, will be carried out. The main objective of this analysis was to extract significant findings from these documents that shed light on the first research question pertaining to housing types available to international students and provide contextual viewpoints of housing-related policies and guidelines. The themes related to this research question were discerned by meticulously interpreting the documents. The document analysis served as a secondary, ancillary role to the interview methods utilized in this study. The same codes derived from the interview transcripts will be applied when coding the data from the institutional documents. This approach effectively merged the findings derived from the two-pronged approach of interviews and document analysis. Employing consistent codes connected the themes discovered across both qualitative techniques. This

will yield a comprehensive set of integrated themes and findings that incorporate insights gleaned from interviews with international students and relevant data obtained directly from institutional documents.

It is imperative to note that the analysis and understanding of the data presented was conducted reflexively, acknowledging the researcher's assumptions, biases and preconceptions (Denzin & Lincoln, 2011). This approach ensured a crucial examination of the researcher's perspectives and promotes an open-minded exploration of the social constructs and interpretations within the data, aligning with the principles of social constructivism.

The procedure of member-checking entailed disseminating the research findings and interpretations from interviews and document analysis to the participants to verify the accuracy and credibility of the study outputs (Birt et al., 2016). The technique was implemented through a feedback loop in which participants engage in dialogues regarding the created meanings and interpretations obtained from their interviews and document analysis. After the preliminary data examination from interviews, participants received summaries or selected portions of the findings related to their own data through electronic email. Participants were requested to evaluate the researcher's interpretation and analysis of key documents for document analysis. The aim was to guarantee that the analysis comprehensively and precisely reflects the meaning and importance of the documents, as perceived by the participants who took part in the study. These enabled individuals to critically examine the interpretations and verify the appropriate portrayal of their thoughts and experiences. Participants were allowed to provide feedback, address any misunderstandings, or contribute further insights.

Ethical considerations

Ethical approval was sought from the Research Ethical Board of Lakehead University. Canada's research ethics framework indicates that human research should be guided by three principles: respect for persons, concern for welfare, and justice (Government of Canada, 2019b). Respect for persons involves respecting the autonomy of participants in the study. This study acknowledged the inherent worth of persons and the importance of treating them with dignity and consideration, including those actively involved in the research process and those whose data is utilized. The study recognized that certain individuals may possess restricted autonomy due to many situations, including insufficient information or comprehension, external pressures, cognitive limitations, or mental health conditions. Consequently, this research endeavor implemented supplementary protocols, including the informed consent process, proxy consent and independent ethics review to safeguard the participants' interests and uphold their preferences, thereby demonstrating a dedication to accountability and transparency in the ethical execution of the study. This method is consistent with the fundamental principle of respecting individuals and expands its implementation to encompass people with varying circumstances and levels

of autonomy. In adherence to this principle, this study explained the purpose of the research, research objectives, and potential risks and benefits of the study to the participants. Furthermore, participants had the opportunity to seek clarification on ambiguous aspects of the subject matter and were able to withdraw from answering any questions during the data collection phase without incurring any negative repercussions.

The concept of concern for welfare pertains to safeguarding the well-being of individuals participating in a study against unanticipated risks or harm. Consistent with this principle, the present investigation does not only take measures to protect the confidentiality of participants' personal information by assigning pseudonyms but also protects them against potential distress that may arise during the discussion of this sensitive topic. Consequently, the participants were given warnings and access to support services to handle any potential emotional difficulties that may arise effectively. Moreover, voluntary informed consent was sought from participants who are information custodians to protect them from harm. This was done by providing prospective participants with all the requisite information needed to assess the risks and benefits associated with the study. Despite giving consent, participants retain the prerogative to withdraw from the study at any point if they perceive that their involvement in the study jeopardizes their well-being. In addition, participants' information was securely stored by the researcher for a fixed period to protect the confidentiality of the participants. The participant's data was securely saved in an electronic format, protected by a password, on a device owned by the researcher that is safe and encrypted, and only the researcher will have exclusive access to this device. Upon the expiration of the specified retention period, all electronic copies of the data had undergone permanent deletion to guarantee utmost confidentiality and data protection. The study provided participants with a compensation of \$20 for their involvement.

The notion of justice is founded upon the moral duty to administer fair and impartial treatment to every individual. The concept incorporates the fundamental ideas of equity, impartial treatment, and the equitable allocation of benefits and drawbacks. Within the framework of this study, the concept of justice assumed a significant role as it underscored the ethical basis upon which the selection of participants was established. The process of participant selection was in accordance with the notion of justice. The inclusion criteria employed in this study are aligned with the research aims. This methodology ensured that the procedure of selecting participants is marked by transparency, equity, and a clear fit with the study's aims. Nevertheless, a crucial factor to be considered to ensure justice and equity is the acknowledgement of existing power disparities. Imbalances within the researcher-participant interaction might give rise to possible abuse, hence causing harm to the participants involved. The research acknowledged the potential risk to justice and is dedicated to guaranteeing that participants are treated with dignity and independence and safeguarded from potential damage. The

study aims to operationalize the notion of justice by emphasizing the ethical framework for this research. This framework ensured fairness, transparency, and the protection of all individuals' rights, well-being, and dignity. The study aimed to establish a fair and equal research setting while also acknowledging power imbalances and ethical concerns. This approach was intended to ensure that the intrinsic worth of each individual is respected and upheld.

CHAPTER 4: FINDINGS AND ANALYSIS

This section presents the findings of the study. The results were based on thematic analysis derived from interviews with twelve (12) Lakehead University international students, interviews with three (3) representatives of the Lakehead University international student office authorities, and document analysis. International students were recruited based on their off-campus housing experience of at least one year and their willingness to share personal insights, while university officials were identified through snowball sampling to provide perspective on housing resources and support strategies.

This chapter discusses the themes and sub-themes derived from the thematic analysis, which is organized based on the related research objective of the study. This analysis resulted in the identification of seven themes. Among these, theme 5 (impact of housing on international students' wellbeing, academic performance and social integration emerged as the most prominent, with 97 coding references, followed by theme 2 (housing challenges of international students) with 64 references. Within theme 5, the impact of housing conditions on international students' wellbeing had 50 coding references, while the impact on social integration accounted for 25 references. In contrast, the least discussed themes were theme 1 (housing styles and available housing options at Lakehead University) with 22 references and theme 7 (recommendations and evaluation of support services for international students) with 12 references. These themes offer a comprehensive understanding of international students' housing experiences including challenges they face, factors contributing to their satisfaction and dissatisfaction with housing, the factors influencing their housing choices and the impact of housing in their well-being and academic performance. Additionally, the study explored students' coping strategies for navigating housing challenges and gathered recommendations for enhancing institutional support services.

By integrating interviews with international students and university staff alongside document analysis, the study provides a holistic view of housing conditions and their significance in shaping their well-being and academic outcomes of international students. The thematic framework captures the interconnected aspect of housing and its role in the overall student experience.

Objective 1: Exploring international students' housing experiences: housing types, challenges, preferences and satisfaction levels.

This section explores the international students' housing experiences, challenges, preferences and satisfaction at Lakehead University. The objective can be grouped into four themes, namely: housing styles and available options at Lakehead University, housing challenges of international students, factors contributing to the satisfaction or dissatisfaction with housing conditions and factors influencing international students' housing preferences.

Theme 1: Housing styles and available options at Lakehead University

This theme elaborates on Lakehead University housing styles and the type of accommodation international students reside in. These findings elucidate the preferences of international students at Lakehead University for off-campus accommodations, notwithstanding the university's provision of diverse housing options

Subtheme 1.1: Lakehead University housing styles

From the document analysis conducted, the on-campus housing arrangements are designed to address the diverse requirements of international and local students, encompassing privacy, academic and social support, a sense of community, and the provision of a safe and healthy environment for residents. Lakehead University offers a variety of accommodation options for international students, including residence halls, townhouses, and apartments. The document analysis revealed that these three distinct housing configurations provide specialized services for upper-year students and those transitioning from high school to tertiary education. For instance, townhouses offer the experience of off-campus living while retaining the convenience of on-campus accommodation and are reserved for upper-year students. Furthermore, apartments are allocated to upper-year students, with certain areas designated as wellness areas. These wellness areas provide quieter environments or alcohol-free zones, offering students the option to live in spaces that support a more tranquil and wellness-focused lifestyle with the residence. Lastly, residence halls are intended for both high school students transitioning into university and upper-year students. Residence halls provide students with numerous services, including accommodation and meal packages, to facilitate additional study and activity time.

