Making Relationships Tick: Objective and Subjective Time Use and Relationship Quality
Among Business Owners

Andrea Valeria Roets Swenson

Dissertation submitted to the faculty of the Virginia Polytechnic Institute and State
University in partial fulfillment of the requirements for the degree of

Doctor of Philosophy
In
Human Development

Anisa M. Zvonkovic
Katherine R. Allen
Toni M. Calasanti
Jyoti S. Savla

March 24, 2016
Blacksburg, VA

Keywords: Intimate relationships, family business, time, ecological theory

Copyright 2016 Andrea Swenson
Making Relationships Tick: Objective and Subjective Time Use and Relationship Quality

Among Business Owners

Andrea Valeria Roets Swenson

ABSTRACT

This study assesses the contextual aspect of working in a family business on intimate relationships. Guided by principles of ecological theory, this study explores the unique situation of individuals who work with an intimate partner in a business they own and how this situation manifests itself in their close relationship. Individuals in a family business are confronted with a potentially unique family-work experience, especially for spouses/partners who work together in a business. It is hypothesized that objective and subjective work time influence couple relationship quality.

Six specific hypotheses centered on the connection between family and work microsystems as well as the influence of macrosystem beliefs regarding family, work, and gender were assessed by regression analysis. Ninety-nine individuals completed a demographic and daily diary online. The sample was 52.53% men, 78.79% White, and educated (63.63% held at least Bachelor degrees). The majority of the sample was legally married (91.92%), with an average relationship length of 16.20 years ($SD = 12.74$ years).

Regression analyses revealed limited support for the hypotheses. For people in family businesses, working more hours was associated with greater withdrawal from their intimate partner. Perceiving work time as sad was linked to more withdrawal from partner and more anger with partner, but not linked with feelings of closeness to partner. People who felt time at work as appreciated reported feeling closer to their intimate partner. The more respondents believed it was meaningful to distinguish between work and family, the less closeness to their
partner they reported. Finally, age was significant for relationship quality, with younger individuals reporting more withdrawal and anger with partner and less closeness to their partner than did older individuals.

This study contributes to research exploring the connection between family and work among individuals who work together in family businesses. While objective work time was associated with the measure of withdrawal from a partner, objective work time did not significantly contribute to the report of anger with a partner or closeness to a partner. Overall, how individuals felt during work time had an effect on their spousal/partner relationship, with feeling sad at work associated with more relationship withdrawal and anger, and feeling appreciated at work associated with more closeness. Limited support for the model suggests there may be unique processes of work and family operating within family businesses. Although work and family microsystems were connected in this study of family business owners, the links between work and family were different from previous research on dual- and single-earner families. Future research should untangle the processes through which work and family and time are connected, with attention to larger cultural influences, particularly how individuals within family businesses do work and family and how families ascribe to and enact gender within family businesses. In addition, further research should assess the degree to which microsystems can be differentiated in populations characterized by an extreme mesosystem connection between work and family.
# Table of Contents

Chapter 1: Introduction..........................................................................................................................1

Theoretical Framework ..........................................................................................................................4

Current Study .......................................................................................................................................5

Figure 1. Hypothesized model exploring couple relationship quality in the context of family businesses. .................................................................................................................................6

Chapter 2: Literature Review ...............................................................................................................7

Ecological Theory ...............................................................................................................................7

Microsystems .......................................................................................................................................7

Macrosystem .......................................................................................................................................9

Gender ...............................................................................................................................................9

Economics .......................................................................................................................................10

Family .............................................................................................................................................11

Family Business as a Unique Context .................................................................................................12

Power .............................................................................................................................................13

Experience .......................................................................................................................................13

Culture ...........................................................................................................................................14

Romantic Relationships within Family Businesses .............................................................................15

Time ................................................................................................................................................16

Work and Family Life in Intimate Relationships ...............................................................................18

Everyday Context of Work and Family Relationships .....................................................................21

