

Midwives working in Nova Scotia: An exploratory qualitative study of their experiences  
of work and perceptions of their profession

by

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## **Dedication**

This thesis is dedicated to the midwives in Nova Scotia. Thank you for working persistently to improve and promote public health in Nova Scotia.

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## Abstract

Midwives support the health of women and their families, and midwifery is associated with numerous benefits such as high maternal satisfaction, low birth complications, and relatively few interventions. Midwifery has existed as a regulated profession in many places globally since the early twentieth century but in Nova Scotia it only became regulated in 2009. Currently, there are a small number of midwives practicing in Nova Scotia, and although there has been some research conducted in the province, we know relatively little about midwives' working conditions and how their conditions affect their health. The key objectives of this qualitative exploratory study were: 1) to gain an in-depth understanding of how midwives working in Nova Scotia experience their work, and the impacts of their work on their health (physical, social, emotional and mental health), and 2) to understand how midwives perceive their profession. One-on-one semi-structured interviews were conducted with six midwives working in Nova Scotia, audio-taped, and analyzed for key themes and sub-themes. A social constructivist approach informed this study, and individuals' subjective meanings viewed as formed through their interactions with others and the prevailing historical and cultural norms. Analysis revealed that participants experienced some positive working conditions (theme 1) but there were also many challenging working conditions with negative health implications (theme 2). Participants reported provincial supports and challenges within the Nova Scotia healthcare system (theme 3) and also offered recommendations to improve their working conditions (theme 4). The study findings may inform policies and programs aimed at improving working conditions for midwives in Nova Scotia and may also help to increase the public's understanding of the work of midwives. Improving the working conditions of midwives in Nova Scotia may ultimately be a step towards promoting and improving the health of this sector of the healthcare workforce.



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## **Chapter 1: Introduction**

According to the International Confederation of Midwives (2017), a midwife is a recognized professional who provides support, advice, and care to pregnant women throughout the pregnancy, labour, and postpartum period. Midwifery is conceptualized as a collaborative approach to birth because midwives work in partnership with women and help them feel empowered and involved in the decision-making process during the prenatal, labour, and postpartum process (MacDonald, 2018). Midwives help pregnant and birthing women understand their own bodies and, in this way, midwifery has transformed many women's expectations of birth (MacDonald, 2018). When compared with physician-led care, midwife-led care is associated with fewer episiotomies, high maternal satisfaction, and fewer birth complications (Macdonald, 2019; Morrison, 2014; Sandall et al., 2013; Sangster & Bayly, 2016).

In 2011, Vogel reported that there were too few practicing midwives in Nova Scotia to effectively meet the high demand for the service and unfortunately, the situation does not seem to have improved much to date. Currently, many pregnant women in Nova Scotia are unable to access midwifery services because of the high demand for the service and the limited availability of practicing midwives (Macdonald, 2019; Macdonald & Etowa, 2021; Saulnier et al., 2010). As reported by local media in 2018, a midwife practicing in Lunenburg (a small town situated on the south shore of Nova Scotia) reported turning away approximately 10 potential clients every month (Globe and Mail, 2018). In addition to the limited number of practicing midwives, another factor that contributes to the lack of accessibility to midwifery services in this province is the limited number of midwifery sites. When midwifery was regulated in Nova Scotia in 2009, 7

full-time midwifery positions were funded across three midwifery sites which are located in the IWK Health Centre in Halifax, Fishermen's Memorial Hospital in Lunenburg, and St Martha's Hospital in Antigonish (Association of Nova Scotia Midwives, 2022; Kaufman et al., 2011; Macdonald, 2019). Although the number of midwives in the province is, at present 16, midwifery services have not expanded beyond the three sites (Canadian Association of Midwives, 2022; Kaufman et al., 2011; Macdonald, 2019; Midwifery Regulatory Council of Nova Scotia, 2022). Midwives often travel to clients' homes as part of their work, thereby, only clients who live within relatively close proximity to one of these three midwifery sites have access to midwifery care (Macdonald, 2019; Saulnier et al., 2010).

### **Midwives' Demanding Working Conditions**

Existing global research indicates that midwives often experience physically and emotionally demanding working conditions (Cameron, 2011; Likis, 2020). Some physically demanding aspects of the profession involve providing hands-on support and working long hours (Likis, 2020). In addition to being physically demanding, working as a midwife involves playing an active role in a person's emotional birth and this experience can be emotionally stressful (Likis, 2020). A qualitative study conducted by Cameron (2011) examining why midwives in Ontario leave their profession found that the stress of working causes some midwives to lose a sense of who they are and thus, the emotional and mental demands of midwifery work made it difficult to continue practicing.

Based on existing literature, numerous factors have been found to affect midwives' working conditions (Behruzi et al., 2017; Fathnezhad-Kazemi et al., 2022;

Mattison et al., 2020; Thapa et al., 2021; Zeytinoglu et al., 2022). For example, many Canadian studies indicate that having a limited number of midwives often means that the workers carry heavy workloads and this can contribute to stress (Cameron, 2011; Stoll & Gallagher, 2019; Versaevel, 2011; Zeytinoglu et al., 2022). Another factor that can affect a midwife's work experiences is their position in the current medical hierarchy (Behruzi et al., 2017; Mattison et al., 2020). Since midwives are often not as valued as other healthcare providers who are based in medicine, such as obstetricians, this positionality can affect midwives' working conditions and experiences in a negative way (Behruzi et al., 2017; Mattison et al., 2020). Since industrialization and the modernization of medicine in the twentieth century, obstetricians' prestige and medical authority have established them as the primary practitioners within the birthing world, and this may have contributed to a prevailing hierarchy in healthcare which privileges physician-led care over midwifery-led care (Behruzi et al., 2017; Bonaparte, 2014; Bourgeault, 2000; Mattison et al., 2020; West et al., 1999). Physicians and obstetricians were historically male so this hierarchy could have also been influenced by gender discrimination (Shaw, 2013).

Existing research has found that many Canadian midwives consider their profession to be central to their identity; hence, their professional responsibilities can often dominate their lives and lead to them being overworked (Bloxsome et al., 2020; Cameron, 2011). These working conditions can create a work-home imbalance which is often a contributory factor in a midwife's decision to leave the profession (Cameron, 2011; Fenwick et al., 2012; Likis, 2020). Studies conducted in Australia, Sweden, Norway, and Canada indicate that stressful work environments can create a work-home

imbalance, and this can consequently result in burnout and reduced career longevity among some midwives working in these countries (Gebriné et al., 2019; Hildingsson et al., 2013; Jordan et al., 2013; Stoll & Gallagher, 2019).

### **Research Problem**

According to a local media report, the president of the Association of Nova Scotia Midwives reported that in 2018 midwives in the province were overworked because of the continuous round-the-clock, on-call requests from their high number of clients (CBC, 2018). The small number of practicing midwives in Nova Scotia often experience challenging working conditions, such as long hours of work and heavy workloads, and this can lead to mental and physical burnout among the midwives (Cameron, 2011; Stoll & Gallagher, 2019; Globe and Mail, 2018). Currently, there is relatively limited literature about midwifery in Nova Scotia and virtually no research about how working conditions affect the midwives' health. In 2011, a review team was commissioned to conduct an external assessment of Nova Scotia's midwifery program, and they concluded that the limited number of practicing midwives in the province have heavy workloads and that they would not be able to meet the growing requests for midwifery care or provide services effectively (Kaufman et al., 2011). Morrison (2014) also argues that significant challenges, such as the shortage of midwives in Nova Scotia, and their negative working conditions, could impact the profession's long-term sustainability.

### **Statement of purpose and research questions.**

The key purpose of this qualitative study was to explore how midwives working in Nova Scotia experience their work and the health implications of their working conditions, and to understand how midwives perceive their profession in Nova Scotia.

There were four research questions: 1) What are midwives' experiences of their work in Nova Scotia, and the impact (positive and/or negative) of their working conditions on their physical, social, emotional and mental health? 2) What are midwives' experiences of their work-life balance in Nova Scotia? 3) What are midwives' perceptions of the profession of midwifery in Nova Scotia? and, 4) What are midwives' suggestions (if any) for improving working conditions in Nova Scotia?

### **Study Design**

This study utilized a qualitative approach as this approach enables one to gain an in-depth understanding of experiences, phenomena, and context, by addressing the “how” and “why” of research questions (Cleland, 2017). One-on-one semi-structured interviews were conducted because this provided the participants with the opportunity to explain in detail their experiences. A social constructivist worldview informed this study. This worldview proposes that individuals' subjective meanings of the world in which they live and work are formed through both their interactions with others and the prevailing historical and cultural norms (Creswell & Poth, 2016). This worldview also proposes that knowledge is created rather than discovered (Walker, 2015). My perspective aligns with the social constructivist perspective that there are multiple realities, and that reality is socially constructed and dependent on one's own background, race, and social circumstances.

Analytical techniques of grounded theory, including coding and constant comparison of ideas, were used to develop a conceptual understanding of the data. The process of coding allowed me to summarize, synthesize and sort the study data, and through constant comparison I was able to compare data, categories, and codes with each

other. A descriptive level of analysis conveys what is going on, what a setting looks like, and what people are doing or saying, whereas a conceptual level of analysis goes beyond description to examine why things are happening the way they are by studying relationships between categories and sub-categories (Corbin & Strauss, 2015). Although theory generation was not the primary objective of this study (as is sometimes the case in grounded theory studies), going beyond a descriptive level to develop a conceptual understanding of midwives' experiences of work in Nova Scotia was a key goal.

### **Study Rationale**

There is currently a healthcare crisis in Canada, including in Nova Scotia, and one issue that is contributing to this crisis is the shortage of healthcare providers (Macdonald, 2019; Nova Scotia Health Authority, 2022). This shortage might be attributed, at least in part, to the providers' challenging working conditions (e.g., work overload, and physical, verbal, and racial discrimination), and sometimes limited work-home balance (Macdonald, 2019; Nova Scotia Health Authority, 2022). A Nova Scotian report has indicated that challenging working conditions are negatively affecting the health of healthcare providers (Nova Scotia Health Authority, 2022). Existing research has also indicated that healthy healthcare providers can provide services to clients more effectively than those who experience negative health effects (Agarwal et al., 2020; Cramer & Hunter, 2019).

Midwives are healthcare providers who are trained to provide care to women with low-risk pregnancies and in comparison to obstetrician-led care, midwifery care is associated with several benefits, such as fewer episiotomies, higher maternal satisfaction, and fewer birth complications (Macdonald, 2019; Morrison, 2014; Sandall et al., 2013;

Sangster & Bayly, 2016). To date, there has been no qualitative research that focuses on understanding the working conditions of midwives in Nova Scotia and implications of the conditions for the health of midwives. There is some Canadian literature on midwives' working environments and conditions, however, most of these studies focus on other provinces such as Ontario, Quebec, and British Columbia (Burton & Ariss, 2009; Mattison et al., 2020; Zeytinoglu et al., 2022). Each Canadian province is at a different stage of regulation, and midwives may face unique challenges according to the province in which they are practicing.

Most Canadian research on midwifery emphasizes the history and importance of the profession, and points to midwifery as a relatively safe and cost-effective health practice (Bourgeault, 2000; Mason, 1987; Relyea, 1992; Simkin, 1988). Some of the Canadian research was published at a time when midwifery was an unregulated profession in Canada and provides information on the historical, social, and gender influences that affected the growth of the profession (Blais et al., 1994). There is also some research in Nova Scotia about midwives' experiences of interprofessional collaboration in the province (Macdonald, 2015; Macdonald et al., 2015; Macdonald, 2019; Macdonald & Etowa, 2021; Macdonald, 2022). The research does not address, however, the issues that midwives currently face. By obtaining the views of midwives working in Nova Scotia regarding their working conditions and the impacts on their health, this study can help to fill this gap in our knowledge, and may also increase public awareness of midwifery and the potentially challenging provincial working conditions that midwives encounter.



## **Summary**

Midwifery has been a regulated profession in Nova Scotia since 2009, and midwifery care is associated with numerous benefits when compared with obstetrician-led care, and these benefits include fewer birth complications, fewer episiotomies, and higher maternal satisfaction (Macdonald, 2019; Morrison, 2014; Sandall et al., 2013; Sangster & Bayly, 2016). Most Canadian research related to midwifery focuses on provinces with a more established midwifery workforce, such as Ontario, Quebec, and British Columbia. Currently, there is relatively limited literature on midwifery in Nova Scotia and virtually no research on how current working conditions affect the midwives' experiences of work and their health. Thus, the key purpose of this qualitative study was to explore how midwives working in Nova Scotia experience their work, including the health implications of their working conditions, and to understand how midwives perceive their profession.

## **Chapter 2: Literature Review**

Research on midwifery in Western countries was explored and assessed when conducting the literature review for this thesis because research on the working lives of Canadian midwives is quite limited (Cameron, 2011; Macdonald, 2015; Macdonald, 2019; Mattison et al., 2020). Research from countries that have an established midwifery workforce, such as Australia, Sweden, Norway, Netherlands, and the UK, were reviewed to study the history and growth of the profession from a Western perspective (Fenwick et al., 2012; Fenwick et al., 2018; Henriksen & Lukasse, 2016; Newton et al., 2014). Due to the limited literature on midwives' working conditions in Canada, research regarding how midwives' working conditions affect their health in other countries, such as Iran, was reviewed.

### **History of Midwifery in Canada**

From the 17th to 19th centuries, settler midwives in Canada practiced as a part of community life (Bourgeault, 2000; Plummer, 2000; Relyea, 1992). During this time, midwifery existed as a local system of women helping other women in need (Mason, 1987). Midwives were typically neighbouring women who were knowledgeable and experienced in childbirth (Bourgeault, 2000; Relyea, 1992). The midwives helped women give birth in their homes, and their training involved observation, participation, and sometimes even a formal apprenticeship (Bourgeault, 2000; Relyea, 1992).

In 1867, midwives began to lose recognition as healthcare providers when formally educated healthcare professionals, such as physicians, started striving for legislation to better define themselves (Plummer, 2000; Relyea, 1992). The increase in the number of physicians in Canada by the end of the 19th century was significant to the

extent that physicians experienced difficulty when trying to earn a decent living, and it is for this reason that childbirth began to be viewed by physicians as an opportunity to enhance their personal incomes (Relyea, 1992). Midwives threatened male medical professionals' efforts to monopolize healthcare, and this might be why midwives were deliberately discredited and their work socially constructed as unsafe (Relyea, 1992; Shaw, 2013). By the end of the 19th century, midwives in Canada were regarded in low esteem, and this resulted in a decrease in the number of midwives (Biggs, 2004; Mitchinson, 2002).

By the late 19th century, modern science and technology was established as the basis for healthcare practice and policy (Plummer, 2000). Midwives did not have access to new technologies, such as forceps, that were equated with safety and these factors contributed to ideas on the modernization of birth (Biggs, 2004; Plummer, 2000). The new ideas regarding the modernization of birth emphasized the superiority of obstetricians' skill and knowledge, while simultaneously devaluing midwives' intellect, experience, and lack of formal training (Biggs, 2004; Mitchinson, 1991).

New regulations requiring healthcare providers to be formally educated were put in place in the late 19<sup>th</sup> century and thus, restricted midwives' ability to practice in Canada (Plummer, 2000). Midwives were viewed as "unskilled" caregivers who jeopardized the health of their clients because of their lack of preparation and unhygienic practices (Bourgeault, 2000; Plummer, 2000). Childbirth had become a medicalized process, and the perception of midwives as being both ill-equipped to handle deliveries and less knowledgeable about labour than obstetricians persisted until the end of the 20th century (Relyea, 1992). By the 1970s however, an increasing number of women began to

express their dissatisfaction with the medicalization of birth, and it is during this time that features characterizing the medicalized approach to childbirth, such as cesarean surgeries and limited personal care for the birthing process, began to be seen as unfavourable (Relyea, 1992). Many women began to desire a more holistic approach to care that viewed birth as a natural physiological life process that occurred in a familiar and supportive environment, and this helped lead to the re-emergence of the practice of midwifery (Bourgeault, 2000).

### **Indigenous midwifery.**

To gain a comprehensive understanding of the history of midwifery in Canada, it is important to acknowledge the history of Indigenous midwifery practices. Indigenous people are individuals who have a historical continuity with pre-invasion and pre-colonial societies that developed on their territories, and who consider themselves distinct from other sectors or societies now prevailing in those territories (National Aboriginal Council of Midwives, 2014).

Indigenous midwifery honours Indigenous peoples, languages, oral cultures, and traditions (National Aboriginal Council of Midwives, 2022). Indigenous peoples in Canada have historically perceived childbirth as integral to other natural and creative life processes (Carroll & Benoit, 2004). Many Indigenous groups across Canada did not historically recognize or use the term “midwife”, but instead emphasized the roles and responsibilities associated with the care provider (Carroll & Benoit, 2004). For example, the Nuu-chah-nulth people, who are located on the west coast of British Columbia, view an individual who performs midwifery duties as “she can do everything”, whereas the Chilcotin people perceive this individual as “women’s helper” (Carroll & Benoit, 2004).

Despite the diversity of definitions related to the midwife role, all the Indigenous groups historically viewed the women's helper/midwife role as the Creator's work (Carroll & Benoit, 2004). To be recognized by their community as a competent caregiver, Indigenous midwives were expected to take on a long apprenticeship with a female elder relative (Carroll & Benoit, 2004). Historically, the midwife role was highly esteemed, and many midwives occupied positions of authority and prestige among their families, tribal governments, and the spiritual realm (Carroll & Benoit, 2004).

Colonialism and systemic racism led to Indigenous traditions, language, and culture being devalued (Carroll & Benoit, 2004; National Aboriginal Council of Midwives, 2022). As a result of colonialism, diseases such as influenza, smallpox, and measles spread among Indigenous populations and this, along with paternalistic government policies, contributed to the weakening of peoples' health and wellbeing (Carroll & Benoit, 2004). The 1867 British North America Act, which defined the legal status of registered Indians, led to the loss of control over their organization of governance and healthcare and social services, and this resulted in many Indigenous healers feeling punished or ignored by non-Indigenous government officials and missionaries (Carroll & Benoit, 2004; Ponting, 1998; Waldram et al., 1995; Wells, 1994). Further, residential schools, as well as other colonial processes, restricted Indigenous populations' access to traditional knowledge systems and in this way, negatively affected Indigenous midwifery (Carroll & Benoit, 2004). These political, economic, and social factors resulted in the decline of Indigenous midwifery (Carroll & Benoit, 2004). Towards the end of the 1980s, however, Indigenous midwives began to assert their right

to regain control over childbirth and healthcare within their own communities and this instigated the revival of Indigenous midwifery (Carroll & Benoit, 2004).

The revitalization of Indigenous midwifery has helped many Indigenous midwives pass their sacred practices to others and experience a legitimate place of respect within their communities (Carroll & Benoit, 2004). Some core values of Indigenous midwifery include healing, respect, and cultural safety (National Aboriginal Council of Midwives, 2019). Currently women elders' rich personal experiences with childbirth and other aspects of female life have led them to being seen as "keepers of the culture" (Carroll & Benoit, 2004., Jeffries, 1992). Indigenous midwives are vital because they help build healthy and safe Indigenous communities in rural and urban areas by providing essential, culturally rooted sexual and reproductive healthcare for their communities (National Aboriginal Council of Midwives, 2019; National Aboriginal Council of Midwives, 2022).