Subtheme 1.2: Types of accommodation international students reside in

A substantial proportion of international students interviewed resided in private rental accommodations. Eleven interviewees reported residing off-campus in private rental units, either in shared accommodations or individual apartments. This circumstance reflects some participants' preference for independent accommodation over communal living spaces and a response to possible limitations for on-campus housing availability. For instance, interviewee 1 (undergraduate student) remarked:

"I used to be in a shared accommodation, but since last year, I have been in a private accommodation, although it is rented."

These diverse experiences indicate international students navigate housing options based on personal needs and circumstance. Normally, international students tend to favor on-campus residences, particularly upon their initial arrival in Canada but factors such as availability and preference can lead to a shift towards off-campus. Despite the undergraduate participants' initial preference for private rental units, a subset of international students subsequently opted for community or shared housing later on.

This shift illustrates the variety of housing options available off-campus in Thunder Bay, catering to the diverse accommodation requirement of international students. In contrast, domestic students generally are knowledgeable on local housing options and are less likely to face systemic barriers such as finding housing thus making their transition smoother than their international counterparts. These choices highlight how accommodation preferences may evolve from initial independence to a more community-oriented living situation as students settle into their academic and social routines.

Theme 2: Housing challenges of international students

This theme explores the diverse housing experiences of international students at Lakehead University based on their living situations. It focuses on key issues and challenges such as affordability, housing conditions, landlord-tenant relations, accessibility and shared living dynamics. It also highlights both positive and challenging aspects of the housing situation faced by international students.

Subtheme 2.1: Cost and affordability

One of the most crucial issues participants faced is the cost and affordability of housing. Many undergraduate and graduate interviewees emphasized that Thunder Bay is expensive and mentioned that they spend a significant portion of their income on rent. These testimonies underscore the widespread issue of housing affordability, where a substantial portion of personal income is allocated to accommodation expenses limiting resources available for other essential needs and long-term financial goals. Interviewee 7 (graduate student) stated:

"I spend roughly 60 to 70% of my income on rent each month,"

While interviewee 12 (graduate student) disclosed:

"Half of my income goes to rent."

Notwithstanding the financial constraints imposed by housing costs in Thunder Bay, an undergraduate participant reported incurring additional expenses for the utilization of supplementary utilities such as Wi-Fi. This circumstance further intensifies the fiscal pressure on international students, thereby constraining the resources available for them to fulfil other essential requirements. Interviewee 3 (undergraduate student) stated:

"Most of the utilities are included.... I have to pay an additional 20 CAD a month for Wi-Fi"

In comparison, the cost of on-campus accommodation surpasses that of off-campus housing options. These high housing costs can significantly impact international students' financial planning and overall budget allocation during their academic journey. The higher expenses associated with on-campus housing compels international students to seek alternative housing arrangements, potentially affecting

their campus experience and engagement with university life. For instance, interviewee 5 (undergraduate), who lived on-campus during their first two years, noted:

“On-campus housing was very pricey” which made it difficult to manage financially.

In contrast, their domestic counterparts are more familiar with the local housing market and have greater financial stability, are less likely to face the pressure when it comes to finding and maintaining suitable housing, even in the face of high housing cost in Thunder Bay.

Subtheme 2.2: Housing conditions and maintenance

Graduate and undergraduate students emphasized the inadequate hygiene practices of their cohabitants and their failure to maintain cleanliness in shared spaces. This highlights the challenges faced in shared accommodations where agreed-upon cleaning schedules are not maintained, leading to unsanitary living conditions. This situation frequently results in interpersonal tension among cohabitants and can significantly impact the overall quality of life within the shared living environment. Moreover, the lack of adherence to cleaning responsibilities may lead to health concerns and create an environment that is not conducive to optimal living conditions. Interviewee 10 (undergraduate student) described:

“We are going to clean the house every two weeks they do not clean at all.... and the house becomes very filthy.”

Also, an undergraduate student expressed dissatisfaction regarding the dilapidated nature of the facilities they lived in. The poorly maintained private rental [off-campus] facilities caused significant inconveniences for residents and highlighted the state of private rental built during 1970s. Similarly, interviewee 6 (undergraduate student) noted:

“The facilities were not too updated because the apartment was built during 1970s. The elevator used to get stopped.... Sometimes we used the staircase to go up even with a lot of luggage or groceries.”

This highlights the significant challenges encountered by international students in their daily activities, consequently leading to diminished satisfaction with the accommodation. Furthermore, there were reports of severe bedbug infestations attributed to the dilapidated condition of some dwellings, exacerbating the existing infrastructure deficiencies. These infestations not only caused significant discomfort for residents but also proved challenging to eradicate, necessitating extensive and costly pest control interventions. Interviewee 6 (undergraduate student) shared:

“There were a lot of bedbugs’ issues that took us a long time to solve.... It was so bad since it is an old home.”

These experiences emphasize the inconvenience of living in poorly maintained building with outdated infrastructure and the negative experiences international students face when housing does not meet basic living standards. Overcrowding was another prevalent issue among international students. Overcrowded shared housing often leads to a lack of privacy, personal space and reduced international students' overall satisfaction with their accommodation. Interviewee 12 (graduate student) commented:

“One person lives in the basement, one living on the first floor, and three of us living on the second floor. I still think there are too many people. I like 3 people; I think that is enough,”

Subtheme 2.3: Landlord-tenant relations

Several participants mostly undergraduate students reported instances of exploitation by their landlords, particularly in situations where landlords capitalized on the students' limited knowledge of local rental regulations. These exploitative practices frequently encompassed excessive rental charges and unilateral modifications to contractual terms without substantiation in the final stages of agreement. Participants' vulnerability was further exacerbated by the unfamiliarity with legal recourse options, making it challenging for them to advocate for their rights or seek appropriate assistance. Notwithstanding international students' inadequate knowledge of local housing rental regulation and legal recourse, their domestic counterparts are familiar with the local laws and cultural norms, making them more capable of navigating the housing market and advocating for themselves in difficult situations. Interviewee 1 (undergraduate student) stated:

“I got scammed. Sometimes people just take advantage of international students knowing that they would not know how much the decent cost is and they just charge ridiculously.”

Interviewee 10 (undergraduate student) echoed this sentiment, explaining:

“They [landlord] take advantage of people [international students] not knowing the rules and they change terms at the last minute.”

Another undergraduate participant also disclosed that their former landlords withheld their security deposits. The participant expressed frustration at the difficulty of recovering their deposit, despite having left the property in good condition. This experience highlights a common issue faced by tenants, where landlords may unjustly retain security deposits, leading to financial loss and emotional distress for renters. Interviewee 1 (undergraduate student) shared:

"I asked the landlord to return my security deposit because I am not living there anymore and he did not.... he had approximately 450 CAD."

On the other hand, a few undergraduate participants had positive experiences with their landlords. These contrasting experiences underscore the variability in landlord-tenant relationships. These international students reported a cordial relationship and mutual respect that existed between them, which led to a more harmonious living environment and increased satisfaction with the overall renting experience. Interviewee 6 (undergraduate student) and 10 (undergraduate student) reported supportive interactions with their current landlords. Interviewee 10 said:

"The people I am staying with are a family. They are very nice,"

Additionally, an undergraduate participant reported that their landlord was fair and assured them of following the lease agreement. This positive experience highlights the importance of transparent communication between landlords and tenants regarding the lease agreement. Such assurances can significantly reduce stress and uncertainty for renters, particularly with the current housing crisis in Canada. This demonstrates how responsible property management practices can contribute to a more stable and harmonious rental environment. Interviewee 9 (undergraduate student) mentioned:

"My landlord sticks to the lease agreement and she expects the same so anything that violates the agreement would cause a problem for both parties."