Withdrawal .......................................................................................................................................22

Anger ................................................................................................................................................24

Closeness to Partner .........................................................................................................................26
Acknowledgements

The research reported in this volume was supported by grants from the Virginia Tech’s Graduate Student Research Program, Virginia Tech’s Department of Human Development, and Virginia Tech’s Center for Gerontology Vetra R. Mancini and Jay Mancini Research Prize. The author would like to thank Anisa Zvonkovic, Katherine Allen, Toni Calasanti, and Jyoti Savla for their expertise, mentorship, and guidance throughout this project. The love, support, and appreciation of Jonathon and Peter Swenson is gratefully acknowledged.
Chapter 1: Introduction

Extensive research on the connection between work and family started in the 1970s (Kanter, 1977). Since Kantor’s groundbreaking work, research on work and family has examined the connection between the two spheres of work and family; including recent research on the division of labor and gender, the amount of paid labor, effects of employment on child development, conflict between work and family, work and family links to stress and health, and work-family policies (Bianchi & Milkie, 2010). In addition to the increased academic interest in work and family, work and family has become a salient issue in the United States (Bellavia & Frone, 2005).

Work and family research received criticism for a focus on how the work one does and the experiences surrounding that work influence families, while ignoring the ways in which family might influence work (Bianchi & Milkie, 2010; Crouter, 1984). Likewise, most research on work and family assumed the majority of paid labor occurs outside the family and family relationships for individuals (Halbesleben, Zellars, Carlson, Perrewé, & Rotondo, 2010). As a result, work and family as a field generally conceptualizes workers and their families as employed for corporations, spending work hours outside of the family home and among non-kin. Characterized by having a workplace insular to the family, family businesses are a particular work context in which work for economic gain occurs within the family. Families engaged in family businesses receive similar cultural messages regarding work and family as other individuals in a particular society, but how the population of families who work in family businesses enacts these messages and connects their work with their family relationships may be unique.
Research focusing on family dynamics and work and family linkages within family businesses has been limited. Work and family researchers are beginning to untangle the complexity of work and family constructs for family businesses. This growth in attention is evidenced with a special issue focused on family businesses in *Family Relations*, a high ranking journal within the Family Studies discipline (Morris & Kellermanns, 2013). Although growing in focus, few studies have been published that systematically assess how family dynamics are influenced by family business and the processes through which work and family are experienced among individuals.

In a review of trends in family business research, Zahra and Sharma (2004) underscore the need for researchers to focus on understanding the bi-directional influence between family and business, the core of what make family businesses unique. Similar to the argument by Crouter (1984), Litz (2008) asserts that only one side of the work family equation is being assessed within family business research. The focus of family business literature is on how family influences the business and often views the family as operating outside of the business sphere. Zahra and Sharma attribute the gap in research on how businesses influence families to a focus on consulting for family businesses concerning the business outcomes and primary concerns of the individuals involved in family businesses, rather than a focus on research that aims to understand underlying processes in family businesses. In a review article of family business trends in management, Chrisman, Chua, and Sharma (2003) note that the recognition of family as a crucial aspect of understanding family business did not occur until the early 2000s; however, the article is limited with their focus on family or that assess how family is understood within family businesses. Litz, Pearson, and Litchfield (2012) echo the recognition of family as
crucial and call for the need to include family science to better understand family businesses and move the field forward.

Scholarly attention to family business focuses on the business sphere. While families are important, there is a gap in the literature and cultural attitudes for focusing on the family processes and family experience. Zahra and Sharma (2004) attribute the gap to a focus on consulting for family businesses. In other words, consultants are called in to businesses when things go astray with relationships. For example, divorce within family businesses often end family businesses, but some relationship processes, such as trust, can help divorced couples continue to manage the business (Cole & Johnson, 2007). Approximately 70% of family businesses end within 10 years (Daspit, Holt, Chrisman, & Long, 2016).