### **Current Status of Midwifery in Canada**

In 1994, Ontario became the first Canadian province to regulate midwifery (Simkin, 1988; Plummer, 2000). In Nova Scotia, midwifery was regulated in 2009 (Canadian Association of Midwives, 2022; Macdonald, 2019). Prior to the regulation of midwifery in Nova Scotia, the profession was considered "alegal", which meant that it did not have legal status and was not regulated or protected by a professional status/college (Macdonald, 2019; Plummer, 2000). This also meant that midwives did not operate as recognized healthcare providers and they thus worked on the margins of the provincial healthcare system (Macdonald, 2019; Plummer, 2000). Currently, most Canadian provinces have regulated and funded midwifery, and midwives are actively

practicing in these provinces (Canadian Association of Midwives, 2022). The province of Prince Edward Island is currently in the process of developing and regulating midwifery services (Government of Prince Edward Island, 2022).

Midwives in Canada currently work within four types of employment models: private practice, private fee for service, course of care, and salaried (Thiessen et al., 2020). Midwives are primary healthcare providers and midwifery is an independent healthcare profession that is governed and legislated provincially (Macdonald & Etowa, 2021).

### **Educational programs.**

To become a midwife in Canada, individuals are required to obtain a midwifery undergraduate degree (Canadian Association of Midwives, 2022). The four-year midwifery undergraduate degree comprises both an extensive clinical and academic component, and these degree programs are currently offered at six universities that are in the provinces of Ontario, Quebec, British Columbia, Alberta, and Manitoba (Canadian Association of Midwives, 2022). All six midwifery undergraduate degree programs are direct-entry and require no prior education or credentials (Canadian Association of Midwives, 2022). There are also two community-based midwifery programs offered at two universities in Ontario and Quebec available to Indigenous communities that are affiliated with both the Tsi Non: we lonnakeratstha Ona: grahsta' communities and the Inuit communities on the Hudson and Ungava coasts of Nunavik (Canadian Association of Midwives, 2022; National Aboriginal Council of Midwives, 2022). Internationally-educated midwives are required to complete a bridging program to ensure that they have the competencies to practice midwifery in Canada (Macdonald & Etowa, 2021). There

are currently three bridging programs offered to those who are internationally-educated and these bridging programs are available in three universities located in Ontario, Quebec, and British Columbia (Association of Nova Scotia Midwives, 2022; Canadian Association of Midwives, 2022).

At present, there are no midwifery education programs offered in Nova Scotia, or Atlantic Canada in general. This means that aspiring midwives hoping to work in Nova Scotia are required to obtain their undergraduate midwifery education in a different province before relocating to Nova Scotia.

### **Midwifery in Nova Scotia.**

As stated earlier in this thesis, three sites in Nova Scotia offer the midwifery service: the IWK Health Centre in Halifax, Fisherman's Memorial Hospital in Lunenburg, and St. Martha's Regional Hospital in Antigonish (Canadian Association of Midwives, 2022; Midwifery Regulatory Council of Nova Scotia, 2022). Midwives working in the province are currently salaried, and the midwifery salary is based on a 40-hour work week (Morrison, 2014; Thiessen et al., 2020). Midwives receive benefits and liability insurance which, along with overhead expenses such as equipment and supplies, are covered by the employer which is the Nova Scotia Department of Health and Wellness (Thiessen et al., 2020). Nova Scotia midwives are also offered additional benefits such as life insurance, disability insurance, employment assistance plans, and extended health, dental, and pension plans (Thiessen et al., 2020). The midwives work flexible hours and are entitled to 3 to 6 weeks of paid vacation annually (Thiessen et al., 2020). Midwives in Nova Scotia, however, are not part of a union (Thiessen et al., 2020). To practice midwifery in Nova Scotia, midwives must be registered with the Midwifery



Regulatory Council of Nova Scotia (Midwifery Regulatory Council of Nova Scotia, 2022).

Midwives in Nova Scotia work collaboratively with obstetricians and nurses, however, they are accountable to their managers (who are often nurses) for practice logistics (Kaufman et al., 2011; Macdonald, 2019; Thiessen et al., 2020). Midwives offer their clients the option of home birth and can thus, work in both hospitals and in clients' homes (Canadian Association of Midwives, 2022; IWK, 2021; Kaufman et al., 2011; Macdonald, 2019). Currently in Nova Scotia, midwives work in team-based models, wherein a team of four midwives in each site shares care for their clients (Association of Nova Scotia Midwives, 2022).

### **Midwives' Working Conditions and Experiences**

Due to the limited literature about midwives' working conditions in Canada, research from other western countries, such as Sweden, Australia, and Norway, was reviewed. Additionally, some research from Iran was also reviewed because this research was focused on midwives' working conditions and health, and hence, was relevant to this study. The global literature has allowed me to understand how midwives' working conditions and experiences have affected their health and perceptions of their profession. This research has also helped me situate Canadian midwifery within a global context.

Existing literature, from the countries listed above, indicates that midwives help promote the health and wellbeing of women and children and as such, are key members of the health workforce (Fathnezhad-Kazemi et al., 2022; Mirmolaei et al., 2005). Despite the benefits of midwifery care, midwives in many different places have reported experiencing some challenging working conditions, such as long hours of work, heavy

workloads and stressful client interactions, and these challenging conditions can negatively affect their physical, social, emotional, and mental health (Fathnezhad-Kazemi et al., 2022; Hunter & Warren, 2014). Some of these negative health implications include sleep deprivation and chronic stress, which can result in an increase in job dissatisfaction, burnout, and turnover among midwives (Collins et al., 2010; Fathnezhad-Kazemi et al., 2022; Hunter & Warren, 2014; Thapa et al., 2021). A more detailed account of how midwives' long hours of work and heavy workloads affect their health and increase their chances of experiencing burnout is provided below.

### **Long hours of work.**

Canadian research has found that negative working conditions, such as long hours of work and extended periods of time on-call, can result in negative health implications for midwives (Shen et al., 2004; Versaevel, 2011; Zeytinoglu et al., 2022). For example, Zeytinoglu et al. (2022) note that working for long consecutive hours can be physically straining for midwives and can thus negatively affect midwives' physical health. These extensive work hours can also limit the amount of time midwives can dedicate to their family and friends and in this way, can negatively affect their social health (Fathnezhad-Kazemi et al., 2022; Hunter & Warren, 2014; Zeytinoglu et al., 2022). Thapa et al. (2021), whose qualitative study aimed to understand how midwives (and nurses) working in Sweden experience their everyday work, have also found that midwives' long hours of work can contribute to their heavy workloads, which can subsequently result in work overload.

### **Heavy workloads.**

Global research has found that midwives' heavy workloads can often result in them experiencing work overload, and this can often lead to negative physical, emotional, and mental health implications (Fereday & Oster, 2010; Thapa et al., 2021). Work overload, which involves excessive work hours, limited periods of rest between shifts, and limited communication between colleagues, was found to negatively impact the midwives' health, work relationships, and job satisfaction (Thapa et al., 2021). Job satisfaction refers to one's positive attitudes about their work (Blegen & Mueller, 1987; Rouleau et al., 2012). Fereday & Oster (2010) have found that Australian midwives not only experience work overload (that is, excessive work hours and tasks), but also experience job dissatisfaction because of their high work demands and reduced autonomy over working patterns.

A Canadian qualitative study conducted by Cameron (2011) has found that many midwives working in Ontario experience a loss of self because they do not anticipate that their work will take precedent over their family, friends, and self. According to this study, midwives experience an internal conflict between the desire to be a midwife and their working conditions, and this divergence between the expectations and reality of midwifery work can ultimately lead to high levels of work-related stress for the midwives (Cameron, 2011). These stressful working environments have negatively impacted the health of midwives working in countries beyond Canada (Gebriné et al., 2019; Hansson et al., 2019; Henriksen & Lukasse, 2016; Hildingsson et al., 2013).

### **Burnout among midwives.**

The research literature has indicated that challenging working conditions, as well as the emotional labour involved in interacting with women and their families, can result

in mental health impacts, such as anxiety, stress, and sadness, for midwives (Fathnezhad-Kazemi et al., 2022; Hunter, 2010). Additionally, research from Canada, Sweden, and Iran confirms that midwives who do not feel appreciated, supported, or valued by individuals working within the healthcare system experience negative mental health impacts, such as feelings of frustration and disappointment, and these feelings can also contribute to burnout among midwives and can thereby reduce midwives' retention in their profession (Cameron, 2011; Fathnezhad-Kazemi et al., 2022; Thapa et al., 2021).

There have been concerns about Canadian midwives experiencing burnout since 1998 (Benoit & Heitlinger, 1998; Thiessen et al., 2020). The concept of burnout was first introduced by Freudenberger and Maslach in the 1970s (Kristensen et al., 2005). According to Maslach and Jackson (1986), "burnout is a syndrome of emotional exhaustion, depersonalization, and reduced personal accomplishment that can occur among individuals who do 'people work' of some kind". Burnout can sometimes result in high rates of turnover for midwives, and this result in negative consequences for the midwives who remain in the profession (Banovcinova & Baskova, 2014; Thapa et al., 2021; Zeytinoglu et al., 2022). These consequences include increased workloads, decreased social cohesion among colleagues, and reduced optimism (Rouleau et al., 2012).

***Protective factors against burnout.***

Research conducted in Australia and Norway has found that midwives with more than 10 years of experience are not surprised by the negative reality of maternity services and have likely developed their own protective strategies to reduce their burnout symptoms and improve their health (Fenwick et al., 2018; Henriksen & Lukasse, 2016).

HakemZadeh et al. (2020) reported that midwifery students across Canada with more years of work experience were more likely to stay in the profession.

Researchers of Canadian, Australian, and Norwegian studies have found that midwives with children have a lower likelihood of experiencing burnout when compared to their midwifery colleagues who do not have children because those with children tend to take regular time off to focus on their family activities (Fenwick et al., 2018; HakemZadeh et al., 2020; Henriksen & Lukasse, 2016; Jordan et al., 2013). Thus, having children can potentially serve as a protective factor when dealing with burnout and negative health effects. As indicated by Jordan et al. (2013), midwives who are primary caregivers in the home may view their children as “grounding” because they promote a healthy balance between work and home.

According to Reiter (2007), work-home balance allows people to achieve what they regard as important without feeling overwhelmed (Fereday & Oster, 2010). Likis (2020) has emphasized the importance of making priorities, detaching from work, and engaging in enjoyable activities to maintain a good balance between work and home. Such a balance can also be viewed as important for midwives given that research indicates that midwives tend to experience better psychological health if they can enjoy time away from work and clearly define their professional boundaries (Newton et al., 2014).

Another important factor identified for alleviating burnout symptoms is social support (Cameron, 2011; Kalicińska et al., 2012). Midwives in Ontario who receive support from their families, peers, and colleagues often feel heard, valued, and recognized (Cameron, 2011). Thapa et al. (2021) have noted that positive relationships

with colleagues, and collegial support and teamwork can improve midwives' working environments and strengthen their health and quality of care. Social cohesion among midwives in Canada has also been shown to be a protective factor against burnout (Cameron, 2011; Stoll & Gallagher, 2019).

Despite the protective factors, many studies have highlighted the importance of policy changes in relation to midwives' working conditions and environments. Thapa et al. (2021) have emphasized that the development of long-term strategies to improve midwives' health is vital because this can possibly improve their retention rates. Another mixed-methods study conducted by Zeytinoglu et al. (2022) has highlighted that midwives desire clear limits over their hours of work and that this, along with a decrease in their on-call working hours, can possibly strengthen retention in the midwifery profession in Canada.

### **Situating Midwifery in the Healthcare System**

#### **Philosophical differences between medicine and midwifery.**

Existing research has found that obstetricians and midwives may have different philosophies or underlying values that guide the healthcare professionals' methods of providing care (Behruzi et al., 2017; Bradfield et al., 2018). Obstetricians in Canada tend to focus on safety through medical procedures and support the use of interventionist techniques, such as C-sections and inductions during labour (Behruzi et al., 2017). Midwives, in contrast, are guided by a philosophy of being "with woman" (Bradfield et al., 2018). Midwives typically view their relationships with women as a partnership, professional friendship, and ritual companionship, and they aim to facilitate informed decision-making to enhance the agency and power of labouring women (Bradfield et al.,

2018). Midwives also tend to emphasize continuity of care, female empowerment, and individualized care (Behruzi et al., 2017). In terms of managing labour, obstetricians often attempt to be “very proactive” while midwives typically allow “nature to take its course” (Behruzi et al., 2017). These distinct philosophies between obstetricians and midwives have resulted in two very different cultures of interventionism and non-interventionism, and this has led to differences in models of care (Behruzi et al., 2017).

“Models of care” can be defined as ways of looking after the health and wellbeing of women and babies during pregnancy, birth, and postpartum (Sandall et al., 2013). The medical model of care is informed by medical philosophies, and it can include obstetrician-led or family doctor-led care (Sandall et al., 2013). In obstetrician-provided care, obstetricians are the primary care providers who are present for the birth however, nurses tend to provide intrapartum and postnatal care (Macdonald et al., 2015; Sandall et al., 2013). Reiger and Lane (2009) found that institutional management and hospital pressures, such as time restrictions and large numbers of patients, prevents Australian obstetricians from learning how to effectively support individual labouring women. In family doctor-provided care, a medical doctor is present for the birth, but midwives or obstetric nurses provide intrapartum or postnatal care (Sandall et al., 2013).

Although the medical model of care is dominant in North America, many other models of care exist. Midwifery models of care, which are informed by midwifery philosophies, emphasize continuity of care (Malott et al., 2012). Continuity of care refers to providing care through pregnancy, labour, and the postpartum period (Malott et al., 2012). In shared models of care different healthcare providers, including midwives, share the responsibility and delivery of care (Sandall et al., 2013). According to a review

conducted by Sandall et al. (2013), women with midwife-led continuity models of care are typically more likely to be satisfied with their care when compared to women who have experienced other models of care.

### **Hierarchy in healthcare.**

Since industrialization, Canadian obstetricians' prestige and medical authority have established them as the primary practitioners within the birthing world and this may contribute to the hierarchy in healthcare (Behruzi et al., 2017; Bonaparte, 2014). In the Canadian healthcare system, physicians, and obstetricians often occupy positions of authority and esteem whereas midwives experience limited recognition and as such, are often valued less than physicians (Behruzi et al., 2017; West et al., 1999). Existing research has indicated that this medical or obstetrician dominance of maternity care may be attributed, in part, to perceptions of pregnancy and childbirth as being an "illness" that requires medical supervision and technological intervention (Benoit et al., 2010; Oakley, 1984). Since some physicians pay less attention to the emotional needs of pregnant women they might not place enough importance on the emotional aspects of midwives' work (Hildingsson et al., 2013).

Research indicates that there are similarities in clinical expertise and the overlapping roles and identities of midwives and nurses, and that this has resulted in both professions experiencing unclear roles (Macdonald, 2015; Macdonald, 2019). Nevertheless, nurses are still viewed as a respected part of the healthcare system, and this is possibly because nurses have historically been formally included within the respected institution of medicine (Macdonald, 2015; Macdonald, 2019). Qualitative and quantitative studies conducted in Sweden and the UK have found that the lack of



professional recognition and role ambiguity experienced by midwives can lead them to internalizing negative beliefs and feelings of failure (Hildingsson et al., 2013; Hunter, 2004).

Historical influences, as well as obstetricians' established social networks and positions of power in the medical system have generated attitudes of obstetricians being the "safe" option for giving birth (Behruzi et al., 2017; Plummer et al., 2000). A cross-sectional study conducted by Fairbrother et al. (2012) has found that many (male and female) undergraduate and graduate students at the University of British Columbia tend to equate safety with obstetricians and it is for this reason that they would prefer having an obstetrician as their care provider for their birth experience as opposed to a midwife. Thus, obstetricians' high status positions in the healthcare system may continue to strengthen public perceptions of midwifery being dangerous despite evidence to the contrary, and this may continue to affect midwives' status in the healthcare system.

### **Midwifery care in contrast to medicalized birthing.**

Since most Canadian births tend to take place with obstetricians, midwifery care is not the norm (Canadian Association of Midwives, 2022). Although the regulated profession of midwifery began as an alternative to medicalized birth, it has also disrupted gender norms by challenging the notion that obstetricians, who have historically been male, were in charge of women's bodies (MacDonald, 2018). Through their work, midwives aim to promote the notion that in the case of low-risk births, women are typically strong enough to labour by themselves and without medical interventions (Bloxsome et al., 2020). Midwives are often viewed as a threat, both to family physicians and obstetricians, and this perceived threat might be a key reason why midwives' voices

are frequently overlooked in policy-making decisions (Blais et al., 1994; MacDonald, 2018). Power imbalances tend to place midwives in subordinate positions ultimately increasing tension between midwives and obstetricians (Behruzi et al., 2017). Canadian midwives often lack an institutional voice given their subordinate position (Behruzi et al., 2017).

### **Collaboration and Mutual Respect between Midwives and other Healthcare Professionals**

Existing research has highlighted the need for midwives to be better integrated into the Canadian healthcare system (Mattison et al., 2020; Zeytinoglu et al., 2022). One possible way for midwifery to be better integrated into the Canadian healthcare system might be through interprofessional collaboration. Canadian studies have argued that collaboration can result in increased satisfaction for both the people receiving and providing healthcare (Macdonald, 2022; Pomare et al., 2020). According to the World Health Organization (WHO) (2013), interprofessional collaboration in primary healthcare could improve health systems and health outcomes. The six enablers of interprofessional collaboration are: having work and institutional cultural support, identifying champions and leaders, creating and maintaining a shared vision, having a physical space that supports collaboration, and creating opportunities for mentoring and learning (Macdonald & Etowa, 2021).

Miller (1997) has stated that collaboration between midwives and obstetricians is dependent on several factors, such as organizational dynamics, philosophy of practice, and mutual trust. The establishment of a mutually respectful professional culture can be achieved if medical and midwifery staff deliberately work together in a process of critical

dialogue (Reiger & Lane, 2009). This dialogue might possibly foster conversations regarding mutual responsibility and accountability which are two elements necessary for successful interprofessional collaboration (Hansson et al., 2019).

In Canada, midwifery and nursing are independent healthcare professions (Macdonald, 2015). In Nova Scotia specifically, midwives and nurses have been found to experience positive, collaborative relationships and nurses have been identified as “allies” and “advocates” for midwives (Macdonald, 2019; Macdonald & Etowa, 2021). Midwives often work alongside nurses and the two professions often share tasks such as charting, monitoring, and labour support (Macdonald, 2022).

Although there is some collaboration between midwives and nurses in Nova Scotia, existing research has suggested that formalizing a model of maternity care that is focused on interprofessional collaboration between midwives and nurses in the province could be beneficial (Macdonald & Etowa, 2021). This “modern” model that is based on interprofessional collaboration would emphasize partnership, informed consent, and choice of birthplace (Macdonald & Etowa, 2021). By having more midwives and nurses in Nova Scotia work together as teams in communities, homes, and hospitals within expanded scopes of practice, this modern model would move away from obstetrician-led care and could thus, create a shift in birth culture (Macdonald & Etowa, 2021).

## **Summary**

A literature review was conducted to gain an understanding of how midwives in Canada experience their working conditions, health, and their position in the healthcare system. There is some Canadian literature on midwives’ working environments but many studies focus on provinces such as Ontario, British Columbia, and Quebec. There is

limited research on midwifery in Nova Scotia and it is for this reason that literature from other countries, such as the UK, Sweden, and Iran, has been reviewed to gain an understanding about the history of midwifery, and midwives' working conditions and the resulting health implications. Midwives from other countries have been found to experience negative working conditions such as long hours of work and heavy workloads, and this often leads to stress, job dissatisfaction, and burnout, which can ultimately result in high rates of turnover among the midwives.