These contrasting experiences highlight the inconsistency in landlord-tenant relations for international students and also highlights the disparities between undergraduate students who are exploited than their graduate counterparts. Some landlords may be accommodating and understanding of the unique challenges faced by international students, while others may exploit especially undergraduate students unfamiliarity with the local housing laws. This variability can lead to significant disparities in living conditions, financial burdens and overall well-being among international student populations. The lack of standardized practices specifically tailored to international renters further exacerbate these inconsistencies.

Subtheme 2.4: Rental accessibility and restrictions

Finding and securing suitable rental housing proved to be a significant challenge for many participants. The challenges associated with identifying and obtaining affordable housing options underscore the current housing situation in Thunder Bay and the effort required to secure accommodation. This

emphasizes the labor-intensive nature of locating rental properties, particularly with regard to viewing multiple listings and potential landlords. This process entails extensive research, numerous property inspections, and ongoing communication with various parties. These narratives are quite different for domestic students, who, being more familiar with the local housing market and enjoying greater financial stability, do not face the same difficulties in securing and maintaining housing. Interviewee 1 (undergraduate student) remarked:

"It was really hard to find houses,"

Similarly, interviewee 10 (undergraduate student) described the process as labor-intensive, stating:

"It is a lot of work. If you want to find a good place you will have go through 20 to 30 listings."

However, some undergraduate and graduate participants were able to secure housing close to Lakehead University, which proved convenient for them. This proximity to campus not only reduced the commute but was financially advantageous for participants to reside near campus, which also facilitated their participation in university activities and access to campus resources. Interviewee 11 (graduate student) mentioned:

"My house is so near to the university. I think it is very convenient."

Interviewee 5 (undergraduate student) echoed the same sentiment, saying:

"Financially, it was a lot better to live close to the university."

Although some participants were able to secure housing in proximity to Lakehead University, several encountered transportation challenges due to the distance of their accommodation from campus. These difficulties were compounded by issues with Thunder Bay's public transportation such as infrequent services. The inadequacy of a reliable public transportation system impacted international students' ability to adhere to their schedules, which subsequently affected their overall satisfaction with the accommodation. Interviewee 10 (undergraduate) pointed out issues with the public transportation system stating:

"I feel like the schedule itself is not frequent enough. The buses are always late."

Subtheme 2.5: Shared living experience and roommate dynamics

Many participants lived in shared housing arrangements, where overcrowded housing situations were common concerns. These living conditions often resulted in limited personal space and privacy due to the living environment being congested. This situation resulted in heightened competition for shared resources, such as kitchen facilities, thereby affecting international students' capacity to maintain a conducive living environment. Interviewee 1 (undergraduate student) recalled:

“There were three of us staying in the basement with just one room and kitchen. Second year, I was living in a shared room which was congested.”

Similarly, Interviewee 12 (graduate student) commented:

“I think everything is good except there are five people.”

Roommate dynamics were also influenced by cultural backgrounds and played a key role in the experiences of participants. The social and cultural challenges international students face when living with roommates who may have different approaches to social interaction is complex. Consequently, these cultural differences lead to the preference for living with people from the same culture to foster harmonious coexistence within shared living spaces. Interviewee 3 (undergraduate student) reflected on their experiences living with a roommate, explaining:

“Roommates in Canada, I noticed are not too much open. It is not necessarily discrimination but people want to live with the people from the same background and culture as them.”

Furthermore, some participants reported conflicts and noise-related issues with roommates. These conflicts, often involving noise disturbances and the misappropriation of roommates' food, highlight the challenges of cohabitation in shared living arrangements, particularly when personal boundaries are not respected. Interviewee 6 (undergraduate student) explained:

“My food used to be stolen. One of my roommates used to bring his girlfriend and they used to make it a little bit noisy at night so I used to have some issues regarding noise and the food stolen other than that it was a little bit okay.”

In contrast, some students had positive experiences with their roommates, particularly when they shared similar academic or social backgrounds. These positive relationships often lead to lasting friendships

and enhanced the overall experience, demonstrating the potential benefits of communal living when compatibility and mutual respect are present. Interviewee 11 (graduate student) shared:

"I am so lucky; I have a very nice roommate and we are in the same major and the same age so I think this experience for me is very good."

Theme 3: Factors contributing to satisfaction or dissatisfaction with housing conditions

This section elaborates on international students' overall satisfaction or dissatisfaction with their current housing conditions. It examines their perspective on the quality of housing, and the factors that contribute to either a positive or negative housing experience.

Subtheme 3.1: Underlying drivers for satisfaction and dissatisfaction

Participants emphasized the significance of having some basic amenities with their accommodation. They asserted that basic amenities such as a refrigerator and bed are non-negotiable requirements for any accommodation. Such basic needs contribute to the participants' sense of comfort and well-being. Interviewee 11 (graduate student) expressed that, saying:

"The fridge and bed are the most important and I think if the house has these, I think it is enough."

Also, cleanliness and mutual respect and responsibility among housemates were essential for participants satisfaction with their accommodation. Maintaining a tidy living space and adhering to agreed-upon household rules foster a harmonious environment crucial for students. These factors were instrumental in enhancing the psychological or mental well-being and the overall housing experience of international students. Interviewee 12 (graduate student) mentioned:

"I need a clean housemate; and also, friendly because that will affect my mental well-being."

Similarly, Interviewee 2 (undergraduate student) echoed:

"I prefer to move into a rental where roommates are respectful, clean and agree to lay down rules whereby all roommates follow."

Furthermore, having social connections and a sense of community also contributed to housing satisfaction. Participants reported strong relationship with their roommates and neighbors due to social connections within their housing arrangement and with people living in their neighborhood. This

underscores the significance of social bonds and interpersonal connections in participants' satisfaction with their housing accommodation. Interviewee 11 (graduate student) shared:

"I think I have some social capital. I think I have some friends I can connect with such as my roommates."

Similarly, Interviewee 5 (undergraduate student) appreciated having social ties, saying:

"I have some connections and some friends who are living around this neighborhood."

Moreover, additional factors that contribute to the satisfaction of international students in their housing conditions include adequate living space, good housing conditions, peaceful neighborhood, responsive landlords, proximity to key facilities and provision of laundry facilities. Interviewee 2 (undergraduate student) stated in relation to responsive landlords:

"For instance, if the landlord answers your call and requests and is very respectful and follows the contract."

Additionally, in relation to good housing conditions, Interviewee 1 (undergraduate student) stated:

"There is no leakage.... so, it in good condition."

One of the main sources of dissatisfaction was the cost of rent. The high cost of living in Thunder Bay was a significant concern for many international students, as it limited their housing options and impacted their overall satisfaction of their housing arrangements. Interviewee 12 (graduate student) stated:

"I think the most important thing is the price."

Similarly, Interviewee 8 (undergraduate student) added:

"If the place is so expensive, I do not have the possibility to pay so I will not move into it."

Theme 4: Factors influencing international students' housing preferences

There are numerous key factors that guide international students in choosing their housing options at Lakehead University. These preferences include affordability, housing features, landlord relations, location, accessibility to essential amenities, neighborhood safety and social environment and

roommates' preferences. Understanding these preferences can help institutions and housing providers offer more suitable options that meet the needs of international students.

Subtheme 4.1: Affordability and housing features

The affordability of a rental unit is one of the most critical factors influencing housing preferences for participants. These responses suggest that students are very concerned about price when selecting accommodation. They are reluctant to exceed a certain financial threshold to secure a rental unit and expressed a preference for rent below 700 CAD. Interviewee 1 (undergraduate student) shared:

"A decent price should be charged. It should not be like 2000 CAD."

Interviewee 5 (undergraduate student) stated:

"The prices are very important as well. Somewhere, less than maybe 600 or 700 could be good."

In addition to affordability, international students stressed the importance of living in clean and well-maintained houses. International students considered the presence of molds and the level of cleanliness in their decision-making process regarding housing arrangements. The emphasis on cleanliness and maintenance reflects students' preference for comfortable and hygienic living environments that support their requirements. Interviewee 1 (undergraduate student) said:

"I definitely want a clean and good house,"

While Interviewee 10 (undergraduate student) mentioned:

"Obviously, no molds."