Understanding how family dynamics in general (not just divorced) are influenced by family business and the processes through which work and family are experienced among family members who work together in a family business is important for two reasons. First, family businesses represent a unique and extreme case of work and family connection. Examining work and family in extreme situations can provide new insights and connections into how work and family operate in other situations in which individuals go outside the home for paid labor. Second, family businesses comprise a large proportion of business in the United States economy. Astrachan and Shanker (2003) found that approximately 89% of all business ventures in North America were family-owned in the broadest sense (family involvement and control). Family businesses contribute to the stability of the economy through job creation (employing 62% of the workforce) and creating 64% of annual gross domestic product (Astrachan & Shanker). Because family businesses are vital for the economy, the U.S. government invests and provides resources for businesses.
Of the research on family processes within family businesses that is available, the main focus of research is on succession (Chrisman et al., 2003; Zahra & Sharma, 2004). Succession is a fundamental aspect of family businesses and involves processes related to identifying a successor, taking first actions and developing ground rules, training the successor, and the transition and eventual handoff to the successor. Succession processes can be an obstacle for family businesses (Daspit et al., 2016). Many family businesses end due to succession problems, causing distress to the business founder(s) and straining family relationships (Davis & Stern, 1980). This complex navigation through family relationships can result in failure of the business. However, many family processes occur within family businesses prior to succession, including work and family processes.

Litz and colleagues (2012) and others (e.g., Zellweger, Nason, & Nordqvist, 2012) assert that family sciences can aid in the development of understanding complex processes that family businesses experience, such as the everyday management of work and family boundaries. Understanding how everyday family business processes contribute to the connections between work and close relationships could have a major impact on family businesses. Without knowing how individuals construct their daily activities in relationship to work and its influence on family relations, it is difficult to assess how processes related to the business or the relationship between individuals play out in everyday life. Therefore, this study explores how an individual who owns a family business engages in activities throughout the day that relate to work and how the amount of time spent in activities and the perception of time in activities relates to intimate relationship quality.

**Theoretical Framework**
The theoretical underpinning of this study is ecological theory (Bronfenbrenner, 1977). Bronfenbrenner’s early development of ecological theory is used to inform how individuals develop in nested environments. This perspective views individuals as not isolated, but rather their lives can be seen as at a nexus of systems that influence them and each other (Rosa & Tudge, 2013). This study examines this theoretical perspective through the two individual microsystems of work and family, the mesosystem between them, and the macrosystem beliefs shaping them.

**Current Study**

The current study assesses links between work and family in family business owners. This line of research provides a fresh and novel vantage point to inform work and family research as well as family business research. Figure 1 illustrates the proposed model for this study. It is expected that objective time in work activities (quantity of time) influences spousal/partner relationship quality. The connection between time in work activities and relationship quality is moderated by the perception of time in activities (quality of time, e.g., viewing time in the activity as rushed). These connections between time and intimate relationship quality are informed by the macrosystem in which they operate. Work and family beliefs related to time and gender are viewed to be essential elements from the macrosystem that will influence individuals’ everyday actions and perceptions. Survey and daily diary methodology were used to collect data on time use and perception, spousal/partner relationship quality, and demographic information. Specific hypotheses will be provided in chapter two following a literature review of related topics. Chapter three presents the research methodology and chapter four presents the findings of the study. Finally, chapter five presents how the findings of the study integrate and expand previous literature.
Figure 1. Hypothesized model exploring couple relationship quality in the context of family businesses.
Chapter 2: Literature Review

This chapter presents the theoretical underpinnings of the proposed study as well as a review of literature informing the model presented in chapter one. Presented first is the theoretical perspective of this study, ecological theory. Following the theoretical perspective, previous literature informing the theoretical model of the study is reviewed. The literature review is organized by topics specifically relevant to this study: the context of family businesses, time, and work and family literature related to the daily experiences of intimate relationships. A series of six hypotheses are proposed to examine the theoretical model developed for this study.