Midwives typically view their relationships with women as partnerships, professional friendships, and ritual companionships, and they aim to facilitate informed decision-making to enhance the agency and power of labouring women. Midwives tend to emphasize continuity of care, women empowerment, and individualized care and this sometimes contrasts with the guidelines that facilitate obstetricians' models of care. Obstetricians are the primary healthcare providers for most labouring women in Canada, and this might contribute to the hierarchy in healthcare. Midwives typically experience subordinate positions in the healthcare system, as opposed to obstetricians, and this may be a key reason why their voices are often overlooked in policy-making decisions.

### **Chapter 3: Methodology and Methods**

In this chapter, I describe the methodology and methods that were utilized to explore the experiences of midwives working in Nova Scotia. More specifically, the qualitative, social constructivist approach that was used in this study is outlined and a brief discussion is provided of the use of modified grounded theory. An account of how participants were recruited and interviewed is provided. This chapter also describes how analytical techniques of grounded theory, such as coding and constant comparison, were used to analyze the data. A discussion of the study's ethical considerations, limitations, and trustworthiness is also provided.

#### **Qualitative Research**

The key purpose of this study was to explore how midwives working in Nova Scotia experience their work, including their working conditions and the health implications of these conditions. Qualitative research was utilized to explore these experiences because a qualitative approach enables one to gain an in-depth understanding of individuals' experiences, phenomena, and context, by addressing the "how" and "why" of research questions (Cleland, 2017). Qualitative researchers aim to develop a picture of a research problem by exploring multiple perspectives and identifying how various forces influence individuals' experiences (Creswell & Creswell, 2017). As noted by Creswell (2013), qualitative research helps "empower individuals to share their stories" and "hear silenced voices" (p. 144-145). Since this study was focused on midwifery in Nova Scotia, a topic that is relatively new and under-researched, a qualitative approach was also useful as it helps us to explore understudied research questions (Creswell & Creswell, 2017).

## **Social Constructivism**

This study is rooted in social constructivism because this philosophical worldview posits that individuals' subjective meanings of the world they live and work in are formed through their interactions with others and the prevailing historical and cultural norms (Creswell & Creswell, 2017; Creswell & Poth, 2016). To understand how an individual constructs knowledge and functions in society, social constructivists believe it is important to examine the context within which people live and work (Creswell & Creswell, 2017; Kim, 2001). Social constructivists do not believe that reality can be discovered (Kim, 2001). Instead, they assume that reality is constructed through human activity (Kim, 2001). According to Corbin and Strauss (2008), "objectivity in qualitative research is a myth" and a constructivist paradigm states that individuals "construct the realities in which they participate" (Bryant & Charmaz, 2007, p. 607). Social constructivists focus on the complexity of views by emphasizing multiple and varied meanings (Creswell & Creswell, 2017).

This study of midwives aimed to understand the experiences of midwives in Nova Scotia and more specifically how they have constructed and interpreted their individual realities regarding their work and working conditions and therefore social constructivism was the worldview appropriate for this study. Social constructivism also resonated with me because it understands human experiences as complex and situates individuals' experiences within social and historical contexts. This perspective recognizes that midwives' working experiences and positions in the healthcare system are shaped by various contextual factors, including historical influences, gender disparities, and power struggles.

## **Modified Grounded Theory**

There are three key types of approaches to grounded theory: Glasserian Grounded Theory, Constructivist Grounded Theory, and Straussian Grounded Theory (Creswell & Poth, 2016; Rieger, 2019). Glasserian Grounded theory (GGT), which was developed by Barney Glaser and Anselm Straus in 1967, encourages complete researcher neutrality during the research process (Rieger, 2019). GGT recommends delaying the literature review because the researcher should have as few predetermined thoughts as possible about their study (Thai et al, 2012). Constructivist Grounded Theory (CGT), which was proposed by Kathy Charmaz, is guided by a constructivist worldview and it is highly flexible but does not clearly articulate its data analysis procedures (Rieger, 2019). As a novice researcher, I preferred to utilize an approach with clearly articulated analysis procedures. Straussian Grounded Theory (SGT), as outlined by Strauss and Corbin (1998), provides researchers with a clear description of its research procedures, such as its detailed primary data analysis methods and additional analytical strategies and so, my position as a novice researcher made this aspect of SGT advantageous (Rieger, 2019; Walker & Myrik, 2006). Additionally, SGT is influenced by a constructivist worldview (Strauss and Corbin, 1998). Hence, SGT guided this study. The research was exploratory in nature, so the intent was not to develop a theory but rather the goal was to develop a conceptual understanding of the phenomenon as described by Strauss and Corbin (1998) or what I have termed a modified approach to grounded theory.

Strauss and Corbin (1998) argue that although a theory may be the goal of a study, conceptual ordering can also be the main aim of a study utilizing the grounded theory approach. These researchers maintain that grounded theory methodology includes

three key levels: a descriptive, conceptual, and theoretical level (Corbin & Strauss, 2015; Strauss & Corbin, 1998). The descriptive level involves depicting a story without attempting to explain why certain events occur, and conveys what is going on, what a setting looks like, and what people are doing or saying, and it is the basis for more abstract interpretations (Corbin & Strauss, 2015). The conceptual level termed “conceptual ordering”, involves organizing data into common themes and subthemes, and was the process for analyzing data for this study. Conceptual ordering does not offer a systematic explanation of a phenomenon or a theory as in the theoretical level, but it does go beyond description to explore concepts in further detail (Corbin & Holt, 2005). Analyzing data as per conceptual ordering has allowed me to identify and develop themes and subthemes regarding the midwives’ working experiences in Nova Scotia.

## **Methods**

### **Participant inclusion/exclusion criteria.**

To participate in this study, participants had to meet five inclusion criteria. The first inclusion criterion was that participants had to have practiced midwifery in Nova Scotia, either full-time or part-time, for at least one year. This period of time was to ensure that the participants had enough work experience to speak about working conditions in Nova Scotia. Midwives who were currently on leave were also eligible to participate in this study if they had the necessary work experience in Nova Scotia. The second inclusion criterion was that participants had to have practiced midwifery in Nova Scotia within approximately the previous three years. This was to ensure that they could speak to the relatively current working conditions in the province. Thirdly, participants had to agree to have their interviews audio-recorded so that I could accurately transcribe



the interview word-for-word, and fourthly, participants had to have access to a phone and a private space to complete the interview to ensure the interview was as confidential as possible. The fifth and final criterion was that participants had to have access to an email address to receive their honorarium.

### **Sampling strategy and size.**

Purposive sampling is a non-random sampling strategy that aims to identify and select individuals who are well-informed on a particular phenomenon (Creswell, 2013; Etikan et al., 2016). This sampling strategy deliberately seeks to recruit participants who can contribute to the research because of the characteristics they possess (Etikan et al., 2016). For this reason, this type of sampling was used to select participants who were practicing midwives in Nova Scotia with at least one year of experience working as a midwife.

As Creswell and Creswell (2017) have noted, there is no specific answer to how many participants should be recruited for a qualitative study. Sample size in qualitative research is influenced by several factors such as the nature of the topic, and the quality of the data obtained (Morse, 2000). Some have recommended a sample size of approximately 20 to 30 participants for a grounded theory study but given that this study was exploratory in nature, did not aim to develop a theory, and was recruiting from a limited number of midwives working in Nova Scotia, the original goal was to recruit eight midwives (Creswell & Creswell, 2017; Creswell & Poth, 2016). After a period of recruitment that lasted from December 2021 to March 2022, six midwives volunteered to participate in this study. Although this was a slightly smaller number than the original goal, the interviews provided enough data to engage in an exploratory analysis.

### **Recruitment strategies.**

Participants were recruited through a gatekeeper, the Association of Nova Scotia Midwives (ANSM) which is a provincial organization that represents registered midwives in the province (Association of Nova Scotia Midwives, 2022). The reason for recruiting participants through this gatekeeper was that all midwives working in Nova Scotia must be registered with the ANSM and so this gatekeeper had the ability to easily distribute the recruitment poster (See APPENDIX A for Recruitment Poster) among the midwives. After gaining approval from the Dalhousie University Research Ethics Board, the gatekeeper was asked to send out the recruitment poster to their members via email. The poster encouraged individuals who were potentially interested in participating in this study to contact me, the researcher, directly.

### **Data Collection**

#### **Qualitative semi-structured interviews.**

In qualitative research, the most common form of data collection is interviews (Creswell & Poth, 2016). Due to the COVID-19 pandemic, face-to-face interviews were not possible and so the primary method of data collection was one-on-one telephone interviews. The purpose of conducting the interviews via telephone rather than online was to reduce the possibility of encountering any technical difficulties, such as internet issues or platform challenges, through Zoom or TEAMS. Prior to each interview, the participants were screened via a phone conversation to ensure that they were eligible to participate in the study (See APPENDIX B for the Screening Document).

Qualitative interviews allow the researcher to obtain rich and detailed information by asking the participants questions that highlight their views and opinions (Creswell &

Creswell, 2017; Rubin & Rubin, 2012), and a semi-structured interview guide was utilized. In semi-structured interviews, the researcher prepares a limited number of questions regarding the central phenomenon and this allows the researcher to maintain consistency over the topics covered in each interview but also allows each participant to speak about their own experience (Corbin & Straus, 2015; Rubin & Rubin, 2012). The semi-structured interview guide was developed in consultation with my research supervisor and thesis committee, and included a list of questions related to midwives' work experiences and perceptions of their profession (See APPENDIX D for Semi-Structured Interview Guide).

The interviews lasted between 40-74 minutes. During the interviews, the participants were encouraged to ask questions and were also informed that they could withdraw or take a break from the interviews at any time. The participants were asked to add any information that they felt might be relevant to the discussion. Probing questions, such as “can you tell me more about that?” and “please explain what you mean”, were asked to gain more insight into specific aspects of the participants' responses. After the interviews were completed, the participants were asked a few socio-demographic questions including their age range, gender, years of practice as a midwife, and region of practice. The participants were informed that they have the opportunity to withdraw their information from the study up to one-week after their interview was completed. After this one-week period, their data became part of the study. As per the ethics protocol, each participant was sent a \$25 electronic gift card, via email, after their interview was completed.

An audio-recording device was used to record the interviews. Following the telephone interview, the audio-recording was transferred from the audio-recorder onto a password-protected hard drive (and two password-protected backup hard drives). Once the audio-recording was transferred to the password-protected hard drives, the audio-recorder was wiped clean. The interviews were then transcribed word-for-word, and the transcripts were checked against the audio-recordings for accuracy. Once the transcripts were checked for accuracy and any personally identifying information about the participants removed, the audio-recordings were destroyed to protect the identity of the participant since voices are recognizable.

### **Data Analysis**

Data collection and analysis took place simultaneously in an iterative process. I performed the data analysis and was provided with guidance from my research supervisor. To manage the data, the electronic software, NVivo12, was employed. “Constant comparison” is an important feature of the grounded theory methodology, and it involves developing abstract ideas by continuously comparing and contrasting data with each other during the data collection and analysis processes (Rieger, 2019; Thai et al., 2012; Walker & Myrick, 2006). Comparing and contrasting the data helped in identifying commonalities and differences in the data and this helped me develop key themes and subthemes from the data (Rieger, 2019; Walker & Myrick, 2006).

### **Coding.**

Coding was a key part of the analysis of the interviews with midwives. Coding embodies the procedures where information is broken down, conceptualized, and put back together in new ways (Strauss & Corbin, 1990). The goal of this study was not to

generate a theory, but rather I attempted to achieve a conceptual understanding of the midwives' experiences of work and perceptions of their profession. This conceptual understanding of midwives' experiences was organized into key themes and subthemes regarding midwives' working experiences and implications for their health, as well as perceptions of their profession.

The three stages involved in coding are open coding, axial coding, and selective coding. The first stage, "open coding", involves breaking down, examining, comparing, conceptualizing, and categorizing data (Strauss & Corbin, 1990). While conducting this stage, I engaged in a line-by-line analysis of the interview transcripts. This involved closely examining each phrase, word, or sentence in each line of the transcript (Strauss & Corbin, 1990). This type of analysis allowed me to focus on each aspect of the data generated from the interview. The steps involved in open coding are labelling phenomena, discovering categories, naming categories, and developing categories (Strauss & Corbin, 1990). Closely examining, comparing, and interrogating the data through a line-by-line analysis allowed me to segment the data generated from the interview transcripts into categories of information, which were clear and explanatory of the participants' experiences. Thus, preliminary categories were created and a coding structure was developed during this stage.

The second stage of coding is "axial coding". While open coding fractures data, and allows for the identification of categories, axial coding involves putting those data back together in new ways through establishing links between a category and its sub-category (Strauss & Corbin, 1990). Through constant comparison of key concepts, I was able to engage in a deeper analysis by relating categories to sub-categories and this

allowed for the creation of key themes that were representative of the participants' experiences. During this stage, key themes and subthemes were developed and solidified with the help of my research supervisor and committee members.

The third stage of coding, selective coding, involves integrating the categories to structure a theoretical framework (Kambaru, 2018). During this stage, the researcher can create a "story" through narrating categories and focusing on their interrelationship (Creswell & Poth, 2016; Strauss & Corbin, 1990). Since this study did not aim to develop a theory, I did not engage in selective coding. The goal of this study was to develop a conceptual understanding of midwives' experiences of work in Nova Scotia and I achieved this goal by engaging in open and axial stages of coding.

#### **Data storage.**

Each participant's screening document (which was used to determine whether they were eligible to participate in the study) was stored on the three password-protected hard drives until the one-week period to withdraw from the study was over, after which it was destroyed. The de-identified interview transcripts were securely stored on the three password-protected hard drives in the form of password-protected WORD documents. Additional documents that were stored on the three password-protected hard drives included the participants' consent forms, an honoraria log (which indicated whether the participant had received their honorarium), a community report log (which indicated whether the participant wanted to receive the study findings), and the participants' email contact information for the community report. The participants' email contact information will be destroyed after the participants receive the community report of the study findings.

Interview data were stored separately from potentially identifying data. The participants' sociodemographic information (including their region of practice, years of practice as a midwife, age range, and self-reported gender) was stored on a fourth password-protected hard drive, along with the participants' electronic consent forms. All the hard drives were encrypted with the tool, FileVault, and stored in a locked filing cabinet at my home office when not in use. Hard copies of the participants' consent forms and sociodemographic information were also stored in the locked filing cabinet at my home office.

To reflect on my thoughts and actions during the data collection and analysis processes, I wrote a few field notes and memos. Field notes refer to the researcher's conceptualizations and thoughts that occur while collecting data (Corbin & Strauss, 2015). Thus, the field notes were written while collecting data and they contained my thoughts about the interviews. The memos, on the other hand, included more in-depth thinking about a concept (Corbin & Strauss, 2015). Memo-writing is a reflexive process where the researcher can remember, question, analyze, and make meaning about the time spent with participants and the collected data (Mills, Bonner, & Francis, 2006). When analyzing the data I created a few diagrams because this process helped me identify patterns in the data. None of the memos, field notes, or diagrams contained any identifying information about the participants but helped me to organize my thoughts during the research process and focus on patterns when analyzing the data. The field notes, memos, and diagrams were stored in the locked filing cabinet.

## **Ethical considerations**

### **Informed consent.**

To ensure that participants were fully informed, participants were asked at the time of screening if they wanted to be emailed a copy of the consent form (See APPENDIX C for Consent Form), so that they could review it in private before deciding about participation. All participants who requested a consent form were emailed one. The participants were told that their participation in this study was completely voluntary. The consent form clearly outlined the purpose, benefits, harms, risks, research procedures, and knowledge translation process involved in this study. The consent form was also verbally reviewed with each participant prior to the interview to ensure that the participants were fully informed on each aspect of the study. In case an interview was potentially triggering or unpleasant to participants, participants were informed that they could withdraw or take breaks at any time. Participants were also informed that they could skip questions and only needed to respond to those questions they wished to answer. The participants were then asked to indicate whether they understood this information and if they confirmed that they did, their verbal consent was recorded in a written document. My signature on the consent form, and documentation of the date of the interview, verified that verbal consent has been obtained. Participants were also informed that they could take breaks from certain questions during the interview and return to them later during the interview or skip questions all together.

### **Confidentiality.**

To ensure confidentiality, no names or other personally identifying information were collected from the participants. The interviews were labelled with a participant



number at the time of the interview (e.g., Participant #1). Any personally identifying information revealed during the interview was not transcribed, and all transcribed interviews were carefully reviewed to ensure no names or personally identifying information were recorded.

**Potential harms and benefits to participation.**

This study posed little risk of harm. Some potential risks associated with this study included the risk of stress or discomfort. For example, participants may have found some of the questions difficult or uncomfortable to answer because a question might have triggered unpleasant memories of negative working conditions. I provided the participants with telephone contact information for the Nova Scotia Provincial Mental Health Crisis Line in case they wished to speak to someone after the interview. The contact information was also listed in the consent form. During the interview process, I checked on the participants to make sure that they were comfortable with continuing the interview. They were also informed that they should only disclose information that they wished to disclose.

This study may not have directly benefitted the participants, but the participants provided new knowledge about an important issue and as such their contribution to new knowledge may be perceived as indirectly beneficial. The participants helped contribute to our understanding of midwives' current working conditions in Nova Scotia and provided suggestions for potential improvements. Policymakers may use the information to help inform strategies (e.g., programs, policies) to improve, or modify, Nova Scotian midwifery working conditions.

### **Reflexivity.**

In qualitative research, researchers reflect on how their background influences the study. Reflexivity is significant because it can help the researcher understand how their background shapes the study (Creswell & Creswell, 2017). To study the meaning that individuals or groups assign to social or human problems, qualitative researchers focus on the voices of participants as well as their own researcher position. By reflecting on one's position as a researcher one can understand how one's own background, such as gender, culture, or socioeconomic origin, shapes the development of the study and interpretation of the study findings (Creswell & Creswell, 2017; Creswell & Poth, 2016).

Prior to and during data collection, I reflected on how my own gender, race, class, sexual orientation, beliefs, and social position could potentially affect the research process including my interpretations of the study findings (Creswell & Creswell, 2017). I realized that because I am a female immigrant from another country, I was unfamiliar with how midwives work in Canada. I also realized that my lack of interactions with midwives, the midwifery profession, and the Canadian healthcare system in general meant that I had a limited understanding of midwives' working lives and positions in the healthcare system. Thus, I had a very limited understanding of midwives' working lives in Canada, including Nova Scotia, before beginning my master's degree. I also realize that this may have meant that I was viewed as an outsider by the midwives who participated in this study.

In order to try and establish mutual trust and reduce any potential power differences between myself as the interviewer and the participants, a number of strategies were employed. For example, interviews were scheduled according to the participant's

choice of time, and they were informed that they could stop the interview at any time or not answer any questions that they did not want to answer.

### **Trustworthiness**

Trustworthiness, or rigour, ensures the quality of the study by highlighting the degree of confidence in data, interpretation, and methods used (Connelly, 2016; Polit & Beck, 2014). Lincoln and Guba (1985) have provided four key criteria for establishing trustworthiness: credibility, dependability, confirmability, and transferability. For this study, strategies to ensure credibility, dependability, and confirmability were implemented.

#### **Credibility.**

Credibility refers to confidence in the study findings (Connelly, 2016). To be credible, the study must guarantee that the researcher represents the participants' views accurately (Ryan, Coughlan, & Cronin, 2007). This signifies that the qualitative research is believable from the participants' perspectives (Kambaru, 2018). To ensure credibility, peer-debriefing, which is the "review of the data and research process by someone who is familiar with the phenomenon being explored" took place with the help of my research supervisor and committee members (Creswell & Miller, 2000).

#### **Dependability.**

Dependability refers to the researcher's account regarding the context of the study (Mertens, 2010). I have tried to provide a detailed account of each step and procedure of this study to clearly indicate how the study was conducted and the study context.