Subtheme 4.2: Landlord relations and rules

The relationship with landlords and the rules governing housing tenancy are significant considerations for participants when choosing housing. Two interviewed international students specifically mentioned that the first impression of the landlord played a significant role in their housing decisions. International students reported that the behavior and demeanor of the landlord, as well as the landlord's diligence in maintaining their rental units, were significant factors. Interviewee 6 (undergraduate student) noted:

"The first thing I will see is the landlord.... whether they are good or bad.

Interviewee 7 (graduate student) added:

"My first interaction is with the landlord so I normally like to see if the landlord or landlady is actually on top of taking care of the house but not creepy."

This demonstrates that international students prioritize landlords who are approachable, trustworthy and proactive in managing their property. Additionally, international students expressed a preference for reasonable tenancy rules that do not impose unnecessary restrictions. Students want clear, fair rules that ensure a harmonious living environment without feeling overly restricted by the landlord. They particularly value the guidelines that respect their lifestyle choices while maintaining a balance between personal freedom and collective responsibility. Interviewee 10 (undergraduate student) expressed concerns about landlords imposing strict or excessive rules, stating:

"If a landlords start making a bunch of nonsense rules, like putting things away by 10 pm or threatening fines for taking out the garbage late, that is a red flag."

Subtheme 4.3: Location preferences and accessibility to amenities

Proximity to essential amenities and the university is a top priority for participants. Many participants prioritize housing that was close to Lakehead University. Nine of the interviewed international students emphasized how crucial it was to live near campus. This preference for proximity to campus is a factor that enhances international students' satisfaction with their housing rental units, as it minimizes commute times and maximizes convenience for attending classes and accessing university resources. Interviewee 2 (undergraduate student) mentioned:

"Proximity to Lakehead University is a factor I consider very well when looking for a place."

Similarly, Interviewee 3 (undergraduate student) shared:

"I would prefer something closer to Lakehead University."

In addition to living near the university, some international students valued being close to essential amenities such as supermarkets and pharmacies. The proximity of the rental units to essential amenities increased the participants' interest in securing the accommodation, as it was within walking distance of

facilities such as supermarkets and pharmacies. This convenience not only saved time but also rendered the living arrangement an attractive option for students. Interviewee 2 (undergraduate student) explained:

"I have a supermarket and pharmacy near me that is within walking distance hence circumstances like these increase the chance of me being interested in the house."

For participants, the location of a neighborhood and its proximity to such amenities was important because it made daily errands more manageable, especially without personal transportation. This accessibility was particularly crucial for those who relied on public transit or walking as their primary means of getting around. The convenience of nearby amenities improved the overall quality of life of students, as they could easily access essential amenities within their immediate surroundings. Interviewee 7 (graduate student) remarked:

"A good neighborhood where things are accessible because as an international student, it is difficult for you to own your own personal transport."

Subtheme 4.4: Neighborhood and safety

Neighborhood safety was a crucial factor influencing housing choices for participants. Participants emphasized that Thunder Bay experiences a high incidence of criminal activity; consequently, they preferred to secure rental accommodations in relatively safe neighborhoods and communities. Additionally, individuals residing in the neighborhood were evaluated by participants prior to their relocation to the community. Interviewee 7 (graduate student) explained:

"I prefer relatively safe neighborhood especially considering Thunder Bay reputation for crime."

Similarly, Interviewee 8 (undergraduate student) emphasized:

"It is safe in the neighborhood. I want to see what kind of people live there if it is safe or not."

These comments highlight the importance of having a sense of security and assessing the safety of a neighborhood before moving in. Also, participants expressed a preference for housing in a quiet neighborhood, as noise disturbance from neighbors negatively affect their living experience. Furthermore, participants emphasized the equilibrium between vibrancy and tranquility in their

residential environments as a factor contributing to their enhanced positive living experience. These observations indicate that international students prioritize a balance between tranquility and dynamism in their residential environment to maintain an atmosphere conducive to living and studying. Interviewee 2 (undergraduate student) remarked:

"In the neighborhood, you still hear neighbors upstairs stomping the floor pulling their chairs or tables around or talking very loudly which is sometimes a little annoying."

Similarly, Interviewee 3 (undergraduate student) shared their desire for a balance between quiet and liveliness, stating:

"Have some sort of quietness but not fully quiet as a library at least."

Subtheme 4.5: Social environment and roommate preferences

Participants emphasized the importance of living with disciplined and responsible roommates. Participants emphasized the significance of disciplined roommates who are free from disruptive behavior or legal and safety complications. They reported that this factor is significantly more relevant than the affordability of living arrangements as a crucial element in enhancing their satisfaction with their housing. Interviewee 6 (undergraduate student) expressed concern over the potential legal and safety issues, stating:

"I have heard stories where roommates were doing drugs and the police came.... I used to get scared a lot thinking that might happen. The factor of the roommates is more important than the price."

This highlights the need for a secured and stable living environment, free from disruptive behavior or legal and safety complications to enhance satisfaction of students. Some international students preferred living arrangements that offered personal space, rather than sharing with multiple roommates. Interviewee 1 (undergraduate student) explained:

"I am at a stage where I want my own space so I do not want to be sharing with other people because sometimes it just gets too frustrating that you are sharing the house who are not keeping it clean."

Objective 2: Exploring the impact of housing on international students: Academic performance, social integration, physical and mental well-being

This section expounds on the effects of housing on the physical and mental well-being, academic performance and social integration of international students. This objective can be grouped into a theme, namely: impact of housing on students' well-being, academic performance and social integration

Theme 5: Impact of housing situation on student well-being, academic performance and social integration

Housing conditions affect the well-being, academic performance, and social integration of international students at Lakehead University. This theme includes discussions on how living arrangement influence social interactions, physical and mental health and academic success.

Subtheme 5.1: Impact on social integration

Participants reported that their housing situation enhanced their social connections. The participants emphasized the significance of both on-campus and off-campus housing in providing opportunities to expand their social networks and establish connections with individuals residing on campus and in the Thunder Bay area. Nevertheless, they asserted that off-campus housing facilitated enhanced social connections compared to on-campus accommodation, attributing this to the myriad of activities organized outside the university premises. Interviewee 10 (undergraduate student) shared:

"I engaged with people outside of school because they are from Thunder Bay, and I am pretty involved at school, which has helped me meet more people."

Interviewee 2 (undergraduate student) added that living off-campus allowed for more flexibility in socializing, stating:

"For students who live off-campus, there is much more connections than students who live on campus. This is because we are out of campus and thus it is much easier for us to decide on activities to do such as carpooling."

These international students found that their living arrangements offered opportunities to engage with both local residence and peers, which improved their social integration. However, a majority of the interviewees reported that their housing situations negatively impacted their social integration. Six international students indicated that living off-campus or in less accessible areas reduced their opportunities for socializing. Interviewee 2 (undergraduate student) mentioned:

"Some of my friends forgot to invite me because most of them live on campus. This has affected my connection with other students."

Similarly, Interviewee 4 (undergraduate student) added:

"I am living off-campus. Now, the people around me are more adults with kids and stuff like that. So, I cannot really go out and meet with people in the same age groups as me as opposed to staying on campus."

These experiences show that participants had less social engagement because they lived far away from campus and their social environment did not match their peer groups.

Subtheme 5.2: Impact on well-being

Some participants experienced adverse effects on their physical well-being. Participants emphasized that inadequate maintenance of housing facilities, such as broken windows and poor insulation systems, particularly during the winter season, negatively impacted academic activities. Additionally, during the summer season, participants reported a lack of air conditioning, which detrimentally affected their physical well-being. This underscores the impact of substandard housing conditions on physical well-being and academic performance if left unaddressed. Interviewee 2 (undergraduate student) mentioned:

"I had some issues with the broken windows and the installation system in my last rental, I got sick multiple times throughout the winter and that made me decline a lot when it comes to studies."

Similarly, Interviewee 12 (graduate student) also noted discomfort during the summer, stating:

"It is not good for my physical well-being because in the summer it is hot and there is no air conditioning so I think is not good for my physical well-being."

However, several participants noted that their current housing conditions had no significant impact on their physical well-being. These participants reported access to superior facilities, such as adequate heating systems, therefore with reduced risk of illness. This highlights the importance of adequate housing facilities for the physical well-being of students. Interviewee 2 (undergraduate student) shared:

"I live in a more stable living conditions with the warming system working effectively so I do not catch a cold or get sick as I used to do in past winters."