Ecological Theory

Ecological theory, developed by Bronfenbrenner in the 1970s, focuses on the processes underlying human development. The theory went through three different phases since its inception, adding and refining key concepts and how they interact (Bronfenbrenner & Evans, 2000; Rosa & Tudge, 2013). Bronfenbrenner believed that research needed to examine the immediate and remote environments in which an individual interacts (1979). This study is based on the earlier writings and theory development by Bronfenbrenner (Phase 1; Rosa & Tudge).

Microsystems

In ecological theory, Microsystems are defined as areas in which individuals have direct interaction and in which development occurs (Bronfenbrenner, 1977). Family is the main microsystem in which human development processes occur. Work is another microsystem in which development occurs. Work is considered a microsystem in this study, because it represents another setting in which individuals directly interact with others. Bronfenbrenner was a developmental psychologist who focused on development in terms of children. As such, the theory was developed and continues to be positioned in terms of influences on child development.
(Rosa & Tudge, 2013). Theory development expanding ecological theory applies ecological theory as central to understanding work and family, utilizing work as a microsystem in adult lives (e.g., Grzywacz & Marks, 2000).

In this study, a mesosystem model is used to assess the relationship between the two microsystems of work and family. Mesosystem models are models that examine the bidirectional effects between two microsystems (Bronfenbrenner, 1979). The mesosystem represents the connections between two or more microsystems and acts as a system of microsystems (Bronfenbrenner, 1977). Several studies using employee populations have found that work and family microsystems influence each other, such as work to family spillover and family to work spillover (Grzywacz & Marks, 2000). A classic study in which the term spillover was specifically investigated is Rena Repetti’s (1989) study on air traffic controllers. Repetti used objective assessment of workload (i.e., air traffic volume and visibility) combined with subjective assessments of workload (i.e., having respondent rate their work day on difference factors, including perception of busyness and perceptions of difficult work conditions), to assess the role of the work day experience on marital relationships quality (withdrawal, anger, and support towards spouse).

Furthermore, the relationship between work and family can have both positive and negative impacts (e.g., positive work to family spillover and negative work to family spillover; Repetti, 1989). The connection between work and family microsystems has yet to be thoroughly examined in situations in which family members work together. In family businesses, work and family microsystems may challenge the mesosystem differently than in traditional work and family situation. For example, work/family border theory proposes that work and family are separate spheres that influence each other as a result of differences in culture and purpose (Clark,
For individuals, the differing culture and purpose of work and family means that people need to adapt their interactions and roles. In family businesses, the culture and purpose of work and family microsystems are generally considered to be the same or at least highly overlapping (Astrachan, Klein, & Smyrnios, 2002; Gallo, 2004). Theorizing regarding married couples in family businesses, Blenkinsopp and Owens (2010) propose it is not possible for family and business to have separate concepts of work and family. While couples may take on different roles based upon the setting, it is the setting in which the couples transition in and out of, not the relationship.

**Macrosystem**

The macrosystem, as proposed by Bronfenbrenner (1979), is the mapping of cultural structures that influence development. Macrosystems are social structures that influence everyday interactions and experiences through messages of information and ideology of a culture (defined as a way of life that people share and transmit with each other; Murry, Smith, & Hill, 2001). When family members work together, macrosystem structures related to gender, economics, and family influence what family members experience, within both the work and family microsystem.

**Gender**

Gender is a social structure that gives expectations for how women and men act in Microsystems (Risman, 2004). Social structures are foundations within a society that can give rise to societal inequalities. For example, social structures can provide opportunities to some members of society and restrict opportunities to others, such as the type of work that is available to an individual for employment (Coltrane, 2000). Individuals’ actions derive from the tension between the constraints of the social structure and the agency of the individual. One way this
tension is worked out is via processes through which individuals become gendered. Differing social interaction expectations of men and women are imposed on them as they are placed in different social roles, and provided different societal resources specific to their gender (Risman, 2004). Risman’s theorizing about gender as a social structure recognizes that the foundation of gender as a social structure can be experienced within couples through the expectations they bring to interactions. Work and family is an area in which gender is enacted and an area that is characterized by gendered expectations (Bianchi & Milkie, 2010). The process of how temporal decisions are made related to the amount of work time in family business activities, the perception of that time, and the connection between time in work activities and intimate relationship quality are influenced by gender.