### **Confirmability.**

Confirmability refers to whether the study findings are representative of the participants' experiences and are grounded in the data instead of researcher views (Lincoln & Guba, 1985). To establish confirmability of the study, I have provided a sufficient account on how my own background and position may have influenced the findings. Additionally, frequent meetings with my research supervisor to discuss the study findings and key themes have helped ensure confirmability.

### **Summary**

Chapter 3 provides an overview of the methodology and methods used in this study. This is a qualitative study utilizing a social constructivist worldview which posits that individuals develop knowledge through their interactions with other people, cultures, and society. Prior to data collection, ethical approval was obtained from the Dalhousie University Research Ethics Board. Participants were recruited through one gatekeeper, that is, the Association of Nova Scotia Midwives (ANSM). One-on-one semi-structured telephone interviews were used to collect data from participants. A modified grounded theory methodology was used to develop a conceptual understanding of the participants' experiences of work. Two stages of coding were conducted during the analysis stage. Through open coding, the data were broken down, examined, compared, conceptualized, and categorized to obtain a descriptive level of analysis. During the axial coding stage, links were established between categories and sub-categories in the data and a conceptual level of analysis was achieved.

## **Chapter 4: Results**

The key purpose of this qualitative study was to explore how midwives working in Nova Scotia experience their work and the health implications of their working conditions, and to understand how midwives perceive their profession in Nova Scotia. A total of six midwives were interviewed for this study, and all the participants identified as female. Of the six participants, three practiced in predominantly urban regions, two practiced in predominantly rural regions, and one practiced in a mix of both urban and rural regions. This chapter provides a summary of participants' reported range of work duties, and also presents four key themes regarding midwives' experiences and perceptions of work in Nova Scotia. The first theme outlines midwives reports of positive day-to-day working conditions, and highlights participants' experiences of work tasks, environments and schedules that are all variable, as well as work relationships with clients, co-workers and other healthcare workers. Theme 2 centres on the challenges of midwives' working conditions and health, and details key challenges of working as a midwife and the implications for participants' physical, mental and emotional, and social health. Theme 3 refers to working as a midwife in the healthcare system and summarizes key supports participants receive from the Nova Scotian healthcare system as well as the system challenges that diminish their working experiences. The fourth theme is about midwives' recommendations to improve their working conditions in Nova Scotia. Quotes from the interviews are identified below by participant number (e.g., P #1).

### **Participants' Range of Work Duties**

All the participants described performing a variety of duties as part of their work such as clinic work, phone appointments and home visits with clients, as well as

attending births. The participants also described having on-call shifts and/or backup call shifts. When on-call, the participants indicated that they might attend home visits, birth and prenatal assessments, and/or provide labour and birth care in hospitals and in homes. The participants also described performing administrative duties, such as reviewing charts, requesting lab tests, and reading current reports and research about midwifery. All the participants explained that there was no fixed daily or weekly schedule because their work tasks depended on the priorities of their clients.

### **Theme 1: Positive Day-to-Day Working Conditions**

#### **Variability in work.**

All the participants stated that not only did they have variable work schedules but also their hours of work varied weekly. For some of the participants, the variability of their work was experienced positively because each day was different in terms of changing work tasks, work environments, and hours of work. One participant indicated that she valued this flexibility in her work hours and tasks and stated that, “I am somebody who values flexibility in my work. Um and so I quite like the fact that each day is different in this line of work, and our hours of work are different each day. Um and our work environments are different each day” (P #3). A couple of participants experienced the variability in work tasks positively because of the flexibility it provided to engage in personal tasks or appointments or even go home when there were no immediate work tasks. According to one participant, “In terms of like working conditions, um it’s positive that I can leave the hospital and come home when I don’t have anything more to do” (P #5). Another participant indicated that she “appreciated” her variable work because it provided her with the ability to spend some time attending to

personal tasks or interests on days when on-call was quiet and in this way, have some flexibility. This participant stated that:

I'm able to complete other tasks during the week that allow my life to be somewhat flexible and I really appreciate that. Um the ability for example to book a personal appointment or um spend time in the garden mid-week in the middle of the day sometimes feels like a luxury (P #4).

### **Work relationships.**

#### ***Relationships with clients.***

Most of the participants spoke about positive work relationships including relationships with clients. For many midwives, what made the client relationship positive was that they were able to spend time with clients often in various environments and this typically helped them get to know their clients well. Many of the participants indicated that the continuity of care model was key to being able to spend a lot of time with their clients and build strong relationships with their clients; or, what one participant described as a partner type of relationship with clients. As one participant commented, "Because of the model we are working, we have more time to build a relationship with clients...and we are...really trying to be more a partner than a care provider for them" (P #2).

Home visits also contributed to developing a relationship with clients as one could experience part of the client's home life. Being welcomed into clients' homes meant that the midwives were able to see their clients in a home environment and get to know them better. This was described by one participant as a "special" and "positive" aspect of her work, "What's positive about my work is that I get to have a relationship with um with people like women and birthing people who um who are wanting to yeah like let you into

their, into their home, and into their family for this like short period of time” (P #5). For one participant, knowing her clients really well meant that she could understand them better, and could provide them with the kind of care they needed. This participant stated that:

My feeling about my relationships with my clients is that I value knowing them really well. So I do value what we in midwifery call continuity of care. I like caring for people that you know I've seen several times and I know their story and what they want and their perspectives on their bodies and their births and their families (P #3).

A couple of participants highlighted that what was very positive in the relationship with clients was that the clients had a voice in their care and were supported. For at least one participant, the home visits provided a good environment for clients to be heard and have some power in the relationship and this participant stated that, “Home visits are integral to midwifery because it keeps clients in their own spaces, and it gives them the power. Uh and you know we are in-service to them so that ... I just think that's really important” (P #3). “Empowering” clients by listening to their voices and input regarding their care made it easier for one participant to cope with her challenging working conditions. According to this participant, “If everything goes well in the end or even if it doesn't go well, if parents feel that they were heard and supported in their vision and um accepted, I think then this is okay and then you don't think about that you got up at two in the night” (P #2).

Listening to their clients' thoughts and honest feelings about midwifery care was described as a positive experience by a few participants because it helped them better



understand their roles as midwives. One participant appreciated this type of feedback because it helped her realize the significance of her work. Another participant indicated that she “loved” seeing her clients benefit from midwifery care.

*Relationships with midwifery co-workers.*

Relationships with co-workers who were midwives were also experienced by all participants as a positive aspect of their work. Key to these positive co-worker relationships was the “collaborative” and “supportive” nature of the relationships, which were terms that the participants typically used interchangeably. As one participant commented, “We work together really collaboratively to support everybody’s lives and things they have to be at, and we cover each other and... you know those kinds of things make your working conditions really good...” (P #3). Another participant argued that collaboration included sharing different skill sets among the midwives and this participant provided the following example:

Somebody is hyper-organized which helps keep the rest of us organized, and someone else is always good at being like, ‘Oh wait did we remember to check the guideline on that?’ and that’s kind of what they always bring to the care (P #5).

Collaboration and support also involved helping a co-worker with their client caseloads or work tasks if, and when, needed. One participant indicated, for example, that there was a common understanding among her co-workers that if a co-worker needed a break, someone would help by taking on the person's work tasks. This participant noted that, “There’s also an expectation or an understanding between the midwives that um if it’s been less than 24 hours, um that if someone needs help, needs relief, that um another

midwife would help them” (P #6). A couple of participants also indicated that their co-workers supported them in challenging situations, and this made it easier to cope with the demands of midwifery work. As one participant commented, “We support each other if we experience challenging situations with clients, um so that’s very very positive” (P #2). The participant also pointed to debriefing and discussing stressful situations with their co-workers, and suggested that this was part of the supportive nature of the relationship.

For some participants, their relationships with their midwifery co-workers were positive because their interactions were “casual” and they enjoyed spending time with one another. One participant spoke about her co-workers as “friends” and stated that, “We meet every week. Um and our meetings are um uh very casual and fun. And we address what we need to work-wise um but I feel like it’s also enjoyable to spend time with them um as friends almost” (P #6).

#### ***Relationships with other healthcare professionals.***

Many participants indicated that they had positive interactions with other healthcare professionals at their hospital and this included the nurses, obstetricians, ward clerks and administrative staff. For some participants, key to these positive relationships was that there were co-workers who were advocates for midwives and as one participant commented, “What’s positive is feeling that they are advocates for us um and the nursing staff um appreciates us and respects us and you know that we’re.. um providing a good safe service” (P #6). This participant appreciated the mutual respect between the labour and delivery staff at the hospital and the midwives, and indicated that this could possibly extend her career longevity. This participant stated that:

There's varying degrees of um like cohesion, harmony, and respect between um the typical labour and delivery staff and um midwives. So, we have got a great culture here and that's the most positive part of my job, and I guess what will probably keep me in this position for a very long time (P #6).

Some participants spoke about collaborative and supportive hospital colleagues and one participant, for example, indicated that the nursing staff at the hospital provided her with aid whenever necessary stating that, "We have great support from the team at the [hospital in urban region] ... for example, the nurses. They are really helping us a lot as well whenever we need help" (P #2). A few participants spoke about working well with nurses and experiencing "team-based" care. For one participant, this included the nurses taking care of a client for a period of time so the midwife could take a break. This participant stated that:

Because we can go into a hospital and rely on a nurse to help us take care of our patients, um you know that makes the environment safer for the primary care provider, for the midwife, and the patient. Because they can have care providers who you know, have the opportunity to have something to eat and rest (P #3).

## **Theme 2: The Challenges of Midwives' Working Conditions and Health**

### **Implications**

Although all participants spoke about various aspects of their working lives that were experienced as positive, many highlighted some challenging components, and in some instances, the negative health implications (physical, mental, emotional and social)

of these challenges. The physical work involved in supporting women through labour and the use of heavy equipment necessary for assisting with a birth were reported as sometimes creating physical demands and strains and even the potential for physical injury. The sometimes long and irregular hours of work were also reported as occasionally leading to disrupted sleep patterns which could lead to physical fatigue and loss of energy. In addition, the uncertainties regarding midwives' work hours and duties as well as demanding client interactions sometimes resulted in negative mental and emotional health implications, such as stress, and the long and irregular hours of work also meant that some midwives experienced limited time and communication with their family and friends. The challenging work conditions and health implications of the challenges are discussed in more detail below.

#### **Challenging work conditions and negative physical health implications.**

Midwifery work was described by many participants as a very physical job because of the physical work involved in delivering a baby and the use of heavy equipment necessary to assist with the birthing process. The process of birth sometimes involved the midwife moving her body in different positions to accommodate the birth, and for some participants, holding an uncomfortable position for long periods of time sometimes negatively affected their physical health. Speaking about physical strain, one participant commented that, "The different physical strain that happens on the body when supporting somebody in a labour or birth um can also have uh a significant impact um on physical health as well" (P #4). Another participant noted that, "The work you are doing when the baby is born, you are not in a comfortable position all the time. So definitely physical work, it is straining on your body" (P #2). According to yet another participant,

midwives have to use their own bodies to support the women who are giving birth, and this can be physically demanding. As this participant commented, “I think the safety part is that our job doesn’t allow you to practice good ergonomics all the time because of the way people give birth instinctually, which is what we’re trying to support most of time” (P #5).

A few participants spoke about carrying heavy equipment to and from home visits, and as one participant argued, this physical work affected her physical health in a negative way, stating that, “When we do home births, we have certain equipment which is heavy and if you need to carry this up two stairs, it definitely has an effect on your body” (P #2). Another participant spoke about the potential for injuries when carrying heavy equipment on icy steps and noted that, “Repetitive strain injury and you know even just carrying heavy equipment without excellent ergonomics um on icy steps or things like that can also contribute to workplace injury” (P #4).

Many participants also reported that working irregular and long hours meant irregular and/or disrupted sleep patterns. One participant spoke about how losing sleep impacted her sleep patterns stating that, “The weeks when I’m up one or two or more potentially nights uh all night working, yeah that affects my sleep for a few days. Just, I wake up more at night” (P #3). Another participant commented that the irregular sleep patterns would have an impact on physical health over the long term, although she did not specify what these long-term physical health implications might be and argued that, “It’s a lot of irregularities for a midwife’s sleep cycle and that’s really an ongoing, an ongoing piece of this work that has an impact on physical health over the long term” (P #4).

Several participants specifically linked disrupted sleep patterns to physical fatigue. One participant, for example, indicated that changing her time of sleep often meant that she was unable to sleep for more than 4 hours, and this could create physical fatigue. This participant noted that, “I can only sleep for 4 solid hours and then I’m up and that’s an awkward amount of time to sleep because you slept 4 and then you’re like, ‘Okay half the day is still left’. But then you’re very tired again by like 7” (P #5). Another participant indicated that because of the fatigue from irregular and disrupted sleep, she was unable to attend to herself as she should. According to this participant, “There are just weeks in this line of work, and I’m sure other lines of work like medicine where you... it takes up one hundred percent of your energy. You don’t have energy to attend to any other part of yourself...” (P #3).

### **Challenging work conditions and negative mental and emotional health implications.**

Midwives care for women during an emotional time in the clients’ lives and supporting individuals in this context was reported by some participants as sometimes taking an emotional toll. Some participants spoke about experiencing stress because of the uncertainties regarding their work hours and duties and negative client interactions, and this often resulted in negative mental and emotional health implications. Speaking about this stress, one participant indicated that she had developed negative mental health impacts, such as an anxiety disorder, concentration problems, and hypervigilance. A more detailed account is provided below of the stress participants experienced as a result of the uncertainties in their work and their negative client interactions.

### ***Uncertainties associated with midwives' work hours and duties.***

Some participants indicated that sometimes they needed to work at a “moment’s notice”, and one participant spoke about finding this difficult mentally. This participant commented that, “If you know your scheduled shift is happening overnight, then you can prepare for it mentally. But we can be kind of... at a moment’s notice, up all night and working all night. Um so there really isn’t an ability to plan your day around it” (P #3). A few participants also emphasized that having to mentally prepare for any potential emergency at a moment’s notice was challenging because of the uncertainties related to the emergency. For at least one participant, these uncertainties were related to the possibility of their clients experiencing trauma. This participant stated that, “I think in any acute clinical scenario, any acute clinical care setting, I’ll correct myself, um there is a risk of vicarious trauma and trauma from emergencies from interacting with um clients’ personal challenges” (P #4).

One participant mentioned that her clients sometimes owned things that she did not typically choose to be around, and these uncertainties regarding her safety during home visits could sometimes affect her mental and emotional health in a negative way.

### ***Stressful client interactions.***

Some client interactions were experienced as stressful for a few participants because they believed that their clients sometimes expected too much from the midwives, and this sometimes meant that the participants were unable to meet their clients’ every need. Key to these stressful client interactions were some clients’ unnecessary and/or unrealistic expectations. For one participant, interacting with clients who wanted unnecessary or unwarranted testing was stressful because she felt like she needed to be a

good steward of healthcare resources. This participant commented that, “One of the more challenging things is having clients um who have demands for testing that I, as a clinician, feel is unnecessary, um unwarranted and um not clinically indicated” (P #6). Some clients were perceived by a few participants as having “unrealistic” perspectives on birth because they [clients] expected the midwives to be able to perform any kind of delivery regardless of their specific circumstance. One participant argued that having clients’ place their unrealistic expectations on midwives could be stressful because it could potentially “exhaust” the midwives. The participant stated that, “There’s clients that totally exhaust me over what they are wanting from their birth plan that I’m like, ‘We can’t necessarily control that’ and they don’t understand ... because they’ve never been to a birth” (P #5). Another participant felt that some clients had “unreasonable” expectations of the healthcare system as they requested services or resources that were not provincially funded or included in their health plan. According to this participant, “If you have a disposable income, you can kind of buy whatever you want. You can make those choices. It’s your money. But the difference with healthcare is that it’s not necessarily your money. It’s everyone’s” (P #6).

### **Challenging work conditions and negative social health implications.**

Midwives often worked during periods when family and friends might be socializing, and some participants indicated that this negatively affected their social life because of the limited time they was able to dedicate to these social relationships. One participant commented that, “You work the weekends. Um you work in the night. Or you go to bed when other people get up in the morning. So, this is definitely an effect it has



on your life” (P #2). Another participant stated that her work schedule typically influenced her social life.

The irregular and long work hours as well as the on-call work also made it difficult for some participants to find the time to travel and visit family who lived a distance from them, and one participant noted that missing holidays and special occasions, such as Christmas, could sometimes take a social and emotional toll on her.

Working as a midwife means working on-call for long periods of time and for some participants this meant that they were only “partially” available to their family and friends. For example, one participant noted, “Occasionally when I’m with people, it gets interrupted by calls from clients, or um I have to run away from something that I would like to stay at because I have to go and attend to somebody” (P #6). A few participants, however, indicated that spending time with family and friends while working on-call was possible as long as they could ensure that they were ready to be called into a birth at a moment’s notice. As one participant noted, she needed to always be “accessible” to her clients. The participant also highlighted the importance of planning her schedule ahead of time to ensure that she could attend special events with her family and friends.

For some participants, their long and irregular hours of work, and the resulting stress, disrupted their communication with their family, and in this way, negatively affected their social relationships. For example, one participant spoke about being less available as a “community” or “family” member because of her physically and mentally demanding work life and indicated that this disrupted her communication with her family. This participant noted that, “There certainly is an impact on how available I can be as a community member, or um family member, or friend to the other people in my

life um based on how emotionally, or physically, or mentally taxing my work life is” (P #4).

### **Theme 3: Working as a Midwife in the Healthcare System**

When speaking about working as a midwife within the Nova Scotian healthcare system participants detailed how midwifery was organized in the province and highlighted some key provincial supports and challenges. Some participants noted that the provincial healthcare system offered the midwives certain employee benefits and sleep relief practices that were aimed at protecting the midwives’ health and safety when working. Although these supports were experienced positively, some participants indicated that practicing as a midwife in the Nova Scotian healthcare system came with certain challenges because of the limited number of midwives in the province, limited awareness about midwifery, and the hierarchy in healthcare, which made it difficult to continue to work in this profession.

#### **Provincial supports.**

##### ***Employee benefits.***

Several participants indicated that working as an employee within the provincial healthcare system came with certain benefits that made them feel appreciated including a good pension plan, health plan, and paid sick days. Speaking about an employee benefit, one participant highlighted a formal policy that ensures they can access the hospital safely if there are poor weather conditions by providing accommodations at a hotel close to a hospital. This participant stated that, “I think it might be a more formal set out by Nova Scotia Health or by the hospital that I have privileges at um but uh in really poor

weather, the hospital will put us up uh in a nearby hotel to try to um prevent us from needing to uh commute to our clients, to the hospital in really poor weather” (P #6).

For many participants, receiving regular time-off as a midwife was another key employee benefit that protected their health because it meant that they had “reasonable limits” on their working hours. There was no expectation for midwives to work during their off-time, and for one participant receiving this time-off made her feel “valued” as an employee in the Nova Scotian healthcare system. According to this participant, “In my experience working in Nova Scotia and having worked in other provinces, is just that there is more of a value in this province in you as a whole human. So, you know we are guaranteed regular time off” (P #3). For one participant, receiving guaranteed paid vacation time protected the midwives’ basic human rights by allowing them to get a break from their working hours.

### *Sleep relief practice.*

A positive practice that was supported by the healthcare system and was perceived as important to many participants’ health and wellbeing was their sleep relief which was a practice that helped determine how long the midwives worked. For example, when a midwife had been working on-call for at least 10 hours, another midwife would come and automatically relieve her from her work duties. Since this practice set the midwives’ hours of work they did not have to decide when to stop working, and the practice helped ensure the midwives’ health as well as the safety of their clients. Having sleep relief that was “automatic” and “standard” was important because it made it less burdensome for the midwives who would otherwise need to mentally assess how rested they felt. As one participant commented, “That [sleep relief] to me is very important. The

fact that it's standard. It's not something that you have to decide about. It's automatic. Uh it takes the pressure off of you having to gage how rested you feel" (P #3).