Several participants reported that their housing situations positively impacted their mental health by providing a sense of peace and freedom. Participants emphasized that the freedom and control in selecting their roommates because of their housing arrangements, particularly off-campus accommodations, positively influenced their mental well-being, as they were able to secure their own living arrangements with preferred cohabitants, an option not available in on-campus housing. Furthermore, they highlighted that having personal space and compatible cohabitants had a positive impact on their mental well-being. Interviewee 1 (undergraduate student) shared:

"It feels like home when I come home because I have my own peaceful space,"

Interviewee 10 (undergraduate student) added:

"My current housing situation has positively affected my mental health because the family I live with are very nice."

Interviewee 8 (undergraduate student) mentioned that living off-campus offered them more independence:

"Yes, because in residence I could not choose who I was going to live with but now I think that has changed I think that helps me mentally."

Participants emphasized that the cleanliness and natural elements, including plants, in their housing environment significantly influenced their mental well-being. The respondents articulated the importance of cleanliness and how activities such as cultivating plants in their living arrangements contributed positively to their psychological state. Furthermore, the affordability and proximity of housing to essential amenities were found to positively impact the mental well-being of participants. Interviewee 1 (undergraduate student) mentioned:

"Cleanliness is very important to me [my well-being]."

While Interviewee 7 (graduate student) appreciated having space to grow plants, saying:

"I love plants in the house so being able to create areas in the house where I can grow plants contributes to my mental well-being."

Interviewee 12 (graduate student) stated:

"Price will affect my mental well-being"

Interviewee 3 (undergraduate student) explained that living in better housing closer to necessary amenities improved their mental well-being, saying:

"Yeah, a big yes."

On the other hand, some participants experienced negative effects on their mental well-being. Participants reported experiencing feelings of isolation and loneliness due to their inability to interact with peers and friends as a result of their housing arrangements. These experiences among international students underscored the significance of social connections and networks, as well as their impact on the mental well-being of international students. Interviewee 2 and 3 expressed feelings of isolation and loneliness. Interviewee 2 (undergraduate student) explained:

"I suffer from loneliness a lot because I am finding it difficult to interact with most of the people that I know,"

Interviewee 3 (undergraduate student) shared:

"Mentally, just not having people who like to connect or maybe hang out with you has affected me mentally."

Subtheme 5.3: Impact on academic performance

Housing conditions also influenced participants' academic performance, particularly regarding access to a conducive study environment and the proximity of their accommodation to campus. Participants residing in substandard housing conditions and far from campus experienced difficulties in concentrating on their studies due to tardiness or absenteeism, especially during the winter period. Interviewee 1 (undergraduate student) shared:

"Earlier it did because I was not in a good housing condition".

Similarly, Interviewee 10 (undergraduate student) mentioned:

"I could walk for half an hour to school during the wintertime.... I have been late or missed class."

Conversely, participants with access to private study spaces reported fewer challenges regarding academic performance. Participants expressed their satisfaction with having a personal space for academic activities, and their housing accommodations, which were quiet and free from distractions, positively influenced the academic performance of students. These students reported higher levels of concentration and productivity, attributing their improved academic outcomes to conducive learning environment provided by their private study spaces. Interviewee 7 (graduate student) stated:

"I think it has affected it positively. I feel like housing really helped me with my thesis a little bit to actually sit and get work done."

Similarly, Interviewee 2 (undergraduate student) explained:

"Also, I love the fact that there is a lot of silence as this gives me the freedom to study in any area of the house devoid of a lot of distractions."

Objective 3: Coping strategies of international students in navigating housing challenges in Canada

This section elaborates on key coping strategies international students used to navigate housing challenges and evaluate their effectiveness. The objective can be grouped into a theme, namely: coping strategies for navigating housing challenges

Theme 6: Coping strategies for navigating housing challenges

This theme explores coping strategies that international students at Lakehead University employ to manage housing challenges that they encountered in Canada. It also delves into the effectiveness of the strategies that they employed in addressing their housing challenges. The findings under this theme addresses

Subtheme 6.1: strategies employed to navigate housing challenges in Canada

Many international students relied heavily on social media and other online platforms to find housing. Nine of the interviewed international students shared that they used platforms like Facebook marketplace, Craigslist, Kijiji and Rent Panda to navigate housing challenges. These digital platforms

provided a convenient and accessible way for students to search for accommodation, compare prices and connect with potential landlords. Interviewee 10 (undergraduate student) mentioned:

“Craig’s list, Facebook marketplace, Rent Panda.... A lot of them lately have been through Facebook marketplace.”

Also, Interviewee 11 (graduate student) added:

“We have a chat group.... I found the person who wanted to rent his house on WeChat.”

In addition to online platforms, some participants utilized word-of-mouth communication from friends and their social connections. These participants approached other students and friends and enquired about their accommodation or relied on verbal recommendations as a strategy for securing housing in Thunder Bay. This strategy emphasized participants ability of relying on their personal network for support in navigating housing challenges. Interviewee 9 (undergraduate student) explained:

“I would approach the student and ask them about their accommodation.”

Similarly, Interviewee 10 (undergraduate student) mentioned:

“I found through word of mouth. I am talking about somebody who referred me on a previous occasion. “

Similarly, cultural communities played a significant role in providing support and served as a source of social networks that students could access when facing challenges in securing accommodation. These communities were described as highly beneficial in assisting students to obtain acceptable accommodation in Thunder Bay. Interviewee 2 (undergraduate student) explained:

“I am Latina, so the Latin American community in Thunder Bay has been really helpful.”

Several participants utilized practical self-management strategies, including establishing budgets and maintaining motivation, as approaches to address housing challenges. They articulated adhering to a specific housing budget and sustaining motivation during periods of difficulty in securing accommodation as methods employed to mitigate housing-related stress in Thunder Bay. Interviewee 10 (undergraduate student) shared a strategy for staying within their housing budget stating:

"I have a budget. I start with the lower budget and I try to find everything that is within that budget."

Interviewee 1 (undergraduate student) explained:

"I kind of motivated myself as well, just to say it is going to get better."

Participants emphasized the efficacy of communication in securing housing. They asserted that professional communication with landlords to enquire about rental properties was effective in obtaining accommodation. This approach portrays prospective tenants as serious candidates, as they provide their requisite details to potential landlords. This highlights their willingness and preparedness to secure the residential unit. Interviewee 5 (undergraduate student) shared:

"It is been effective because each time I send a text I do not just say, is it available? I ask you to know we are a group; you know we are organized, quiet and professional."

Furthermore, an additional interviewee reported that the strategy they employed to address their housing challenges provided them with a reliable contingency plan. Participants articulated the efficacy of maintaining a dependable network of friends and family to make the navigation of housing challenges less stressful. These robust social networks can serve as a source of emotional support for individuals encountering difficulties in securing accommodation in Thunder Bay. Interviewee 1 (undergraduate student) noted:

"It was definitely effective in terms of knowing that you have that support system and backup system with you,"

A participant reported that their early search efforts and strategic utilization of online platforms contributed to a reduction in the time expended on finding accommodation. Based on their experiences, they asserted that initiating the search for accommodation early was an effective strategy in securing a place of residence especially using online platforms. Interviewee 4 (undergraduate student) shared:

"We started looking for this place kind of early December. Our search around that time was very effective. It was helpful for us."

Nevertheless, participants reported instances where online platforms such as Kijiji and Facebook Marketplace, which were extensively utilized by international students to gather information about available housing, were not always entirely reliable. This phenomenon necessitates that undergraduate and graduate students undertake due diligence to verify the authenticity of the rental unit before making payment to secure the accommodation. Interviewee 8 (undergraduate student) stated:

“Facebook was not 100% reliable, but it was helpful to visit the house to certify whether it was real or not,” emphasizing the need to verify listings before committing.

Objective 4: Recommendation for enhancing housing experiences and well-being of international students: Insights from Lakehead University

This section explores the recommendations for enhancing housing experiences and well-being of international students. This proposed recommendation can be grouped into a theme namely: recommendations and evaluation support services for international students.