**Economics**

Messages regarding work and family are also informed through economic structures. For example, the United States culture promotes a capitalist economic message, with the importance on earning money in order to raise standards of life. The way economic macrosystem messages can effect work and family were addressed in a study comparing East and West Germany prior to the unification of Germany. Research examining two different economic macrosystems that differ on economies, but not other cultural messages, found differences in how people connected work and family (Trappe & Rosenfeld, 2000). West Germans received messages regarding specialization; people were encouraged to focus on work or on family life with a consequence of that specialization often falling across gender lines, with women focused on family and men focused on work. Work and family policies in East Germany enabled women to combine work and family roles, however, these policies connecting work and family in the East did not have the same effects for men.
Family

The definition of family, who is family, how family is organized, and the role of family in society and development, is informed through an individual’s macrosystem. In addition to defining family and families, the family macrosystem informs individuals about their roles within family relationships. For example, an individuals’ macrosystem influences how they perceive their ties to intergenerational relationships (Connidis, 2015). How individuals view family is cultural; some individuals focus on their household as a measure of family, while others focus intergenerationally and others more broadly to include concepts of fictive kin. The definition of family and how family is viewed has consequences on defining family businesses and what constitutes a family influence within businesses (Astrachan et al., 2002).

Societal messages regarding the three areas of gender, economics, and family are embedded within each other (Risman, 2004). For example, what it means to be a parent (i.e., family message) is constructed differently for men and women. This can be viewed through another layer of interaction; what it means to be a man as an employee who is a parent is different than what it means to be a women as an employee who is a parent. This embeddedness of gender in economic and family institutions results in conflicting work and family ideals by gender. Macrosystems inform individuals, even if they are unaware of it, about their choices regarding what activities they engage in and with whom they engage on a daily basis (Moen, 2003). To account for the conflicting messages, individuals may segment or integrate work and family microsystems in order to maximize their experience in each system (Nippert-Eng, 1996).

One manner to assess the management of individuals’ boundaries at the intersection of work and family is through their opinions about how work and family should be separated and compartmentalized, or combined and integrated. Work-family integration, as a belief system,
defines what individuals and organizations view as the best way to manage the competing aspects of work and family (Nippert-Eng, 1996). Work-family integration can be seen as a continuum on which the beliefs and actions of how permeable the boundary between work and family is, with work-family segmentation and work-family integration on opposite ends of the continuum (Nippert-Eng, 1996; Olson-Buchanan & Boswell, 2006). Work-family segmentation is the belief that work and family are best handled independently from each other—emulating the notion of separate spheres (Ashforth, Kreiner, & Fugate, 2000; Rothbard, Phillips, & Dumas, 2005). Work-family integration is recognizing and valuing the intersection of work and family life, with individuals making little distinction between the two spheres (Olson-Buchanan & Boswell).

This study includes macrosystem beliefs related to time segmentation and integration to account for the difference in how individuals enact macrosystem level influences. Rosa and Tudge (2013) suggest that future research should seek to understand relationships with individuals within one context and contexts in which individuals spend most of their time. This study seeks to accomplish this suggestion through exploring the mesosystem between two prevalent microsystem contexts, work and romantic relationships. In addition to the micro- and mesosystems, the macrosystem is assessed through the assessment of work-family beliefs.