A few participants indicated that the sleep relief practice helped instill safe and positive working conditions among the midwives because it allowed the midwives to take breaks from work when they were mentally and physically exhausted. For one participant, knowing that another midwifery co-worker was going to "automatically" relieve her from her work duties was motivating because it meant that she was not going to work a long shift and, in this way, the sleep relief practice protected her health and safety. This participant commented that, "I think sleep relief is key. It's super important to safe practice and working conditions. So being able to know that at 8am, another midwife is coming to relieve you no matter what, uh not having to push through and work on, having been awake for 24 hours. That's really key" (P #3). Another participant mentioned that by helping the midwives get regular rest, sleep relief not only helped to protect the midwives' mental and physical health, but also possibly improved their long-term retention in the midwifery field.

### **Provincial challenges.**

Although many participants spoke about various employee benefits as well as some workplace health and safety practices provided by the provincial healthcare system, many emphasized some challenging components such as the limited number of midwives, the limited public awareness about midwifery, and the hierarchy in healthcare, that made it difficult to work as a midwife in the Nova Scotian healthcare system. Each of these challenging issues are discussed in turn below.

*Limited number of midwives.*

Many participants indicated that even though there was a high demand for midwifery in the province there were still a limited number of midwives compared to the birthing population. Several participants mentioned that despite a 2011 external assessment that recommended increasing the number of midwives to 20 full-time positions by 2016, this goal had still not been met in 2022. Many participants highlighted the need for more midwives in Nova Scotia and one participant indicated that the province's lack of funding to increase the number of midwives was "tough" because it meant that the midwifery profession was unable to expand and meet its growing demand in Nova Scotia. This participant commented that, "The demand is high um all across the province and that lack of growth, like an inability to expand um.. yeah, that's tough" (P #3). One participant suggested that the province implement a midwifery educational program although a few participants indicated that Nova Scotia could not sustain a midwifery educational program because of the limited number of midwives and lack of available midwifery positions in the province.

For some participants, having a limited number of midwives in Nova Scotia meant that the practicing midwives were "restricted" in terms of flexible work arrangements, and one participant experienced this negatively because she felt "forced" to work full-time and on-call. This participant stated that, "Midwives are stuck in this kind of work that we are working at the moment. So you need to be on-call and either you work full-time. We don't even have the chance to say 'oh, I'm working just uh 75% position'" (P #2). Not having the ability to work in flexible arrangements made it challenging for some participants to pursue other activities, such as leisure activities or

further education. One participant stated that she disliked being restricted in this way because of the challenging nature of working on-call and argued that this lack of flexibility prevented her from pursuing further education in midwifery.

Several participants spoke about feeling restricted in their scope of practice and this meant that they were “stuck” doing the same set of duties with their clients (e.g., attending births, working on-call, and providing prenatal and postpartum care). A couple of participants compared Nova Scotia to the other Canadian provinces where midwives were allowed to perform a range of midwifery duties, such as contraceptive care, pap smears, and abortion care, and indicated that the midwives practicing in Nova Scotia did not enjoy this same flexibility. Not having the ability to provide these duties, as well as not being able to teach midwifery or not having the ability to counsel clients was experienced negatively among a few participants because it made them feel like they were not “full” midwives. One participant indicated that this restricted scope of practice was harmful because it meant that the midwives were unable to take on duties that were better suited to their particular situation including their health. This participant stated that:

There’s never an opportunity to be like, ‘My health is suffering. I need a more regular um work schedule, one that doesn’t involve being up overnight. Could I provide um contraceptive care? Could I do pap smears? Could I do abortion care?’ (P #5).

Having a limited number of practicing midwives in the province also meant that it was difficult for some participants to find adequate short-term coverage, or even take a sick leave, without feeling like they were a burden on their midwifery co-workers.

According to one participant, having a limited number of practicing midwives in Nova Scotia meant that there was an additional amount of work placed on each individual midwife and by keeping their numbers small, the province was gradually “burning out” current midwives.

***Limited healthcare system and public awareness about midwifery.***

Many participants indicated that their restricted scope of practice was partly due to the lack of awareness about midwifery by individuals working within the healthcare system. The lack of awareness about who midwives were, what they could do, and their scope of practice, not only resulted in the midwives being unable to work within their full scope of practice but also led to the midwives performing tasks that were meant for other healthcare providers and/or professionals. For example, some participants noted that when there were limited hospital staff available, such as nurses or administrative staff, midwives were often used to fill the gaps and, for example, perform administrative duties such as scheduling clients, instead of carrying out their own midwifery duties. One participant indicated that midwives are not viewed as “essential” and commented that, “We aren’t always expected because we are unfortunately so few and so we’re still seen, as you know, this like additive to the healthcare system and not essential. Um so that comes up a lot of the time where you just feel unexpected” (P #3). This unexpectedness made some participants feel that they, as midwives, had to keep explaining their profession. One participant commented that midwives were not celebrated like other healthcare providers, and this participant also noted that she had to inform her hospital about International Day of the Midwife. Another participant commented on the need to have to explain their role as a midwife within the hospital setting suggesting that:

I just imagine that if I were somebody like a nurse, you know I wouldn't have to... when I'm calling up a pharmacy for example, ask for what I need from the pharmacist but then also explain who I am, and why I'm calling, and what I do, and how I do it, and why I should be doing it, and it..it's tough (P #3).

A few participants spoke about other healthcare providers and/or professionals being unaware of their guidelines or scope of practice, and this could often lead to the midwives being treated as if they were not capable of performing the duties required by their job. One participant, for example, spoke about an interaction she shared with a lab manager employed at her hospital, where she felt she had to constantly explain and advocate for her profession because this manager was unaware of who midwives were.

A couple of participants spoke about Nova Scotia being physician-focused and indicated that the "doctor knows best" perception was supported in the healthcare system because the province had made multiple efforts to recruit and retain obstetricians but no such efforts were made for the midwives. According to one participant, "You hear so often uh in the media about physician recruitment and retention and I have never heard, not one time, in the media about midwifery uh recruitment and retention" (P #3). Another participant indicated that the potential of midwifery was not recognized in Nova Scotia and commented that, "I worked in a different country where midwifery was the norm, and so I have a hard time when we're like the fringe on-the-side profession that people still don't know about and government doesn't even really, I don't think, understand anything about how much we could do" (P #5).



Some participants indicated that the physician-focused perception could possibly negatively influence the way midwifery was perceived by the public because the lack of awareness of midwifery meant that the individuals working within the healthcare system, as well as the clients themselves, did not have a clear understanding of the value of midwifery care. Another participant emphasized that a human tribunals case from another Canadian province proved that midwifery had been undervalued by that province's healthcare system because it was a female-dominated profession and indicated that this gender discrimination possibly affected the way midwifery was perceived and understood by the public in Nova Scotia. According to this participant, "They won their case to say that the work of midwives, um partly because it's mostly women caring for mostly women, has been undervalued by the healthcare system in that province since it was regulated" (P #3).

For one participant, the limited understanding of midwifery affected her working experiences in a negative way because it made her feel less valued by the healthcare system.

### ***Hierarchy in healthcare.***

Some participants indicated that because midwifery was a female-dominated profession, midwifery was perceived as having less status than medicine which was rooted in a history of patriarchy. Speaking about this gender discrimination, one participant suggested that even female obstetricians might possibly oppose the growth of midwifery services in Nova Scotia because of their experience in the patriarchal institution of medicine. This participant noted, "They've gone through med school, such

a patriarchal institution, that I think there's lots of examples where they perpetuate the patriarchy even as women um in their roles as obstetricians" (P #5).

Some participants spoke about physicians in Nova Scotia having the "ear" of the government because their voices were heard, such that they were often involved in provincial health decisions, thus possibly contributing to the hierarchy in healthcare. One participant also indicated that physicians might oppose the expansion of midwifery services because it could possibly lead to a loss in revenue for the physicians According to this participant, "They're [physicians] working fee-for-service and you know if we're doing some of those services, that's potentially a loss of um of the money that they make. What's the word for that? I don't want to say revenue ... but um yeah. So that's part of it. Part of the hierarchy" (P #6).

#### **Theme 4: Midwives' Recommendations to improve their Working Conditions in Nova Scotia**

When asked about their suggestions to improve midwives' working conditions in Nova Scotia, several participants indicated that investing more funding in the profession would help, and some participants also recommended that there be more public awareness about midwifery. It was also recommended that the province improve the midwives' working conditions by listening to midwives' voices and involving them in decision-making processes in the healthcare system. Each of the three key recommendations are discussed below.

##### **Increase funding for midwifery.**

Several participants indicated that there needs to be more funding dedicated to midwifery because with more funding the healthcare system could possibly overcome

some of the prevailing issues midwives face such as the limited number of midwives. Hiring more midwives would allow midwifery to be a more sustainable profession because, as some participants indicated, it would mean more coverage for the current workers so that they would not be overburdened if another midwifery co-worker needed to take a sick leave or time-off. One participant spoke about how increasing the number of midwives would help to improve the midwives' balance between work and home. This participant noted, "We absolutely need more midwives in this province because the more people you have, uh the more coverage can be provided and that supports more work-life balance" (P #3). Another participant indicated that hiring more midwives would also potentially give the practicing midwives more opportunity to work in flexible arrangements in terms of hours of work and types of duties, and in this way, also would improve their work-home balance. As this participant commented,

I feel what would be helpful for midwives in our province would be to have more midwives working um and give them more flexibility, how they can work and provide their expertise to the communities. Um and then you may have different work hours, or you may have different opportunities (P #2).

Having more government funding, and more midwives, might allow midwives to extend their scope of practice to provide services "outside" of birth (e.g., providing birth control, abortion care, and counselling services). According to one participant, having midwives provide these services could possibly help improve the long waitlists for these services. Allowing midwives to extend their scope of practice appeared to be important to

most of the participants because having just “one” way of working was, according to one participant, not always protective of one’s individual health and needs as a midwife.

Having more funding might also allow for the hiring of midwives from African and Indigenous communities. A number of participants highlighted this as a priority. The current model of midwifery was described by one participant as a “euro-centric” one that did not best meet the needs of people from diverse these communities. This participant commented that, “I’m not convinced that um the current model is one that really supports the diversity of employees. It is built for a particular, um a particular type of midwifery care, and um may not, may not best serve all communities or all midwives” (P #4). Some participants also indicated that hiring more Indigenous and African midwives would make the profession more accessible to birthing people from these communities because as one participant indicated, they would be labouring with a care provider from their own background who they were comfortable with, and within a system that they helped “create”. This participant commented that,

In Canada, midwives are trying to make sure that the voices of Indigenous midwives are put forward too. Um so for Indigenous midwifery, or for Indigenous people in Canada, First Nations and things, um they .. deserve to give birth in their communities too, and with people that they feel comfortable, within a system that they helped to create (P #6).

Hiring more midwives might also increase the possibility of expanding the midwifery service to the rest of the province and, as one participant indicated, this would allow people living in other, more rural, regions to easily access midwifery care. As this participant stated, “It’s only available in three regions ... so there are some people who

just don't have the option of midwifery care, or of home birth, or some people who travel great distances to um uh to obtain care" (P #6).

Although hiring more midwives was emphasized as a way to improve the midwives' working conditions in Nova Scotia, attracting and retaining midwives in the province was highlighted as a challenge that could potentially interfere with the hiring of midwives. A few participants indicated that with increased funding the province could implement certain programs or incentives, such as student loan forgiveness, relocation bonuses, and retention bonuses. These types of programs might help to attract and retain midwives in Nova Scotia. As one participant noted:

I think what would be really great is if we had, if there was um maybe like funding or a bursary, if there was some way to um get more Nova Scotians, or people who want to practice in Nova Scotia, into midwifery schools in the rest of the country (P #6).

#### **Increase awareness about midwifery.**

Several participants indicated that there needed to be more public education about midwifery and awareness among those working in healthcare about the profession because of the significant lack of awareness of the midwifery profession in Nova Scotia. Educating the public and healthcare professionals about the range of duties of midwives might help to build the advocacy needed to pressure the government to take steps towards modifying policies and expanding midwives' scope of practice in Nova Scotia. For one participant, having more awareness about midwifery might also help to create changes in how obstetricians practice and reduce some healthcare costs. For example, by regulating obstetricians to only work on specialty care, midwives would be able to provide care for

women with low-risk births at a lower cost than obstetricians. Healthcare in Canada, however, is provincially legislated so the regulation for obstetricians to only perform specialty care would need to be a provincial determination that is endorsed by the Society of Obstetricians and Gynaecologists of Canada. One participant commented on this issue as follows:

It looks like midwifery will meet that demand at a lower cost. Um and free up physicians who do specialty care to just do specialty care as opposed to our obstetricians and gynecologists being tied up with low-risk birth, which is what we could easily take over (P #5).

#### **Listen to the voices of midwives.**

Some participants indicated that they did not believe they had a voice to advocate for themselves or to grow or develop the midwifery profession in the province. Listening to the midwives' voices and involving them in decision-making processes at government levels (for example, the Nova Scotia Department of Health and Wellness) could, according to a couple of participants, help individuals working within the healthcare system understand the midwives' visions for the midwifery profession in Nova Scotia. As one participant commented, "It would be great if midwives are at certain tables and um can bring to the government what our visions are, and what we can see, and where we can help the healthcare system really and the communities" (P #2). Speaking to practicing midwives might help them feel more like they are a priority, and by listening to the midwives on how to improve their working conditions the midwifery profession might become more sustainable in Nova Scotia. One participant spoke about the importance of listening to former midwives in Nova Scotia because understanding their reasons for

leaving the profession could possibly help policy-makers develop strategies to mitigate challenging working conditions.

A few participants spoke about the Nova Scotian healthcare system employing a midwifery specialist, or advocate, to work alongside both the midwives and the Nova Scotia Department of Health and Wellness. This employee could represent the voices of midwives at government levels and thus help to improve their working conditions in Nova Scotia. One participant highlighted the importance of the position by stating that, “I think we also should have kind of a midwifery specialist or something. A midwifery coordinator who is aligned with the Department of Health to make recommendations, to explore options, to evaluate situations ... this would be, I think, a very important position” (P #2).

### **Summary**

All the participants described performing a variety of duties as part of their work such as clinic work, phone appointments and home visits with clients, as well as attending births. Based on the information they shared, they experienced both positive and negative working conditions. Participants enjoyed the variability of their work tasks, environments and schedules, and appreciated their positive work relationships with clients, co-workers and other healthcare workers. Some negative working conditions experienced by the participants were their long and irregular hours of work. The challenging conditions had negative implications for some in terms of their physical, social, emotional, and mental health. Participants discussed the key employment supports (e.g., sleep relief) as well as the system challenges (e.g., the limited number of practicing midwives) that affected their working experiences. Participants also provided three

recommendations to help improve the working conditions of midwives in Nova Scotia including dedicating more funding towards midwifery, building more awareness about the profession, and listening to midwives' voices in government decisions about healthcare.



## **Chapter 5: Discussion**

The participants in this research discussed their positive and negative working conditions, as well as the health implications of these conditions, and some provided a few suggestions to improve their working conditions. The participants also spoke about their experiences working in the Nova Scotian healthcare system. The study findings affirm some findings from the existing literature such as the demands of midwives' working lives, the emphasis on physician-led care over midwife-led care in the healthcare system, and the need for more midwives (Behruzi et al., 2017; Fathnezhad-Kazemi et al., 2022; Hunter & Warren, 2014; Thapa et al., 2021; Zeytinoglu et al., 2022). This chapter discusses the key findings relative to the existing literature, as well as the implications of the findings. This chapter also includes some suggestions for future research.

### **The Ongoing Challenges of On-Call Hours**

A key working condition highlighted as challenging and in need of a change by study participants is the on-call hours. A number of participants spoke about sleep deprivation and disrupted sleep patterns affecting their physical health negatively, and this is consistent with existing literature concerning many healthcare providers. Physicians and nurses, for example, often work long hours on-call, and because the on-call hours sometimes extend overnight this can result in disrupted sleep, sleep disorders, fatigue, and work-related stress (Arnedt et al., 2005; Gustavsson et al., 2021; Kecklund & Axelsson, 2016; Landrigan et al., 2004; Lockley et al., 2004; Vallières et al., 2014; Warren & Tart, 2008). Night call shifts that last 24 hours or more have been found to result in sleep deprivation among physicians, and this can negatively affect their physical and mental health and subsequently impact the quality of their work (Arnedt et al., 2005;

Gustavsson et al., 2021; Kecklund & Axelsson, 2016; Landrigan et al., 2004; Lockley et al., 2004). Physicians' sleep cycles and recovery have also been found to be influenced by the length, intensity, and mentally demanding nature of night-call shifts (Malmberg et al., 2010).

Existing research has also found that on-call work can affect healthcare providers' social relationships because even though providers do not always actively work when they are on-call, being on-call does mean that they need to be ready to go to work at a moment's notice (Dent, 2018; Fereday & Oster, 2010; Olmstead et al., 2014). The impact of on-call hours on social relationships is also consistent with what a number of midwives in the current study reported. A number of midwives indicated that because of the extended hours they spend working on-call they have limited time to dedicate to their social relationships and this often means that they cannot commit to social activities with their family and friends.

Existing research has found that because Canadian midwives work on-call for extended hours, they [midwives] desire policies and guidelines that limit consecutive 24-hour workdays (Zeytinoglu et al., 2022). Many Canadian midwives also hope for fewer weeks of on-call work, with some even preferring to never be on-call (Zeytinoglu et al., 2022). Although the sleep relief practice wherein a midwife is relieved from on-call by another worker helped some participants combat the difficulties associated with on-call work, sleep relief is typically available to midwives in Nova Scotia only after they have worked for a consecutive 24 hours on-call. Some participants reportedly have learned to adapt to their on-call work schedules by ensuring that they do not commit to any social activities when on-call but some still find on-call work to be challenging.

Hiring more midwives to work in Nova Scotia was a key recommendation provided by a few participants, and if implemented this recommendation would possibly allow the current workers to work in more flexible and sustainable arrangements by limiting the amount of time they would need to be on-call. Having more midwives might mean that the current workers do not stay on-call for a consecutive 24 hours, and this could possibly improve their sleeping patterns, social health and mental health. Improving the midwives' health might mean that they are less likely to leave their profession, so this could possibly also lead to an improvement in the retention rates of midwives in Nova Scotia.

### **Strategies for Managing Challenging Work Conditions**

The participants in this study of midwives found on-call work to be challenging but they also reported how they have adjusted to their demanding working lives by organizing their social lives according to their work schedules. A number of participants indicated that they typically assume that they are not available for household or social activities on days when they are working and have thus learned to adjust their expectations regarding their home lives. Participants who have fewer home responsibilities, such as no children, also reported that they typically allow their home lives to be organized around their work.

Existing literature has found that because midwives experience challenges with their working conditions (e.g., on-call work, high workplace demands) they sometimes find it difficult to balance their work and home lives (Bloxsome et al., 2020; Fereday & Oster, 2016; Zeytinoglu et al., 2022). Fereday and Oster's (2016) research has found, for example, that midwives often find it difficult to stop thinking about their work when not

at work, and typically tend to constantly think about work during their off-time. My study findings add to the literature because even though a few participants found it challenging to completely switch off from work, some participants appear to have no difficulty with disconnecting from work during their off-time. My study findings also suggest that many participants often attempt to create clear boundaries between work and home and typically try to dedicate their off-time to both their social life and self-care activities, and this appears to be protective of their health.