Theme 7: Recommendation and evaluation support services for international students

This section explores the recommendations provided by Lakehead University International Students' Office to enhance international students housing experiences, as well as an evaluation of the current support measures offered by Lakehead University and local authorities.

Subtheme 7.1: Enhancing students experience through on-campus living and advocacy for affordable housing

University staff 2 emphasized the importance of on-campus accommodation as a means to enhance students' connection to the university, ensure a supportive environment, and facilitate participation in activities and events. The cumulative support, activities, and events provided by the university through its housing options facilitate students' development of a sense of belonging and community, thereby enhancing their engagement in university life. University staff 2 explained:

“We really recommend living on-campus, students who do live on-campus definitely feel more connected to the university, feel more supported and are more involved with the activities and events.”

In addition to fostering connectedness, school authorities suggested that on-campus accommodation should be prioritized for first-year students. They asserted that for first-year international students to have a significantly improved experience in Thunder Bay, they should reside on-campus owing to their lack of an established social network in the area. This recommendation focuses on easing the transition

into the university life for first-year international students ensuring that they have immediate access to university resources and social support networks in their initial year. University staff 3 remarked:

“What I have seen is students who live in residence in their first year usually have a far better experience especially if they do not know anyone else here.”

One of the innovative suggestions made by the school authorities was the development of student-landlord matching platform. The international student office commended the innovation of former students, advisors and recent graduates in developing an application or platform to address the disparity between landlords and tenants, ensuring sufficient checks and balances for both parties to alleviate the stress associated with securing accommodation. This highlights the research Lakehead University is conducting regarding the housing crisis in Canada to address the accommodation needs of their students. University staff 2 shared details of a project that aims to bridge the gap between students and landlords, stating:

“One of our past students, advisors and recent graduates who just graduated last week from Lakehead University has been working on a project to kind of bridge the gap. I should say almost like an app or platform where you will work with landlords and with students and this kind of matching agency that is going to bet the students and make sure everything is okay and then check the apartment over so then there is less stress on both ends.”

Another key recommendation was for the university administration to advocate for affordable housing policies. The authorities at Lakehead University are actively working to ensure that affordable housing policies are implemented in Thunder Bay to enable students affiliated with the university to secure affordable rental accommodations. This recommendation recognizes the financial challenges faced by international students and urges institutional action to address the affordability of international students housing through policy reforms. University staff 3 suggested that:

“The university as a whole, meaning the upper administration and other people, those that are in power to try and push those policies [affordable housing policies].”

This statement underscores the university's administration actively engaged in advocating for affordable housing through lobbying efforts, forming partnerships with local authorities and supporting policy initiatives that address students' housing affordability.

Subtheme 7.2: Evaluating the effectiveness of support and intervention measures for international students' needs

All the interviewed school authorities emphasized the importance of gathering feedback from international students as the main evaluation tool for assessing the effectiveness of housing support and intervention measures. This feedback is typically obtained from international students through surveys, particularly in instances where students are unable to attend webinars. This feedback allows the university to identify areas of success and areas where improvements are needed, ensuring that the support services are responsive to students' needs. This demonstrates the multi-faceted approach through which Lakehead University obtains feedback from students to ensure that their housing needs are met. University staff 1 shared:

"We have received great feedback from our students. Some students unfortunately if they do not get in touch with us or if they do not attend some of these webinars miss out on some decisions."

Similarly, University staff 2 elaborated:

"We definitely do satisfaction surveys and we take feedback from students.... each year we will survey international students."

Lakehead University employs an additional approach to evaluate the effectiveness of its housing support services by sharing successful stories from international students. These illustrative instances provide evidence that demonstrates how support services are making significant positive impacts on the experiences and outcomes of international students. University staff 2 mentioned:

"I have heard like 5 successful stories where students have come to me and said I think something is wrong about this situation, do you agree with me?"

Lakehead University conducts numerous individual appointments throughout the academic year to address housing concerns with students. These one-on-one sessions facilitate personalized support to meet the specific requirements of individuals. During these consultations, additional insights are provided to students regarding the housing issues they encounter, and interventions are implemented to address the diverse needs of the student population. University staff 3 noted:

"We have hundreds and hundreds of one-on-one appointments in a year.... we will discuss housing issues or things or challenges that have come to our attention."

Pre-arrival education sessions constitute a significant instrument for equipping international students to effectively navigate the housing landscape. This resource, provided by the university to incoming international students, furnishes essential information pertaining to accommodation and other crucial details. The provision of this information instils in students the requisite confidence regarding their approach to housing matters prior to their arrival in Canada. University staff 2 explained:

"All the education and these pre-arrival sessions or the information in my welcome kit helped them have the confidence to know when something is wrong."

Furthermore, the university disseminates weekly news updates to ensure international students remain informed about housing webinars and other pertinent information. These updates are crucial for communicating the latest developments and relevant webinars, thereby enabling students to remain apprised of housing-related matters that address their diverse needs. University staff 1 stated:

"We have news that goes weekly and we put these webinars and information in there for students."

Summary of findings

This section synthesizes the key findings in relation to the research objectives and questions, highlighting the interconnectedness of housing experiences, physical and mental well-being and coping strategies. The thematic analysis revealed insights derived directly from participants' experiences, providing a nuanced understanding of international students' housing challenges and preferences.

The findings of this study are as follows:

1. Participants described a clear progression in their housing preferences over time. On-campus housing was commonly chosen during the first year due to its ability to ease the transition into university life and foster a sense of community. However, as students advanced in their academic journey, off-campus housing became more prevalent. This shift was largely driven by concerns about the affordability and a desire for greater personal space.
2. Participants highlighted that affordability and maintenance issues presented significant challenges. Many students struggled with high rental cost, substandard living conditions and unresolved maintenance problems which negatively impacted their housing satisfaction

3. Satisfaction with housing was closely tied to the availability of basic amenities, proper maintenance and responsive landlords. Conversely, dissatisfaction often stemmed from hygiene problems in shared spaces, unaddressed repair needs and high cost of housing.
4. Participants consistently identified affordability, proximity to campus, safety and access to essential amenities as the primary factors influencing their choices. Cleanliness, spacious spaces and a quiet environment were also key considerations.
5. The impact of housing on students' well-being and academic performance was profound. Those in comfortable housing experienced less stress and were able to focus more effectively on their studies, while those in substandard housing reported increased stress, illnesses and academic disruptions. Proximity to campus also played a crucial role in fostering social integration. Students living closer to campus engaged more frequently in university events, whereas those farther away felt isolated and disconnected.
6. Participants navigated housing challenges utilized online platforms such as Facebook Marketplace and Rent Panda. They also relied on personal and cultural networks as well as budgeting. Institutional support from Lakehead University, such as pre-arrival sessions and legal assistance also played a vital role.
7. International Students Office at Lakehead University offered several recommendations to improve housing experiences for international students. Suggestions included encouraging on-campus housing to redress stress for first-year students, developing a student-landlord matching platform to streamline housing searches and advocating for affordable housing policies to alleviate financial burdens.

These findings demonstrate a complex interconnectedness between housing experiences, physical and mental well-being and the coping strategies that international students employed. Housing conditions not only influenced international students' physical and mental health but also shaped their ability to integrate and perform academically. These findings will be critically analyzed in the light of existing literature and will explore how these findings align or deviate from prior research and how they contribute to the understanding of international students' housing experiences.

CHAPTER 5: DISCUSSION AND CONCLUSION

The primary objective of this study was to examine the housing experiences of international students in Thunder Bay, Ontario, and explore how housing conditions affect their well-being, academic performance and coping strategies to deal with housing challenges. The findings presented are based on qualitative interviews and thematic analysis, revealing a complex relationship between housing experiences and the various facets of international students' life. This discussion synthesizes the result with reference to existing literature, critically evaluates the extent to which the research question was answered and provides suggestions for future research.

Impact of housing types and conditions on international students' well-being and academic performance

The relationship between housing types, conditions and the well-being and academic performance of international students is a crucial aspect of student life. Housing plays a vital role in providing stability, mental and physical well-being and access to resources that enhance academic success. The study reveals that different housing types (on-campus and off-campus) have varying effects on international students' experiences, with each offering a distinct advantages and challenges that shape their ability to thrive both academically and socially.