**Family Business as a Unique Context**

Family businesses rest at the nexus of integrating work and family. Family businesses are unique as they are organizations built within close relationships for economic survival (Davis & Stern, 1980; Dawson, Sharma, Irving, Marcus, & Chirico, 2015). Family businesses are viewed as having high levels of recognition for the needs of its employees, particularly when employees’ needs involve the issues of work and family (Davis & Stern). Although the elements
that comprise who and what a family business is have been contested among scholars, there is an agreement that the distinguishing factor that family businesses have is that the business is connected to family. Astrachan, Klein, and Smyrnios (2002) identify that this family influence can be conceptualized in family businesses through three dimensions: (a) power, (b) experience, and (c) culture, in a model they call the F-PEC model of family business.

**Power**

Power within a family business is conceptualized as the ownership (who is the actual owner of the business), governance (who are the key stakeholders of the business), and management of the business. Within the power dimension, management of the family business is the most commonly studied (Chrisman et al., 2003). The importance of succession and conflict regarding succession and who has power with the business to make decisions has been one of the most frequently examined aspects of family business (Chrisman et al., 2003; Davis & Stern, 1980).

**Experience**

The dimension of experience is of great economic importance to family businesses because approximately three quarters of family businesses are unsuccessful in generational transitions (i.e., the business is sold or fails; Gersick, Lansberg, Desjardins, & Dunn, 1999). Businesses that are well-established have the advantage of having a production system that is less dependent on the family unit (Davis & Stern, 1980). Family business longevity is marked by successful transitions across multiple generations (Astrachan et al., 2002). Family businesses gain experience through successful succession experiences and through the contributions of multiple family members. Successful succession processes incorporate indoctrination into the leadership position, providing the successor sufficient experience to run the company (Daspit et
Having multiple family members contribute to a family business incorporates diversity in knowledge and skills, as well as increases family commitment to the business (Dawson et al., 2015). In studying the role of family in businesses using a nationally representative sample, Olson and colleagues (2003) found that business revenue increased for each additional family member employed.

**Culture**

Culture is the remaining dimension through which family is identified as distinct from nonfamily businesses. This perspective assumes that families and businesses must share common assumptions and values in order to be a family business (Gallo, 2004). This includes commitment related to both family and business. Families bring these assumptions and values into the family business during development and throughout the course of the business (Astrachan et al., 2002). Family businesses are built within a family culture in which individual family members contribute to and shape and that culture is incorporated into the business (Astrachan et al., 2002).

Because family and business are deeply intertwined, family businesses sometime struggle to incorporate the changing values and needs of the family, the business, and the individuals that comprise each microsystem (Davis & Stern, 1980). Researching family business requires viewing family businesses as both task-oriented systems and systems of family processes (Davis & Stern). Recognizing this vantage point, a review of research found that family processes are significant predictors for family business success (Debicki, Mathere, Kellermanns, & Chrisman, 2009). However, family processes were limited to processes that pertained to management practices of the family: such as planning, the ability to strategize, and creating professionalism of the family business. This pattern of family being viewed as influencing business outcomes is
particularly prevalent in recent literature and remains the main line of research conducted within family business research (Debicki et al., 2009; James, Jennings, & Breitkreuz, 2012). In contrast, this study aims to advance family business literature by focusing on how activities within the business influence couple relationships.

**Romantic relationships within family businesses**

Kadis and McClendon (1991) theorize that the intimate relationship of couples who are in a business together is an important business asset and, as a result, has a serious impact on the success or failure of a business. Estimates conducted by Olson, Zuiker, Danes, Stafford, Heck, and Duncan (2003) using data from the 1997 National Family Business Survey suggest that businesses can increase their yearly revenue through decreasing tension in the family business (i.e., reducing tension regarding who does what within the family business). Research on couple relationships within family businesses has found that businesses are influenced by the couple’s ability to recognize and value both members’ role and vision for the business (Blenkinsopp & Owens, 2010; Hedberg & Danes, 2012; Kraus, Märk, & Peters, 2011). For example, in a qualitative five-year follow-up of copreneurial agricultural business couples, Hedberg and Danes (2012) compared couple and individual interviews on family business inclusion, control, and integration and found that couples who listened, had respect for each other’s ideas, and have a collaborative conflict style are more productive with the business. Couples who had inclusive power structures were more communicative in the business, which resulted in higher productivity for the business.