### **Strategies to improve midwives' mental health.**

Some participants in this study suggested that the feelings of uncertainty regarding their work hours such as not knowing when or why they would be suddenly paged by a client, can sometimes lead to stress and negatively affect their mental health. Based on existing literature, one potential strategy to reduce midwives' work-related stress and improve their wellbeing is to implement mindfulness training (Hunter, 2016; Hunter et al., 2018). By promoting nonjudgmental acceptance and using meditation techniques mindfulness enables one to explore one's thoughts and emotions including ruminative and destructive thought patterns (Hunter, 2016; Hunter et al., 2018). Existing qualitative literature has confirmed that mindfulness training allows midwives to create a quiet mental space and reduce work-related stress (Hunter, 2016; Hunter et al., 2018). Mindfulness training has also been found to improve midwives' self-efficacy and confidence and this, in turn, can lead to a perception of being better midwives and in this way improve their mental health (Hunter et al., 2018).

## **The Relative “Invisibility” of Midwives within the Healthcare System**

The findings from this study of Nova Scotian midwives suggest that some midwives feel relatively invisible as workers in the healthcare system, and such invisibility may be related to midwifery as a female-dominated profession. Midwifery is a gendered profession not only because most midwives identify as female but also because their work is focused on caring for female sexual and reproductive health (Christianson et al., 2022). Other researchers have also pointed to the “invisibility” of other healthcare workers partly due to gender discrimination within the healthcare sector (Armstrong et al., 2016; Memmott et al., 2022; Syed, 2021). Gender discrimination exists because of the gendered consequences of subordinate relations which often result in women being on unequal terms to men or treated as inferior to men (Armstrong et al., 2016). Armstrong et al. (2016) suggests that female-dominated healthcare work is often considered “ancillary” because of the domination of the medical model of healthcare which has historically been male. The medical model of healthcare appears to have an impact on how midwives are currently treated and perceived in the healthcare system.

The invisibility that many participants in my study appear to experience as healthcare providers in Nova Scotia may also be because they often work alongside individuals who are not aware of their work. At least some healthcare professionals and/or providers are unaware of the work of midwives despite working in the same hospital as the midwives. Some healthcare providers in Nova Scotia are also not aware of the vast range of duties encompassed within midwives’ scope of practice suggesting that there may be a lack of role clarity. According to Thumm and Flynn (2018), “role clarity is the extent to which providers understand their own function and the function of other

team members, including specific responsibilities, objectives, and expectations, within the context of the work environment” (p. 100). My study suggests that at least some healthcare providers, such as some physicians, are unaware of midwives’ various skills, functions or scope of practice and this might contribute to the participants’ feelings of invisibility within the healthcare system in Nova Scotia.

The study findings also suggest that midwives in Nova Scotia are often overlooked in government decisions regarding midwifery because decisions are often made for them by people who do not understand their profession. Similar findings have been reported by midwives working in other Canadian provinces (Thiessen et al., 2020). For example, a study conducted by Thiessen et al. (2020) found that midwives in Manitoba must continually justify their professional status within the healthcare system in which they work. This study has also confirmed that because midwives are often managed by individuals who are not midwives themselves, decisions are often made for them [midwives] by individuals who have minimal understanding of the midwifery profession (Thiessen et al., 2020).

Some participants in my study suggested that having someone familiar with midwifery provide input or advice to government or policy decision makers might help address or improve some of their challenging working conditions. This points to the need for more midwifery representation at decision-making levels. Having more awareness about midwifery among both the individuals working within the healthcare system and the public can also possibly bring attention to some of the midwives’ negative working conditions in Nova Scotia and resulting health implications.

One possible strategy to increase awareness of midwifery among healthcare professionals is through interprofessional education in maternity care. Maternity care providers in Canada, such as midwives, physicians, and nurses, are educated in separate institutional programs. For example, midwives attend a four-year undergraduate midwifery education program whereas physicians attend a four-year post-graduate medical education program as well as up to six years of residency training (Canadian Association of Midwives, 2022). Hence, different healthcare providers who have had limited or no interaction during their education or training may be unaware of one another's scope of practice, and may consequently experience challenges, such as overlapping roles and responsibilities, and may lack mutual respect when working collaboratively (Meffe et al., 2012). In Canada, the interprofessional education (IPE) initiative was developed in response to the country's crisis regarding maternity care, and the goal of this initiative was to encourage students to learn with, from, and about each other (Meffe et al., 2012). In 2008, a group of maternity care providers and academics in Ontario collaborated to design an IPE pilot program in maternity care which consisted of six workshop modules and two clinical shadowing experiences for undergraduate students in medicine, nursing, and midwifery (Meffe et al., 2012). Meffe et al. (2012) have confirmed that this type of IPE program has helped maternity care students understand their similarities and differences, and has therefore resulted in increased awareness, mutual understanding, and positive interprofessional relationships.

The establishment of an IPE program focused on maternity care in Nova Scotia could potentially lead to an interprofessional and collaborative approach to birth. Macdonald and Etowa (2021) have indicated that interprofessional collaboration between

midwives and nurses in Nova Scotia can potentially represent a transformed approach to maternal care. Establishing a model of maternity care that is led by midwives and nurses, two historically female-dominated professions that desire representation within policy development, health system leadership, and decision-making levels, can potentially help re-orient the Nova Scotian healthcare system towards a more woman-centred and person-centred approach (Macdonald & Etowa, 2021). This type of approach would be informed by the values guiding Canadian midwives' philosophy of care, such as, choice of birthplace and working in partnership with clients, and would position midwives and nurses working together as teams in communities, homes, and hospitals across Nova Scotia.

### **Study Implications**

One goal of health promotion is to improve the living and working conditions of individuals (Terry, 2022). This study of midwives in Nova Scotia indicates that policies are needed to improve, or modify, midwives' working conditions to better support the midwives' health. Policies aimed at providing more resources for midwifery including the number of midwives currently working would not only help to improve the health of midwives but would also mean that more clients could be provided with the opportunity to experience midwifery care and its benefits. At present, there is limited government action to attract or retain midwives to the province, especially in comparison to other healthcare providers (such as, physicians or nurses) and yet such action is needed.

Policies that promote a re-orientation of health services to help reduce the hierarchy in healthcare would also support the health of midwives. The current hierarchy within healthcare means that some healthcare providers in the healthcare system are



treated with more respect and enjoy enhanced status and power when compared to others (Behruzi et al., 2017). This hierarchy has resulted in some negative impacts or disadvantages for midwives practicing in Nova Scotia, and midwives are often overlooked in government decision-making. There is a need to hear the voices of midwives, and ensure that the midwifery profession is appropriately recognized within the healthcare system.

### **Limitations**

There are some limitations to this study. One limitation is that the COVID-19 pandemic may have impacted recruitment and thus the number of midwives volunteering to participate. I began recruiting participants in December 2021 and completed recruitment and data collection in March 2022. During this time, there were various COVID-19 public health restrictions that may have increased the workloads of midwives, and limited the time they had available to participate in a research study.

Another limitation that may have affected recruitment was that there are a relatively small number of midwives practicing in Nova Scotia. Given the small population of midwives in the province some individuals may have feared they might be identified. The study recruitment material did emphasize that all information was confidential and various strategies were implemented to help ensure confidentiality but regardless, some may have not been comfortable with volunteering.

### **Future Research**

There are a few potential areas for future research based on the study findings. For example, research could be conducted with midwives and policymakers on what specific policies could be implemented to increase the number of midwives working in

the province. Further, future research could explore the potential barriers, which could be fiscal, social, or legislative, to implementing policies related to such policies. Conducting research with former midwives who have previously worked in Nova Scotia but have since left the profession about why they left is another potential area for future research. Hearing the voices of previous midwives is important as they may be able to provide suggestions related to retention in their profession. Additionally, conducting research on new mothers' perspectives of the care they received from midwives in Nova Scotia could potentially help increase awareness of midwifery care and its benefits. This type of research might be important in helping to increase provincial resources for midwifery.

### **Knowledge Translation**

This research is part of an MA thesis and the thesis will be available through the Dalhousie University library system. A community report of the study findings will be developed with the help of my research supervisor and supervisory committee and will be distributed to the Midwifery Coalition Council of Nova Scotia (MCNS). The community report will also be sent to study participants who have indicated on the consent form that they wish to receive the study findings. In addition, the study findings might be presented at relevant conferences and events, and to community groups that might be interested in the findings. Furthermore, the study findings might be presented to key stakeholders such as students within the healthcare professions (e.g., medicine, nursing) that could benefit from learning about midwifery. Learning about midwives and their working conditions in Nova Scotia might help these groups work more collaboratively with midwives when they enter the working world, and may even help them to understand the need to advocate for the midwifery profession.

## **Conclusions**

In this study, I have found that midwives practicing in Nova Scotia encounter both positive and challenging working conditions, and that there are a number of physical, mental, emotional, and social health implications as a result of the challenging working conditions. These challenges include working on-call, midwives' voices being overlooked in government or healthcare decisions, and midwives being viewed as subordinate when compared to other healthcare providers, such as physicians or nurses.

Ensuring that midwives do not feel “invisible” within the healthcare system is key to addressing some of the working challenges they continue to face. There is also a clear need for more midwives in Nova Scotia. Having more midwives could possibly allow the current midwives to spend less time on-call and help them work in more flexible arrangements (for example, work part-time instead of full-time). Increasing the number of midwives in Nova Scotia may also allow the current workers to expand their scope of practice thus allowing them the opportunity to provide birth control, pap smears, and abortion care. This could potentially improve midwives' working conditions in Nova Scotia, and might possibly also improve retention in the midwifery profession.

## References

- Armstrong, P., Armstrong, H., & Scott-Dixon, K. (2016). *Critical to care: The invisible women in health services*. University of Toronto Press.  
<https://doi.org/10.3138/9781442687790>
- Arnedt, J. T., Owens, J., Crouch, M., Stahl, J., & Carskadon, M. A. (2005). Neurobehavioral performance of residents after heavy night call vs after alcohol ingestion. *JAMA*, 294(9), 1025. <https://doi.org/10.1001/jama.294.9.1025>
- Association of Nova Scotia Midwives. (2022). *About the ANSM*. Retrieved from <https://www.novascotiamidwives.ca/about-the-ansm/>
- Banovcinova, L., & Baskova, M. (2014). Sources of work-related stress and their effect on burnout in midwifery. *Procedia, Social and Behavioral Sciences*, 132, 248–254. <https://doi.org/10.1016/j.sbspro.2014.04.306>
- Behruzi, R., Klam, S., Dehertog, M., Jimenez, V., & Hatem, M. (2017). Understanding factors affecting collaboration between midwives and other health care professionals in a birth center and its affiliated Quebec hospital: A case study. *BMC Pregnancy & Childbirth*, 17, 1–14. <https://doi-org.ezproxy.library.dal.ca/10.1186/s12884-017-1381-x>
- Benoit C., & Heitlinger A. (1998). Women's health care work in comparative perspective: Canada, Sweden and Czechoslovakia/Czech Republic as case examples. *Social Science & Medicine*, 47(8), 1101–1111. [https://doi-org.ezproxy.library.dal.ca/10.1016/s0277-9536\(98\)00123-3](https://doi-org.ezproxy.library.dal.ca/10.1016/s0277-9536(98)00123-3)
- Benoit, C., Zadoroznyj, M., Hallgrimsdottir, H., Treloar, A., & Taylor, K. (2010). Medical dominance and neoliberalisation in maternal care provision: The

- evidence from Canada and Australia. *Social Science & Medicine*, 71(3), 475–481.  
<https://doi.org/10.1016/j.socscimed.2010.04.005>
- Biggs, L. (2004). Rethinking the history of midwifery in Canada. In I. L. Bourgeault, C. Benoit, & R. E. Davis-Floyd (Eds.), *Reconceiving midwifery* (pp. 17–45). Montreal, Quebec: McGill-Queen’s University Press.
- Blais, R., Lambert, J., Maheux, B., Loiselle, J., Gauthier, N., & Framarin, A. (1994). Controversies in maternity care: Where do physicians, nurses, and midwives stand?. *Birth: Issues in Perinatal Care*, 21(2), 63-70.
- Blegen, M. A., & Mueller, C. W. (1987). Nurses' job satisfaction: A longitudinal analysis. *Research in Nursing & Health*, 10(4), 227–237. <https://doi-org.ezproxy.library.dal.ca/10.1002/nur.4770100405>
- Bloxsome, D., Bayes, S., & Ireson, D. (2020). “I love being a midwife; it’s who I am”: A glaserian grounded theory study of why midwives stay in midwifery. *Journal of Clinical Nursing*, 29(1–2), 208–220. <https://doi-org.ezproxy.library.dal.ca/10.1111/jocn.15078>
- Bonaparte, A. D. (2014). “The satisfactory midwife bag”: Midwifery regulation in South Carolina, past and present considerations. *Social Science History*, 38(1/2), 155–182. <https://doi-org.ezproxy.library.dal.ca/10.1017/ssh.2015.14>
- Bourgeault, I. L. (2000). Delivering the ‘new’ Canadian midwifery: The impact on midwifery of integration into the Ontario health care system. *Sociology of Health & Illness*, 22(2), 172-196.

- Bradfield, Z., Duggan, R., Hauck, Y., & Kelly, M. (2018). Midwives being ‘with woman’: An integrative review. *Women & Birth, 31*(2), 143–152. <https://doi-org.ezproxy.library.dal.ca/10.1016/j.wombi.2017.07.011>
- Bryant, A. & Charmaz, K. (2007). *The sage handbook of grounded theory*. SAGE Publications Ltd. doi: 10.4135/9781848607941
- Burton, N., & Ariss, R. (2009). The critical social voice of midwifery: Midwives in Ontario. *Canadian Journal of Midwifery Research & Practice, 8*(1), 7 – 22.
- Cameron, C. (2011). Becoming and being a midwife: A theoretical analysis of why midwives leave the profession. *Canadian Journal of Midwifery Research & Practice, 10*(2), 22–28.
- Canadian Association of Midwives. (2022). *Midwifery across Canada*. Retrieved from <https://canadianmidwives.org/midwifery-across-canada/#1464901048224-2e0367ef-3303>
- Carroll, D., & Benoit, C. (2004). Aboriginal midwifery in Canada: Merging traditional practices. In I. L. Bourgeault., C. Benoit., & R. Davis-Floyd. (Eds.), *Reconceiving midwifery*, (pp. 263-286). McGill-Queen's Press-MQUP.
- CBC. (2018). *Association president says NS midwives are overworked*. Retrieved from <https://www.cbc.ca/news/canada/nova-scotia/midwifery-services-shut-down-in-south-shore-1.4490459>
- Christianson, M., Lehn, S., & Velandia, M. (2022). The advancement of a gender ethics protocol to uncover gender ethical dilemmas in midwifery: A preliminary theory model. *Reproductive Health: RH, 19*(1), 1–16. <https://doi.org/10.1186/s12978-022-01515-6>

- Cleland, J. A. (2017). The qualitative orientation in medical education research. *Korean Journal of Medical Education*, 29(2), 61–71.
- Collins, C. T., Fereday, J., Pincombe, J., Oster, C., & Turnbull, D. (2010). An evaluation of the satisfaction of midwives' working in midwifery group practice. *Midwifery*, 26(4), 435–441. [https:// doi.org/10.1016/j.midw.2008.09.004](https://doi.org/10.1016/j.midw.2008.09.004)
- Connelly, L. M. (2016). Trustworthiness in qualitative research. *Medsurg Nursing*, 25(6), 435.
- Corbin, J., & Holt, N. (2005). Grounded theory. In B. Somekh., & C. Lewin. (Eds.), *Research methods in the social sciences*, (pp. 49-55). London: Sage.
- Corbin, J., & Strauss, A. L. (2008). *Basics of qualitative research* (3rd ed.). Thousand Oaks, CA: SAGE Publications.
- Corbin, J., & Strauss, A. L. (2015). *Basics of qualitative research* ( 4<sup>th</sup> ed.). Thousand Oaks, CA: SAGE Publications.
- Creswell, J. (2013). *Qualitative inquiry & research design: Choosing among five approaches* (3rd ed.). Thousand Oaks, CA: Sage
- Creswell, J. W., & Creswell, J. D. (2017). *Research design: Qualitative, quantitative, and mixed methods approaches*. Sage publications.
- Creswell, J. W., & Miller, D. L. (2000). Determining validity in qualitative inquiry. *Theory into Practice*, 39(3), 124–130.
- Creswell, J., & Poth, C. (2016). *Qualitative inquiry and research design* (4th ed.). Sage Publications.

- Dent, J. (2018). Is it shift length or working practices that most affect midwives' wellbeing and ability to safely deliver care? *British Journal of Midwifery*, 26(12), 812–817. <https://doi-org.ezproxy.library.dal.ca/10.12968/bjom.2018.26.12.812>
- Etikan, I., Musa, S. A., & Alkassim, R. S. (2016). Comparison of convenience sampling and purposive sampling. *American Journal of Theoretical and Applied Statistics*, 5(1), 1-4.
- Fairbrother, N., Stoll, K., Schummers, L., & Carty, E. (2012). Obstetrician, family physician, or midwife: Preferences of the next generation of maternity care consumers. *Canadian Journal of Midwifery Research & Practice*, 11(2), 8–15.
- Fathnezhad-Kazemi, A., Sharifi, N., & Nayebinia, A.-S. (2022). Explaining challenges experienced and evaluation of the working condition of midwives: A mixed-method study protocol. *International Journal of Qualitative Methods*, 21, 1–7. <https://doi.org/10.1177/16094069221108048>
- Fenwick, J., Hammond, A., Raymond, J., Smith, R., Gray, J., & Foureur, M. (2012). Surviving, not thriving: A qualitative study of newly qualified midwives' experience of their transition to practice. *Journal of Clinical Nursing*, 21(13-14), 2054-2063. doi: 10.1111/j.1365-2702.2012.04090.x
- Fenwick, J., Lubomski, A., Creedy, D. K., & Sidebotham, M. (2018). Personal, professional and workplace factors that contribute to burnout in Australian midwives. *Journal of Advanced Nursing*, 74(4), 852–863. <https://doi-org.ezproxy.library.dal.ca/10.1111/jan.13491>



- Fereday, J., & Oster, C. (2010). Managing a work-life balance: The experiences of midwives working in a group practice setting. *Midwifery*, 26(3), 311–318. <https://doi-org.ezproxy.library.dal.ca/10.1016/j.midw.2008.06.004>
- Gebriné, K. É., Lampek, K., Sárváry, A., Sárváry, A., Takács, P., & Zrínyi, M. (2019). Impact of sense of coherence and work values perception on stress and self-reported health of midwives. *Midwifery*, 77, 9–15. <https://doi-org.ezproxy.library.dal.ca/10.1016/j.midw.2019.06.006>
- Globe and Mail. (2018). *Nova Scotia midwifery services in jeopardy amid struggle to meet demand*. Retrieved from <https://www.theglobeandmail.com/news/national/nova-scotia-midwifery-services-in-jeopardy-amid-struggle-to-meet-demand/article37759252/>
- Government of Prince Edward Island. (2022). *Midwifery services*. Retrieved from <https://www.princeedwardisland.ca/en/information/health-pei/midwifery-services>
- Gustavsson, K., Wierzbicka, A., Matuszczyk, M., Matuszczyk, M., & Wichniak, A. (2021). Sleep among primary care physicians—Association with overtime, night duties and strategies to counteract poor sleep quality. *Journal of Sleep Research*, 30(1), 1–6. <https://doi-org.ezproxy.library.dal.ca/10.1111/jsr.13031>
- HakemZadeh, F., Neiterman, E., Chowhan, J., Plenderleith, J., Geraci, J., Zeytinoglu, I., & Lobb, D. (2020). Work-life interface and intention to stay in the midwifery profession among pre- and post-clinical placement students in Canada. *Human Resources for Health*, 18(1). <https://doi-org.ezproxy.library.dal.ca/10.1186/s12960-020-00509-4>