International students who initially chose on-campus housing expressed satisfaction due to the proximity to academic resources such as classrooms and the opportunity to engage in university-organized social activities that helped build supportive networks. These factors contributed to their social well-being and academic performance, as on-campus housing provided a structured environment that facilitated easier access to academic support and resources. The availability of university-provided housing also helped international students transition into their new academic life more smoothly by offering a community that eased social integration. These findings align with the literature which suggest that living on-campus support academic success by fostering students' engagement in campus life and reducing commuting time (Allen & Farber, 2018; Coutts et al., 2018; Taylor & Mitra, 2021). However, as students progressed through their studies, many opted for off-campus housing, primarily due to affordability concerns, despite the acknowledged benefits of living on-campus. This transition often led to new challenges, including longer commutes, fewer social opportunities and reduced access to support systems, all of which detracted from their academic engagement. While the physical distance from campus made it harder for international students to maintain strong ties with university resources, thus impacting their academic performance, some students found positive aspects in their off-campus living arrangements. Students who had positive experiences with living good housing situation, good roommates and support from friends reported an enhanced sense of community and emotional support,

which helped to offset some of the stressors associated with being further from university facilities. These supportive dynamics contributed positively to their academic performance.

The conditions of housing were another factor shaping international students' experiences. Those living in well-maintained housing reported better well-being and fewer disruptions on their academic routines, as stable housing conditions allowed for greater concentration on studies without the constant worry of housing issues. On the other hand, international students residing in poorly maintained or overcrowded housing experienced significant stress, both physical and mental health. Physically, issues such as inadequate heating and poor ventilation left participants more vulnerable to illnesses, particularly during the colder months, when they often struggled with prolonged sickness. Previous research has shown that poor ventilation and energy-inefficient housing, regardless of the population, can lead to increased exposure to biological pollutants, damp conditions and cold indoor environments, all of which have adverse health effects (Holden et al., 2023). Mentally, the stress of dealing with persistent housing problems such as pest infestation and outdated infrastructure created a sense of anxiety and stress, further exacerbating their overall well-being. Research has shown that poor-housing conditions such as pest infestation, can elevate levels of anxiety and stress negatively impacting mental health across different populations (G. W. Evans, 2003b; Rollings et al., 2017b; Shah et al., 2018). This dual strain of physical illness and mental stress impeded their academic focus, as participants found it difficult to concentrate on their studies while coping with the discomfort and instability of their living situations. Participants noted that these conditions often resulted in absenteeism and a diminished ability to engage fully in academic activities. This reflects the broader literature that consistently links poor housing conditions to negative physical and mental health. For instance, Baker et al. (2017) found that overcrowding was linked to increase anxiety and mental stress due to the lack of personal space and constant exposure to stressors. Swope & Hernández, (2019) further demonstrated that poor housing conditions, such as poor ventilation and exposure to hazards such as asbestos and mold can significantly contribute to negative physical health outcomes. These negative health outcomes can also impact academic success, as Haverila et al. (2020) found that housing related stress impairs students' concentration and motivation to continue their studies which ultimately affects their academic performance.

Satisfaction with housing was closely tied to the condition and quality of living environment. International students who were satisfied with their housing conditions due to good landlord-tenant relationship, affordable rent or clean and stable living conditions reported a higher ability to focus on their academic responsibilities without the distraction of housing related stress. In contrast, international students facing high rental costs, unresponsive landlords or unsanitary living environments had greater difficulty concentrating on their studies. Issues such as overcrowding in shared housing or

poor maintenance created an additional layer of mental and physical stress, further detracting from international students' ability to perform academically. This findings align with literature by Sotomayor et al. (2022) who highlights the importance of adequate housing for improving students well-being and academic focus. Furthermore, Haverila et al. (2020) found that housing-related stress, such as that experienced in overcrowded or poorly maintained accommodations, negatively impacted students' concentration and motivation, leading to poorer academic performance. These findings confirm the critical role that stable and comfortable living environments play in supporting academic success.

Housing challenges faced by international students and their impact on physical and mental well-being

According to the UN-Habitat, (2020) definition, housing cost that exceeds 30% of a person's gross income are considered unaffordable. Statistics Canada, (2022a) also notes that around 21% of Canadians allocates over 30% of their income to housing. Yet, many international students are spending between 60 to 70% of their income on rent which is double the recommended limit. Pottie-Sherman et al. (2023) critiques the shelter-income ratio as the standard to measure housing affordability of international students, as many are unaware of their monthly income or rely on remittances from abroad. However, students without financial support must often cover for high rental cost by working one or more jobs (Sotomayor et al., 2022). This stark contrast highlights the severity of the financial burden on these students, suggesting that the recommended cap on housing cost is far from achievable for many in this population. This financial strain leaves little room for other essential expenses often forcing students to make difficult choices that impact their physical and mental well-being. Financial stress caused by high rent also contribute to mental and physical challenges such as illness and stress, detracting from international students' ability to maintain a healthy lifestyle (Rolfe et al., 2020; Turunen & Hiilamo, 2014; Waldron & Redmond, 2017).

Another significant housing issue is poor maintenance of housing of international students, including inadequate heating, pest infestations and outdated infrastructure. These issues are particularly challenging during the winter months, when international students reported frequent illnesses due to the lack of proper heating systems. The physical challenges caused by these conditions are compounded by the mental stress of living in substandard environment, leading to decreased overall well-being (Baker et al., 2017; Pevalin et al., 2017; Singh et al., 2019; Swope & Hernández, 2019). Additionally, literature indicates that overcrowding is a common issue among student populations in Canada, particularly those facing housing affordability challenges (Calder et al., 2016b; Sotomayor et al., 2022). These findings are consistent with the experiences reported by participants in this study, who described being compelled to cohabitate in small, cramped spaces with multiple roommates which contributes to a lack

of privacy, social conflicts and heightened stress, further deteriorating international students' mental health (Mangrio & Zdravkovic, 2018).

Landlord exploitation also emerged as a key challenge. Several international students shared experiences of being overcharged for rent, having their security deposits unfairly withheld, or dealing with landlords who failed to address maintenance issues. This exploitation created feelings of vulnerability and helplessness, which exacerbates international students' mental health struggles, leading to higher levels of anxiety and frustration. This findings complements literature which highlights the excessive exploitation of international students by landlords through exploitation and the use of illicit practices in Canada (Sotomayor et al., 2022).

The cumulative stress from poor housing conditions and financial strain has a profound impact on international students' physical and mental health. Many international students living in unsanitary or unsafe environments report ongoing illness, feelings of anxiety and isolation, which hinders their ability to relax, focus on their studies or participate in campus life. This sense of isolation and stress often results in social withdrawal, leading to feelings of loneliness and depression. Ultimately, these challenges not only impact international students' physical and mental well-being but also their academic performance. Participants reported that living in poor-quality housing report difficulties concentrating on their studies due to the ongoing stress of managing their housing situation (Kono et al., 2015; Ts et al., 2017). In contrast, those in stable, well-maintained housing with responsive landlords are better able to focus on their academic work and perform well. These findings suggest a clear link between housing conditions, students' success, pointing the need for improved housing support and more affordable housing options for international students.

Coping strategies employed by international students to overcome housing challenges

International students encounter a range of accommodation challenges, and their approaches to addressing these difficulties are multifaceted. These coping mechanisms range from leveraging social networks and digital tools to relying on institutional support and personal resilience. The effectiveness of these strategies depends on the specific challenges international students encounter, such as affordability, poor maintenance, landlord exploitation and overcrowding.

A common coping strategy by international students to overcome housing challenges is leveraging social networks. Participants reported that they rely on established connections with friends, peers, or members of their cultural community to find housing and mitigate the emotional toll of housing stress. This finding is consistent with the literature, which posits that connections with friends and peers facilitate in finding housing as well as mitigate the emotional burden of housing-related stress.

(Kristiana et al., 2022). These networks provide practical help such as housing recommendations and emotional support, alleviating feelings of isolation. Ethnic communities, in particular, often play a crucial role in helping international students navigate landlord negotiations or find better housing options, offering guidance based on shared language, cultural norms and past experiences. For instance, the Latino cultural group located in Thunder Bay assisted one participant in navigating rental processes and securing accommodation. This shared cultural understanding fosters trust and make it easier for students to seek help when navigating unfamiliar housing markets. These social support systems are critical for international students, especially those unfamiliar with the local housing market or tenant laws and align with literature emphasizing the importance of social support in adjusting to new environments.