- Hansson, M., Lundgren, I., Hensing, G., & Carlsson, I.-M. (2019). Veiled midwifery in the baby factory — A grounded theory study. *Women & Birth, 32*(1), 80–86. <https://doi-org.ezproxy.library.dal.ca/10.1016/j.wombi.2018.04.012>
- Henriksen, L., & Lukasse, M. (2016). Burnout among Norwegian midwives and the contribution of personal and work-related factors: A cross-sectional study. *Sexual & Reproductive Healthcare, 9*, 42–47. <https://doi-org.ezproxy.library.dal.ca/10.1016/j.srhc.2016.08.001>
- Hildingsson, I., Westlund, K., & Wiklund, I. (2013). Burnout in Swedish midwives. *Sexual & Reproductive Healthcare, 4*(3), 87–91. <https://doi-org.ezproxy.library.dal.ca/10.1016/j.srhc.2013.07.001>
- Hunter B. (2004). Conflicting ideologies as a source of emotion work in midwifery. *Midwifery, 20*(3), 261-272.
- Hunter, B. (2010). Mapping the emotional terrain of midwifery: What can we see and what lies ahead?. *International Journal of Work Organisation and Emotion, 3*(3), 253–269. <https://doi.org/10.1504/ijwoe.2010.032925>
- Hunter, L. (2016). Making time and space: The impact of mindfulness training on nursing and midwifery practice. A critical interpretative synthesis. *Journal of Clinical Nursing, 25*, 918–929. <https://doi.org/10.1111/jocn.13164>
- Hunter, B., & Warren, L. (2014). Midwives' experiences of workplace resilience. *Midwifery, 30*(8), 926–934. <https://doi.org/10.1016/j.midw.2014.03.010>
- Hunter, L., Snow, S., & Warriner, S. (2018). Being there and reconnecting: Midwives' perceptions of the impact of mindfulness training on their practice. *Journal of Clinical Nursing, 27*(5-6), 1227–1238. <https://doi.org/10.1111/jocn.14169>

- International Confederation of Midwives. (2017). *International definition of the midwife*.  
[https://www.internationalmidwives.org/assets/files/definitions-files/2018/06/eng-definition\\_of\\_the\\_midwife-2017.pdf](https://www.internationalmidwives.org/assets/files/definitions-files/2018/06/eng-definition_of_the_midwife-2017.pdf)
- IWK. (2021). *Midwifery FAQs*. Retrieved from <https://www.iwk.nshealth.ca/women-and-newborns-health/midwifery-faqs>
- Jeffries, T. (1992). Sechelt women and self-government. In G. Creese and V. Strong-Boag (Eds.), *British Columbia reconsidered: Essays on women*, (pp. 81–86).  
Vancouver: Press Gang Publishers.
- Jordan, K., Fenwick, J., Slavin, V., Sidebotham, M., & Gamble, J. (2013). Level of burnout in a small population of Australian midwives. *Women and Birth*, 26(2), 125–132. <https://doi.org/10.1016/j.wombi.2013.01.002>
- Kalicińska, M., Chylińska, J., & Wilczek-Różyńska, E. (2012). Professional burnout and social support in the workplace among hospice nurses and midwives in Poland. *International Journal of Nursing Practice*, 18(6), 595–603. <https://doi-org.ezproxy.library.dal.ca/10.1111/ijn.12003>
- Kambaru, A. (2018). Qualitative research and a modified grounded theory approach. *The Tsuru University Review*, 88, 47–58.
- Kaufman, K., Robinson, K., Buhler, K., & Hazlit, G. (2011). *Midwifery in Nova Scotia: Report of the external assessment team*. Province of Nova Scotia. Retrieved from <http://novascotia.ca/dhw/publications.asp>
- Kecklund, L. J., & Axelsson, J. (2016). Health consequences of shift work and insufficient sleep. *BMJ*, 355, <https://doi.org/10.1136/bmj.i5210>

- Kim, B. (2001). Social constructivism. *Emerging perspectives on learning, teaching, and technology*, 1(1), 16.
- Kristensen, T., Borritz, M., Villadsen, E., & Christensen, K. (2005). The Copenhagen burnout inventory: A new tool for the assessment of burnout. *Work & Stress*, 19(3), 192–207. <https://doi-org.ezproxy.library.dal.ca/10.1080/02678370500297720>
- Landrigan, C. P., Rothschild, J. M., Cronin, J. W., Kaushal, R., Burdick, E., Katz, J. T., Lilly, C. M., Stone, P. H., Lockley, S. W., Bates, D. W., & Czeisler, C. A. (2004). Effect of reducing interns' work hours on serious medical errors in intensive care units. *New England Journal of Medicine*, 351(18), 1838–1848. <https://doi.org/10.1056/nejmoa041406>
- Likis, F. E. (2020). Our work is not our life. *Journal of Midwifery & Women's Health*, 65(5), 593–594. <https://doi-org.ezproxy.library.dal.ca/10.1111/jmwh.13183>
- Lincoln, Y. S., & Guba, E. G. (1985). *Naturalistic inquiry*. Beverly Hills, CA: Sage Publications
- Lockley, S. W., Cronin, J. W., Evans, E. E., Cade, B. E., Lee, C. J., Landrigan, C. P., Rothschild, J. M., Katz, J. T., Lilly, C. M., Stone, P. H., Aeschbach, D., & Czeisler, C. A. (2004). Effect of reducing interns' weekly work hours on sleep and attentional failures. *New England Journal of Medicine*, 351(18), 1829–1837. <https://doi.org/10.1056/nejmoa041404>
- Macdonald, D. (2015). *The experiences of midwives and nurses collaborating to provide birthing care: A systematic review of qualitative evidence*. [Masters Dissertation, Dalhousie University].

- MacDonald, M. (2018). The making of informed choice in midwifery: A feminist experiment in care. *Culture, Medicine & Psychiatry*, 42(2), 278-294. doi: <http://dx.doi.org.ezproxy.library.dal.ca/10.1007/s11013-017-9560-9>
- Macdonald, D. (2019). *Exploring collaboration between midwives and nurses in Nova Scotia: A feminist poststructuralist case study*. [Doctoral dissertation, University of Ottawa].
- Macdonald, D. (2022). Relationships, roles and person-centred practices – collaborative birthing care in Nova Scotia. *International Practice Development Journal*, 12(1), 1–16. <https://doi.org/10.19043/ipdj.121.006>
- Macdonald, D., & Etowa, J. (2021). Experiences of and visions for collaboration between midwives and nurses in Nova Scotia. *Women and Birth: Journal of the Australian College of Midwives*, 34(5), e482–e492. <https://doi.org/10.1016/j.wombi.2020.10.004>
- Macdonald, D., Snelgrove-Clarke, E., Campbell-Yeo, M., Aston, M., Helwig, M., Baker, K.A. (2015). The experiences of midwives and nurses collaborating to provide birthing care- a systematic review. *The JBI Database of Systematic Reviews and Implementation Reports*, 13(11), 74-127. doi:10.11124/jbisrir-2015-2444
- Malmberg, B., Kecklund, G., Karlson, B., Persson, R., Flisberg, P., & Ørbaek, P. (2010). Sleep and recovery in physicians on night call: A longitudinal field study. *BMC Health Services Research*, 10(1). <https://doi.org/10.1186/1472-6963-10-239>
- Malott, A. M., Kaufman, K., Thorpe, J., Saxell, L., Becker, G., Paulette, L., Ashe, A., Martin, K., Yeates, L., & Hutton, E. K. (2012). Models of organization of

maternity care by midwives in Canada: A descriptive review. *Journal of Obstetrics & Gynaecology Canada*, 34(10), 961–970.

Maslach, C., & Jackson, S. E. (1986). *Maslach Burnout Inventory: Manual*. Palo Alto, CA: Consulting Psychologists Press.

Mason, J. (1987). *A history of midwifery in Canada*. Report of the Task Force on the Implementation of Midwifery in Ontario.

Mattison, C. A., Lavis, J. N., Hutton, E. K., Dion, M. L., & Wilson, M. G. (2020). Understanding the conditions that influence the roles of midwives in Ontario, Canada's health system: An embedded single-case study. *BMC Health Services Research*, 20(1), 1–15. <https://doi-org.ezproxy.library.dal.ca/10.1186/s12913-020-5033-x>

Meffe, F., Moravac, C. C., & Espin, S. (2012). An interprofessional education pilot program in maternity care: Findings from an exploratory case study of undergraduate students. *Journal of Interprofessional Care*, 26(3), 183–188. <https://doi-org.ezproxy.library.dal.ca/10.3109/13561820.2011.645089>

Memcott, C., Smith, J., Korzuchowski, A., Tan, H.-L., Oveisi, N., Hawkins, K., & Morgan, R. (2022). ‘Forgotten as first line providers’: The experiences of midwives during the COVID-19 pandemic in British Columbia, Canada. *Midwifery*, 113, 103437. <https://doi.org/10.1016/j.midw.2022.103437>

Mertens, D. (2010). *Research and evaluation in education and psychology: Integrating diversity with quantitative, qualitative, and mixed methods*. Thousand Oaks, CA: Sage Publications.

- Midwifery Regulatory Council of Nova Scotia. (2022). *Finding a registered midwife*. Retrieved from <http://mrcns.ca/index.php/finding-a-registered-midwife>
- Miller, S. (1997). Midwives' and physicians' experiences in collaborative practice: A qualitative study. *Women's Health Issues, 7*(5), 301–308.
- Mills, J., Bonner, A., & Francis, K. (2006). Adopting a constructivist approach to grounded theory: Implications for research design. *International Journal of Nursing Practice, 12*(1), 8–13.
- Mitchinson, W. (1991). *The nature of their bodies: Women and their doctors in Victorian Canada*. University of Toronto Press, Scholarly Publishing Division.
- Mitchinson, W. (2002). *Giving birth in Canada, 1900-1950*. Toronto: University of Toronto Press. Retrieved January 14, 2021
- Mirmolaei, T., Dargahi, H., Kazemnejad, A., & Mohajerrahbari, M. (2005). Job satisfaction of midwives. *Hayat, 11*(2), 87-95. <http://hayat.tums.ac.ir/article-1-242-en.html>.
- Morrison, A. (2014). Regulating and funding midwifery in Nova Scotia. *Health Reform Observer–Observatoire des Réformes de Santé, 2*(2), 1-12.
- Morse, J. M. (2000). Determining sample size. *Qualitative Health Research, 10*(1), 3-5.
- National Aboriginal Council of Midwives. (2014). *Bringing birth back: Aboriginal midwifery toolkit*. National Aboriginal Council of Midwives.
- National Aboriginal Council of Midwives. (2019). *Diverse pathways: Bringing indigenous midwifery home*. National Aboriginal Council of Midwives.
- National Aboriginal Council of Midwives. (2022). *Indigenous midwifery*. Retrieved from <https://indigenoumidwifery.ca/become-a->





*of Interprofessional Care*, 34(4), 509-519.

<https://doi.org/10.1080/13561820.2019.1702515>.

Ponting, J. R. (1998). Racism and stereotyping of First Nations. In V. Satzemich (Ed.), *Racism and social inequality in Canada*, (pp. 269–298). Toronto: Thompson Educational Publishing.

Reiger, K. M., & Lane, K. L. (2009). Working together: Collaboration between midwives and doctors in public hospitals. *Australian Health Review*, 33(2), 315–324.

<https://doi-org.ezproxy.library.dal.ca/10.1071/ah090315>

Reiter, N. (2007). Work life balance: What do you mean?. The ethical ideology underpinning appropriate application. *Journal of Applied Behavioral Science*, 43(2), 273–294. <https://doi.org/10.1177/0021886306295639>

Relyea, M. (1992). The rebirth of midwifery in Canada: An historical perspective. *Midwifery*, 8(4), 159-169.

Rieger, K. L. (2019). Discriminating among grounded theory approaches. *Nursing Inquiry*, 26(1), <https://doi-org.ezproxy.library.dal.ca/10.1111/nin.12261>

Rouleau, D., Fournier, P., Philibert, A., Mbengue, B., Dumon, D., & Dumont, A. (2012). The effects of midwives' job satisfaction on burnout, intention to quit and turnover: A longitudinal study in Senegal. *Human Resources for Health*, 10(1), 9–9. <https://doi.org/10.1186/1478-4491-10-9>

Rubin, H. J., & Rubin, I. S. (2012). *Qualitative interviewing: The art of hearing data* (3rd ed.). SAGE Publications Inc. <https://doi.org/10.4135/9781452226651>

- Ryan, F., Coughlan, M., & Cronin, P. (2007). Step-by-step guide to critiquing research. Part 2: Qualitative research. *British Journal of Nursing*, 16(12), 738–744. <https://doi-org.ezproxy.library.dal.ca/10.12968/bjon.2007.16.12.23726>
- Sandall, J., Soltani, H., Gates, S., Shennan, A., & Devane, D. (2013). Midwife-led continuity models versus other models of care for childbearing women. *MIDIRS Midwifery Digest*, 23(4), 457. <https://doi-org.ezproxy.library.dal.ca/14651858.CD004667.pub3/abstract>
- Sangster, S., & Bayly, M. (2016). Anarchists, naturalists, hippies, and artists: Beliefs about midwifery care and those who choose it. *Canadian Journal of Midwifery Research & Practice*, 15(2), 38-46.
- Saulnier, C., Hemmens, E., Catano, J., & Berry, C. (2010). *Uncomfortable positions: Consumer comments on midwifery implementation in Nova Scotia*. Midwifery Coalition of Nova Scotia. Retrieved from <http://mcns.chebucto.org/mcns/advocacy/advocacy.htm>
- Simkin, P. (1988). Midwifery comes to Canada. *Birth: Issues in Perinatal Care*, 15(2), 65-66.
- Shaw, J. A. (2013). The medicalization of birth and midwifery as resistance. *Health Care for Women International*, 34(6), 522–536. <https://doi-org.ezproxy.library.dal.ca/10.1080/07399332.2012.736569>
- Shen, J., Cox, A., & McBride, A. (2004). Factors influencing turnover and retention of midwives and consultants: A literature review. *Health Services Management Research*, 17(4), 249–262. <https://doi.org/10.1258/0951484042317769>

- Stoll, K., & Gallagher, J. (2019). A survey of burnout and intentions to leave the profession among Western Canadian midwives. *Women & Birth, 32*(4), 441–449. <https://doi-org.ezproxy.library.dal.ca/10.1016/j.wombi.2018.10.002>
- Strauss, A. L., & Corbin, J. (1990). *Basics of qualitative research: Grounded theory procedures and techniques*. Newbury Park, CA: Sage Publications.
- Strauss, A. L., & Corbin, J. (1998). *Basics of qualitative research: Techniques and procedures for developing grounded theory*. Thousand Oaks, CA: Sage Publications.
- Syed. (2021). Feminist political economy of health: Current perspectives and future directions. *Healthcare (Basel), 9*(2), 233–241. <https://doi.org/10.3390/healthcare9020233>
- Terry, P. E. (2022). A rose is a rose is a rose: Reviewing definitions for and reimbursement for health promotion, lifestyle medicine, behavioral medicine, preventive medicine and population health. *American Journal of Health Promotion, 36*(7), 1077–1082. <https://doi.org/10.1177/08901171221106666>
- Thai, M. T., Chong, L. C., & Agrawal, N. M. (2012). Straussian grounded theory method: An illustration. *The Qualitative Report, 17*(26), 1-55. Retrieved from <https://nsuworks.nova.edu/tqr/vol17/iss26/2>
- Thapa, Ekström-Bergström, A., Krettek, A., & Areskoug-Josefsson, K. (2021). Support and resources to promote and sustain health among nurses and midwives in the workplace: A qualitative study. *Nordic Journal of Nursing Research, 41*(3), 166–174. <https://doi.org/10.1177/2057158520988452>

- Thiessen, K., Haworth-Brockman, M., Nurmi, M., Demczuk, L., & Sibley, K. (2020). Delivering midwifery: A scoping review of employment models in Canada. *Journal of Obstetrics and Gynecology Canada*, 42(1), 61-71. doi: 10.1016/j.jogc.2018.09.012
- Thumm, E. B., & Flynn, L. (2018). The five attributes of a supportive midwifery practice climate: A review of the literature. *Journal of Midwifery & Women's Health*, 63(1), 90–103. <https://doi.org/10.1111/jmwh.12707>
- Vallières, A., Azaiez, A., Moreau, V., LeBlanc, M., & Morin, C. M. (2014). Insomnia in shift work. *Sleep Medicine*, 15(12), 1440–1448. <https://doi.org/10.1016/j.sleep.2014.06.021>
- Versaevel, N. (2011). Why do midwives stay? A descriptive study of retention in Ontario Midwives. *Canadian Journal of Midwifery Research & Practice*, 10(2), 29–45.
- Vogel, L. (2011). Midwifery crisis. *CMAJ: Canadian Medical Association Journal*, 183(13).
- Waldram, J. B., Herring, D. A., & Young, T. K. (1995). *Aboriginal health in Canada: Historical, cultural, and epidemiological perspectives*. Toronto: University of Toronto Press.
- Walker. (2015). Social constructionism and qualitative research. *Journal of Theory Construction & Testing*, 19(2), 37–38.
- Walker, D., & Myrick, F. (2006). Grounded theory: An exploration of process and procedure. *Qualitative Health Research*, 16(4), 547–559.

- Warren A., & Tart R. C. (2008). Fatigue and charting errors: The benefit of a reduced call schedule. *AORN Journal*, 88(1), 88–95. <https://doi-org.ezproxy.library.dal.ca/10.1016/j.aorn.2008.03.016>
- Wells, R. N. (Ed.). (1994). *Native American resurgence and renewal: A reader and bibliography*. Scarecrow Press.
- West, E., Barron, D. N., Dowsett, J., & Newton, J. N. (1999). Hierarchies and cliques in the social networks of health care professionals: Implications for the design of dissemination strategies. *Social Science & Medicine* (1982), 48(5), 633–646. [https://doi.org/10.1016/S0277-9536\(98\)00361-X](https://doi.org/10.1016/S0277-9536(98)00361-X)
- World Health Organization. (2013). *Interprofessional collaborative practice in primary health care: Nursing and midwifery perspectives*. Retrieved from <https://www.who.int/hrh/resources/observer13/en/>
- Zeytinoglu, I. U., Sayin, F. K., Neiterman, E., HakemZadeh, F., Geraci, J., Plenderleith, J., & Lobb, D. (2022). Hours of work and on-call weeks preferences of Canadian midwives: Relationships with intention to stay in the profession. *BMC Health Services Research*, 22(1). <https://doi.org/10.1186/s12913-022-08287-6>

APPENDIX A – Recruitment Poster

Are you a midwife working in  
Nova Scotia?

**WE WANT TO HEAR ABOUT YOUR  
EXPERIENCES OF WORK AND  
PERCEPTIONS OF MIDWIFERY AS A  
PROFESSION**

- Have you worked as a midwife in Nova Scotia for approximately one year?
- Has this been within approximately the past three years?
- Do you want to share your experiences of work and work-home balance?

**IF YOU HAVE ANY QUESTIONS OR WOULD LIKE TO SCHEDULE AN  
INTERVIEW, PLEASE EMAIL AISHWARYA RADHAKRISHNAN AT  
NSMID@DAL.CA**

**IF YOU PREFER TO SPEAK ON THE PHONE, PLEASE EMAIL YOUR  
PHONE NUMBER AND AISHWARYA WILL CALL YOU BACK**

**THIS PROJECT IS PART OF A GRADUATE STUDENT THESIS**

\*The interviews should not take more than 60 minutes. The confidential interviews will be audio-recorded. A \$25 electronic gift card will be provided as a thank you\*



## APPENDIX B – Screening Form

### **Project title: Midwives working in Nova Scotia: An exploratory qualitative study of their experiences of work and perceptions of their profession**

Thank you for your interest in this study. I'd like to ask you some questions to make sure you are eligible to participate in the study. If you are eligible we can schedule an interview time that is convenient for you and me.

Are you a midwife who has practiced in Nova Scotia, either full-time or part-time, for approximately one year? (Yes/No) \_\_\_\_\_

Have you practiced midwifery in Nova Scotia within approximately the previous three years? (Yes/No) \_\_\_\_\_

Do you agree to have your interview audio-recorded? (Yes/No) \_\_\_\_\_

Do you have access to a phone and a private space to complete the interview? (Yes/No) \_\_\_\_\_

Do you have access to an email address? (Yes/No) \_\_\_\_\_

#### **\*\*If the person answered “No” to any of the questions:**

Thank you for your interest. Unfortunately, you are not eligible to participate in this study but thank you again for your interest.

#### **\*\*If the person answered “Yes” to all the questions:**

Thank you for your interest. You are eligible to participate in the study. Would you like to schedule a phone interview to participate?

I will need to have your phone number so I can call you on the day of your interview to conduct the interview.

On the day of your interview, I will verbally review the consent form with you and then I will ask you to verbally consent over the phone. I will also need to have your email address so I can send you a copy of the consent form in advance of the interview, if you desire.

Would you like me to call or email you the day before the interview to remind you about the interview?

First Name: \_\_\_\_\_

Phone Number: \_\_\_\_\_

Email Address: \_\_\_\_\_

Time and Day of Interview: \_\_\_\_\_

Send reminder day before interview?: \_\_\_\_\_ (email or phone)

Consent form review ahead of interview: \_\_\_\_\_





## APPENDIX C – Participant Consent Form

**Project title:** Midwives working in Nova Scotia: An exploratory qualitative study of their experiences of work and perceptions of their profession

**Lead researcher:** Aishwarya Radhakrishnan, MA Health Promotion student, Dalhousie University, Halifax, NS, 502-442-9583, [as569653@dal.ca](mailto:as569653@dal.ca)

### Other researchers

Lois A. Jackson, Research Supervisor, Health Promotion, Dalhousie University, Halifax, NS, 902-494-1341, [lois.jackson@dal.ca](mailto:lois.jackson@dal.ca)

Megan Aston, Thesis Committee Member, Nursing, Dalhousie University, Halifax, NS, [megan.aston@dal.ca](mailto:megan.aston@dal.ca)

Jean Hughes, Thesis Committee Member, Nursing, Dalhousie University, Halifax, NS, [jean.hughes@dal.ca](mailto:jean.hughes@dal.ca)

Danielle Macdonald, Thesis Committee Member, Nursing, Queens University, Kingston, ON, [danielle.macdonald@queensu.ca](mailto:danielle.macdonald@queensu.ca)

### Introduction

You are invited to take part in a research study being conducted by me, Aishwarya Radhakrishnan, a graduate student at Dalhousie University. Taking part in this research is **entirely your choice and completely voluntary**.

The information below tells you about the study and what you will be asked to do and the risks and benefits of taking part.

Ask as many questions as you like. If you have additional questions about the study, please contact me, Aishwarya Radhakrishnan, at [nsmid@dal.ca](mailto:nsmid@dal.ca) leave your phone number and I will call you back.

### Purpose and Outline of the Research Study

This study is aimed at understanding your experiences of your work as a midwife in Nova Scotia and perceptions of the profession of midwifery in the province of Nova Scotia. I hope to speak to about eight midwives who have practiced in Nova Scotia.

### Who Can Take Part in the Research Study

You can take part in this study if you are a midwife who has worked in Nova Scotia for approximately one year (either full time or part-time) within approximately the previous three years. You must be willing to speak about your experiences of work and perceptions of the profession of midwifery in Nova Scotia, and be comfortable with the interview being audio-recorded.

You will also need to have access to a phone in a private space to complete the interview, and a personal email address. You must also be able to understand and answer questions in English.

### **What You Will Be Asked to Do**

You will be asked to share your experiences of work, the impact that your working conditions have had on your health, your experiences of home-work balance, your perceptions of your profession, and any suggestions you might have for improving the working conditions for midwives in Nova Scotia. The interview will take place over the telephone with me, the lead researcher/interviewer. You will be asked to review this consent form with me to make sure you understand it, and to give your verbal consent to participate on the day and time of your interview. I will keep a written record of your verbal consent. If you desire, I will email you the signed and dated consent form after the interview has been completed. The interview will be audio-recorded and should not take more than 60 minutes. At the end of the interview I will ask you a few socio-demographic questions (e.g., age range).

### **Possible Benefits, Risks and Discomforts**

Through your participation in this study, we might learn things that may help increase understanding of the work of midwives in Nova Scotia and potentially help to inform policies to improve any negative working conditions for midwives working in the province.

The risks associated with this study are minimum. However, you may feel uncomfortable answering some of the questions. You are free to skip over any questions that you do not want to answer, or withdraw from the study at any time up to one week following the interview. It is totally up to you how many questions you answer or not answer, and you can stop the interview at any time. If you feel any distress from the interview please feel free to contact the Nova Scotia Provincial Mental Health Crisis Line at 1-888-429-8167. I will also provide you with the contact information for the Nova Scotia Provincial Mental Health Crisis Line at the end of the interview.

Your information will be kept confidential within the limits of the law. Every reasonable effort will be made to ensure your confidentiality, and to ensure you are not personally identified in any reports and publications. I will have your first name to establish the interview and your email address, but your name will not be recorded on the interviews (just a participant number). When quotes from an interview are used, they will be linked to a participant number and may be identified by select socio-demographic information, such as self-reported gender identity. To reduce the chances of identifiability, only short quotes will be used. In spite of our efforts to protect your identity, there is a very small risk that someone may connect what you say in an interview to you given that certain phrases you use might be unique. For this reason, only speak about what you are comfortable sharing as your confidentiality cannot be guaranteed.

**If you disclose any information about current child abuse or an adult in need of protection, I (Aishwarya Radhakrishnan) am required to stop the interview and ask for your full name.**

**I will then discuss the information with my supervisor (Lois Jackson). If necessary, I will contact the appropriate authorities (i.e. child protection services and/or local police).**

### **Compensation / Reimbursement**

To thank you for your time, you will be emailed a \$25 online gift card. You will receive this honorarium even if you decide not to answer some or any of the questions. You will receive the honorarium after you have reviewed and understood the consent form and the interview is over. You must have access to a personal email in order to receive this honorarium.

### **How your information will be protected:**

There will be no names on the consent forms or interviews, and when the information is presented or quotations from your interview are utilized, you will be given a participant number. The quotations from the interview may also be identified by such socio-demographic information as age range, self-reported gender identity, region of practice, and years of practice as a midwife. You will not be personally named or personally identified.

After you complete the interview, the audio-recording will be saved on a password-protected hard drive (and two password-protected backup hard drives) and stored in a locked filing cabinet at my home office until the interview can be written out word for word and placed in a WORD document. The password-protected hard drive (and the two backups) will be encrypted with the help of a tool such as FileVault or Bitlocker. Only I (Aishwarya Radhakrishnan) will have access to the audio-recordings. Once interviews are typed out word for word, and checked against the audio-recordings for accuracy, the audio-recordings will be destroyed. My supervisor and committee members (listed above) will have access to the deidentified interviews and analysis. The electronic copies of the written out interviews will be stored on password protected hard drives which will be locked in a filing cabinet at my home office (Aishwarya Radhakrishnan) when not in use.

After the research process is complete and the findings have been written in the form of a thesis, the typed out interviews, consent forms, and log indicating you have received the honorarium, will be locked away at either my supervisor's office or the office of a committee member for at least 2 years post publication (i.e., post thesis defence). The data will be kept for this period of time in case there are any questions about the research and data analysis after presentation of the findings. The screening document (created when you first contacted me about your interest in the study) with your first name, email address and phone number will be destroyed after you have received your honorarium and your interview is part of the study data set.

### **If You Decide to Stop Participating**

After the interview, you will have up to one week to email me, the lead researcher, to withdraw your information. After one week, data analysis will begin and your interview will be part of the final research product (e.g., the thesis) so cannot be removed from the data set after that time.

### **How to Obtain Results**

Results from this study will be presented in a thesis and may be published in scientific journals and presented at public conferences. A short written community report of the study results will be prepared and circulated to organizations such as the Midwifery Coalition of Nova Scotia. If you

would like to receive a copy of the community report, please provide me with your email contact information, and I will email you a copy when the study is complete. After I have emailed you the report, I will destroy the log indicating you want a community report.

### **Questions**

I am happy to talk with you about any questions or concerns you may have about your participation in this research study. Please contact Aishwarya Radhakrishnan at [nsmid@dal.ca](mailto:nsmid@dal.ca) at any time with questions, comments, or concerns about the research study.

If you have any ethical concerns about your participation in this research, you may also contact Research Ethics, Dalhousie University at (902) 494-3423, or email: [ethics@dal.ca](mailto:ethics@dal.ca) (and reference REB file # 2021-5765).”

## Signature Page

**Project Title:** Midwives working in Nova Scotia: An exploratory qualitative study of their experiences of work and perceptions of their profession

**Lead Researcher:** Aishwarya Radhakrishnan, MA Health Promotion student, Dalhousie University, Halifax, NS, 502-442-9583, [as569653@dal.ca](mailto:as569653@dal.ca)

**I have verbally reviewed the consent form with the participant and believe that they understand the consent process. They have been informed that they have the freedom to not answer any question and/or withdraw their interview up to one week post-interview. They understand that they are not being asked to give up any of their rights. They understand that the information will be kept confidential within the limits of the law. They understand that they may receive a copy of this consent form signed by me and dated via email, if they request one. They understand they can contact the research ethics board with questions or concerns. I have answered any questions that they have.**

I have verbally reviewed the consent form with the participant:     Yes                     No

The participant has given permission for use of direct quotations:     Yes                     No

---

Participant Number

## **Contact Information for Community Report**

Participant Number: \_\_\_\_\_

Email Address: \_\_\_\_\_

Community Report (Yes/No): \_\_\_\_\_

## APPENDIX D – Semi-Structured Interview Guide

Thank you very much for agreeing to speak with me. I know you have a busy schedule and really appreciate your participation in this study. I am a Master's student at Dalhousie University and today, I hope to glean insight into your experiences of work and perceptions of your profession. I have some questions that will help guide us through this interview. They are intended to explore your experiences of work, the impact of your working conditions on your health, your experiences of work-home balance, and your perceptions of midwifery in Nova Scotia. I am also interested in hearing any suggestions you might have for improving midwifery in Nova Scotia. This interview is not expected to go over 60 minutes. Remember that you do not have to respond to questions you do not wish to answer and we can stop the interview at any time. You will have up to one week post-interview to withdraw your data from the study. After this time period, data analysis will begin so your data will become part of the final research product and cannot be removed. Are there any questions or concerns that I can address before we start the interview itself?

*I am going to start off by asking you a few questions about your experiences of work, as well as the impact of your working conditions on your health.*

1. Can you tell me a little bit about your work as a midwife? What, for example, does a typical working week look like for you in terms of hours of work, travel, number of clients, and interacting with clients?

- Tell me more; Can you elaborate?
- Probes: Travel time, Time on phone with clients, Breaks

2. Can you tell me anything that you experience as negative or challenging in terms of your work or working conditions?

- Tell me more; Can you elaborate?
- Probes: Hours of work, Shift work, Night work, Work safety, Extensive travel

3. Can you tell me anything that you experience as positive in terms of your work or working conditions?

- Tell me more; Can you elaborate?
- Probes: Interactions with clients, Job satisfaction, Closeness with colleagues, Sense of community

4. Do your working conditions affect your health at all – either positive or negative. I am wondering about all aspects of your health – your physical, social, emotional, and mental health.

- Tell me more; Can you elaborate?
- Probes: Fatigue, Exhaustion, Sleep patterns, Changes in mood patterns, Emotions experienced

*I would like to now ask you some questions about your experiences of your work-homelife balance. That is..*

5. In a typical work week, how do you experience work and homelife balance? Can you explain?

- Tell me more; Can you elaborate?
- Probes: Time dedicated to family, Time spent with friends, Ability to do leisure activities, Ability to work within assigned hours, Effects of working on-call

6. Do you think there are any programs or policies that are needed to support midwives in terms of their work and health? ? Can you explain?

- Probes: Government funding, Programs to increase knowledge of roles of midwives

*Now, I am interested in hearing your perceptions of midwifery as a profession in Nova Scotia.*

7. Can you tell me a little about how you see the status of midwifery as a profession (in general and in terms of Nova Scotia), and whether or not this status influences midwives work or working conditions? Can you elaborate?

- Probes: Gender differences, Hierarchy in healthcare, Status relative to other professions, Number of midwives

*Lastly, I would like to ask you if you have any suggestions for improving midwifery in Nova Scotia.*

8. Is there anything else that you would like to share?

Prompts: Tell me more; How does/did that make you feel?; Are you saying..?

*Before we end the interview, I would like to ask you a couple of questions about your socio-demographic background.*

A: Can you tell me what age range you fall within?

19-29 years \_\_\_\_\_

30-39 years \_\_\_\_\_

40-49 years \_\_\_\_\_

50-59 years \_\_\_\_\_

60-69 years \_\_\_\_\_

70-79 years \_\_\_\_\_

80-89 years \_\_\_\_\_

Prefer not to answer \_\_\_\_\_



B: Can you tell me your gender (e.g., trans, woman, man, 2-spirited, etc)?

Answer: \_\_\_\_\_

Prefer not to answer: \_\_\_\_\_

C: Can you tell me how many years you have practiced as a midwife?

3 years or less \_\_\_\_\_

4-5 years \_\_\_\_\_

6-7 years \_\_\_\_\_

8-9 years \_\_\_\_\_

10 years or more \_\_\_\_\_

Prefer not to answer: \_\_\_\_\_

D: Do you work mainly in urban areas, rural areas, or a mix of both?

Mainly urban \_\_\_\_\_

Mainly rural \_\_\_\_\_

Mix of both \_\_\_\_\_

## APPENDIX E – Dalhousie University Research Ethics Board Approval Letter

REB #2021-5765 Letter of Approval  
ethics@dal.ca <ethics@dal.ca>

Fri 11/19/2021 2:42 PM

To: Aishwarya Radhakrishnan <as569653@dal.ca>

Cc: Lois Jackson <Lois.Jackson@Dal.Ca>; Research Ethics <ethics@dal.ca>



### Health Sciences Research Ethics Board Letter of Approval

November 19, 2021

Aishwarya Radhakrishnan

Health\School of Health and Human Performance

Dear Aishwarya,

**REB #:** 2021-5765

**Project Title:** Midwives working in Nova Scotia: An exploratory qualitative study of their experiences of work and perceptions of their profession

**Effective Date:** November 19, 2021

**Expiry Date:** November 19, 2022

The Health Sciences Research Ethics Board has reviewed your application for research involving humans and found the proposed research to be in accordance with the Tri-Council Policy Statement on *Ethical Conduct for Research Involving Humans*. This approval will be in effect for 12 months as indicated above. This approval is subject to the conditions listed below which constitute your on-going responsibilities with respect to the ethical conduct of this research.

*Effective March 16, 2020: Notwithstanding this approval, any research conducted during the COVID-19 public health emergency must comply with federal and provincial public health advice as well as directives from Dalhousie University (and/or other facilities or jurisdictions where the research will occur) regarding preventing the spread of COVID-19.*

Sincerely,



Dr. Lori Weeks, Chair

---

## Post REB Approval: On-going Responsibilities of Researchers

After receiving ethical approval for the conduct of research involving humans, there are several ongoing responsibilities that researchers must meet to remain in compliance with University and Tri-Council policies.

### 1. Additional Research Ethics approval

Prior to conducting any research, researchers must ensure that all required research ethics approvals are secured (in addition to Dalhousie approval). This includes, but is not limited to, securing appropriate research ethics approvals from: other institutions with whom the PI is affiliated; the institutions of research team members; the institution at which participants may be recruited or from which data may be collected; organizations or groups (e.g. school boards, Indigenous communities, correctional services, long-term care facilities, service agencies and community groups) and from any other responsible review body or bodies at the research site.

### 2. Reporting adverse events

Any significant adverse events experienced by research participants must be reported **in writing** to ResearchEthics **within 24 hours** of their occurrence. Examples of what might be considered “significant” include: a negative physical reaction by a participant (e.g. fainting, nausea, unexpected pain, allergic reaction), an

emotional breakdown of a participant during an interview, report by a participant of some sort of negative repercussion from their participation (e.g. reaction of spouse or employer) or complaint by a participant with respect to their participation, report of neglect or abuse of a child or adult in need of protection, or a privacy breach. The above list is indicative but not all-inclusive. The written report must include details of the situation and actions taken (or proposed) by the researcher in response to the incident.

### 3. Seeking approval for changes to research

Prior to implementing any changes to your research plan, whether to the risk assessment, methods, analysis, study instruments or recruitment/consent material, researchers must submit them to the Research Ethics Board for review and approval. This is done by completing the amendment request process (described on the website) and submitting an updated ethics submission that includes and explains the proposed changes. Please note that reviews are not conducted in August.

#### 4. Continuing ethical review - annual reports

Research involving humans is subject to continuing REB review and oversight. REB approvals are valid for up to 12 months at a time (per the Tri-Council Policy Statement (TCPS) article 6.14). Prior to the REB approval expiry date, researchers may apply to extend REB approval by completing an Annual Report (available on the website). The report should be submitted 3 weeks in advance of the REB approval expiry date to allow time for REB review and to prevent a lapse of ethics approval for the research. Researchers should note that no research involving humans may be conducted in the absence of a valid ethical approval and that allowing REB approval to lapse is a violation of the University Scholarly Misconduct Policy, inconsistent with the TCPS and may result in the suspension of research and research funding, as required by the funding agency.

#### 5. Final review - final reports

When the researcher is confident that all research-related interventions or interactions with participants have been completed (for prospective research) and/or that all data acquisition is complete, there will be no further access to participant records or collection of biological materials (for secondary use of information research), a Final Report (available on the website) must be submitted to Research Ethics. After review and acknowledgement of the Final Report, the Research Ethics file will be closed.

#### 6. Retaining records in a secure manner

Researchers must ensure that records and data associated with their research are managed consistent with their approved research plans both during and after the project. Research information must be confidentially and securely retained and/or disposed of in such a manner as to comply with confidentiality provisions specified in the protocol and consent forms. This may involve destruction of the records, or continued arrangements for secure storage.

It is the researcher's responsibility to keep a copy of the REB approval letters. This can be important to demonstrate that research was undertaken with Board approval. Please note that the University will securely store your REB project file for 5 years after the REB approval end date at which point the file records may be permanently destroyed.

#### 7. Current contact information and university affiliation

The lead researchers must inform the Research Ethics office of any changes to contact information for the PI (and supervisor, if appropriate), especially the electronic mail address, for the duration of the REB approval. The PI must inform Research Ethics if there is a termination or interruption of his or her affiliation with Dalhousie University.

#### 8. Legal Counsel

The Principal Investigator agrees to comply with all legislative and regulatory requirements that apply to the project. The Principal Investigator agrees to notify the University Legal Counsel office in the event that he or she receives a notice of non-compliance, complaint or other proceeding relating to such requirements.

#### 9. Supervision of students

Faculty must ensure that students conducting research under their supervision are aware of their responsibilities as described above and have adequate support to conduct their research in a safe and ethical manner.