Another frequently used strategy is the use of online platforms such as Facebook marketplace, Kijiji and Rent Panda, which allows international students to access housing listings and compare options. These platforms provide a convenient and accessible way for international students to search for housing, offering a wide array of choice in terms of price, location and features. The ability to filter the listings by specific criteria helps international students streamline their search, making it easier to identify options that align with their budget and proximity to key amenities. While convenient, these platforms come with risks, such as encouraging scams or inaccurate listings, making it necessary for international students to verify listings in person or seek recommendations from trusted peers. Despite these challenges, participants reported that online platforms remain a key tool for international students lacking extensive social networks in Thunder Bay, demonstrating how online housing platforms aids international students in navigating tight markets. This finding aligns with literature indicating that online platforms are a vital asset for international students navigating tight housing markets (Sotomayor et al., 2022).

In addition to social and digital strategies, institutional support from Lakehead University plays an important role in helping international students manage housing challenges. The university provides pre-arrival webinars, housing information kits and legal resources through the Lakehead Clinic to help students understand tenant rights and avoid exploitation. These resources are valuable in equipping international students with essential information and guidance. Moreover, the availability of legal assistance provides reassurance and facilitates the mitigation of stress, particularly for international students unfamiliar with Canadian housing legislation. However, Institutional support, while beneficial, was not always enough to address the deeper of issues affordability and poor housing conditions in the local market while institutional support addresses certain immediate needs, more entrenched issues such as high rental costs and poor housing conditions continue to pose challenges that extend beyond the scope of the current university resources (Fang & Van Liempt, 2021).

Many international students also rely on personal resilience and budgeting strategies to manage their housing difficulties. In some cases, international students prioritize rent over other essential expenses, which allows them to maintain their housing but often at the cost of their mental and physical well-being. This type of housing cost trade-off can lead to significant negative outcomes. For example, Shamsuddin & Campbell, (2022) found in a United States based study that households burdened by high housing costs especially those spending over 50% of their income on rent are more likely to experience food insecurity, struggle to pay bills and face barriers to accessing medical care. Such financial strain forces individuals to choose housing cost over other health-promoting necessities (Kushel et al., 2006; Levy & DeLeire, 2008; Ma et al., 2008), potentially leading to high levels of stress and emotional strain (Grewal et al., 2024). The cumulative effects of these pressures pose significant health risks as high housing-related expenses can compromise participants' overall well-being by undermining their ability to afford essential goods and services.

The effectiveness of these coping strategies varies. However, social networks and community support have proven to be some of the most effective tools in helping international students secure housing and manage their emotional strain of their housing challenges. Similarly, participants who verified online listings in person and sought peer recommendation had more success in securing appropriate housing compared to those who relied solely on digital platforms.

Limitations

A primary limitation of this study is the absence of detailed demographic data, such as gender identity, marital status, socio-economic status or length of stay in Canada, which constraints the ability to examine the housing experiences of international students through an intersectional lens. Without this information, it is difficult to assess the overlapping social identities may shape or compound the housing challenges faced by participants. Also, the relatively small size, which, while adequate for reaching thematic saturation, limited the ability to analyze intersectionality or compare the experiences across different demographics.

Future research directions

While the study successfully addressed the research questions, some areas were not fully explored. Although the study illuminated the financial and emotional burdens associated with poor housing, it did not deeply investigate how these factors interact with international students broader academic and social experiences over time. A longitudinal approach could offer insights how housing conditions and experiences change over time throughout a student's academic program. This would provide a more nuanced understanding of the long-term effects of housing crisis on international students' well-being and academic performance.

Additionally, research on international students' housing experiences in different regions of Canada or other countries could offer valuable comparative data. It would be especially useful to examine how local markets, university support systems and legal frameworks impact international students in varying ways depending on the region.

Furthermore, future studies should incorporate an intersectional analysis, considering how factors such as gender, race and socio-economic status and immigration status influence the housing experiences of international students. This would help identify specific vulnerabilities and allow for more targeted interventions to address the unique challenges faced by different subgroups.

Future studies could explore the specific roles that cultural and ethnic community groups play in assisting international students in navigating the rental housing markets. This research could examine the influence of cultural values and community-based networks on housing decisions and also examine the extent by which these support services fill the gap left by institutional housing services and whether their effectiveness varies across different cultural or geographic context. Understanding these dynamics would offer valuable insights for postsecondary institutions and policymakers seeking to improve the housing outcomes and support services for international students.

Lastly, future research should evaluate the effectiveness of institutional support systems and government policies aimed at addressing housing challenges for international students. This could include analyzing how universities might better support students through affordable housing initiatives and other innovative strategies designed to reduce housing insecurity.

Conclusion

The housing crisis in Canada presents significant challenges for international students. With rising housing cost and limited availability, many international students face financial strain, often spending over 30% of their income on rent. This burden disproportionately affects their physical and mental well-being, as they are frequently forced to live in substandard housing conditions with inadequate heating, poor ventilation and overcrowding. These challenges are compounded by the lack of targeted government intervention and inadequate housing provisions for international students, which were notably excluded from the Canadian National Housing Strategy.

The findings of this study underscore that international student, who also possess temporary immigration status, constitute a particularly vulnerable group within the Canadian housing market. Affordability, limited knowledge of local housing system and exploitative landlord behaviors exacerbate their housing difficulties. Despite these challenges, the systemic issues surrounding housing remain unresolved, with institutional and governmental responses proving insufficient to fully address the needs.

This study highlights the urgent need for a more comprehensive approach to resolve the housing crisis for international students in Canada. Postsecondary institutions and policymakers must work together to create affordable, safe and accessible housing options that meet the distinct needs of this populations. This includes acknowledging the specific vulnerabilities of international students, incorporating their housing challenges into local, national and provincial housing strategies and providing more robust institutional support. Addressing these housing challenges is not only essential for the well-being of international students but also for their academic success and overall integration into Canadian society.

The findings are particularly relevant for key stakeholders, including federal and provincial governments, housing providers and educational institutions, who must collaborate to ensure that international students are given the necessary support to thrive in their academic and personal lives. By addressing the housing crisis faced by international students, Canada can maintain its reputation as a welcoming destination for international students' education, while also supporting the long-term well-being and success of the vulnerable population.

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APPENDIX – INTERVIEW GUIDE

Semi-structured interviews (International students)

1. What type of accommodation did you reside in?
2. Can you describe your housing experiences as an international student?
3. What were the positive aspects of your housing situation?
4. What were some of the significant challenges you encountered in your housing experience or situation?
5. How would you characterize your housing situation?
6. Are you satisfied with your housing situation?
7. What are your preferences for housing arrangements?
8. What factors contribute to your satisfaction or dissatisfaction with your housing situation?
9. How has your housing situation affected your academic performance?
10. How has your housing situation influenced your ability to integrate and connect with others socially?
11. Could you discuss whether and how your living conditions have influenced your physical and mental well-being?
12. What specific housing aspects impact such well-being?
13. Has your housing situation affected your mental well-being as an international student? If so, how?
14. How has housing situation affected your physical well-being as an international student? If so, how?
15. Can you share any coping strategies employed to navigate housing challenges in Canada? How effective have these strategies been for you?

Semi-structured interviews (International Student Office)

1. How does your institution assess the housing needs and preferences of international students?
2. What are the common challenges faced by international students enrolled at your institution?
3. How does the housing situation impact international students' overall experience and well-being?
4. What are the support services or resources provided to international students to address housing-related issues?
5. How do you ensure the safety and security of international students in their housing arrangements?
6. Are there any specific policies or initiatives to promote international students' integration and social inclusion within the local community through housing?

7. How do you address the concerns regarding affordability and availability of suitable housing options for international students?
8. Are there any partnerships with other external stakeholders, such as housing providers or local authorities, to improve the housing situation of international students?
9. What strategies or recommendations have been implemented or considered to enhance the housing experiences of international students?
10. How do you evaluate the effectiveness of the support and intervention measures in place to assist international students with their housing needs?