Theorizing by Kadis and McClendon (1991) suggests that intimate relationships within a business are successful when they are characterized by high relationship interdependence; couples are able to join together and recognize the individual traits of each other to, together,
create something more than they would be able to own their own. Successful businesses include the ability for an individual within a couples to determine their own work style that enhances the other, freedom from individual competition, open communication, and trust (Kadis & McClendon, 1991). Using a subset of 187 business-owning couples from the National Family Business Survey, tension regarding work and family was the highest reported tension in family businesses, compared to justice conflict (competition for resources), identify conflict, role conflict (confusion over who does what), and succession conflict in couples in which a husband self-identified as a business manager and the wife self-identified as a household manager (Danes & Morgan, 2004). In an article proposing manners in which therapists can assist family businesses, Rodriguez, Hildreth, and Mancuso (1999) propose that family relationships suffer as a result of the economic interdependence between the family and business. This is especially true when couples have a power imbalance such that either member does not feel comfortable articulating his or her needs or that his or her needs are not heard by the other partner.

**Time**

Family businesses offer a unique perspective on how couples construct time. Most research on time stems from time use studies that account for how individuals spend time throughout the day. Studies on time in work and family activities has found that the gap between how men and women use time is decreasing; with women spending less time in unpaid labor and men spending more time with children spend more time in unpaid labor and men in paid labor (Coltrane, 2000; Robinson & Godbey, 1999; Sayer, 2005). Past research has explored how work time influences marital relationships (Barnett & Gareis, 2002; Loscocco & Roschelle, 1991; Moen, 2003). Findings from past research have generally concluded that the number of hours that individuals spend working is associated with marital relationship quality, such that working
more hours was associated with lower relationship quality (Crouter, Bumpus, Head, & McHale, 2001; Doumas, Margolin, & John, 2003, 2008; Iles, Schwind, Wagner, Johnson, DeRue, & Ilgen, 2007; Jacobs & Gerson, 2001).

In a study of 899 households engaged in some form of home-based work, found that family business members reallocate person and family time in order to accomplish home-based family business work (Winters, Puspitawati, Heck, & Stafford, 1993). Building on these findings, Olson and colleagues (2003) found that reallocating sleep time to the business increased business success, as measured by revenue and perceived success compared to competitors in a sample of 673 couples. Winters and colleagues (1993) found that the number of hours that a business manager worked during the week was negatively related to family functioning (as measured by the Family APGAR scale that measures adaptation, partnership, growth, affection, and resolve within families). Work and family research has established a connection between objective work time (the number of hours at work) influencing intimate relationships; with longer hours in work negatively associated with intimate relationships.

Research has also established a link between the subjective experience of time (i.e., how individuals perceive time) and individual well-being. A major example of this is the experience of “rushed” time. Rushed time reflects a feeling of pace of how individuals perform time (Ballard & Seibold, 2003). Mattingly and Sayer (2006) found that during the period from 1975 to 2000 people in America increasingly reported perceiving time as rushed or hurried, a finding confirmed by Bianchi, Robinson, and Milkie (2006). Drawing from a variety of time diaries from various years in the United States, as well as their own sample of 1,200 parents, Bianchi and colleagues also found that fathers perceived time as less rushed than did mothers.
Feeling appreciated during work time was identified as a core aspect of social support in a meta-analysis of workplace support (Kossek, Pichler, Bodner, & Hammer, 2011). In a study of the National Survey of Families and Households and the perception of appreciation for women’s household labor, Blair and Johnson (1992) found support for feeling time as appreciated being central to perceptions of fairness in the division of labor. Finding time in activities as appreciated was important due to appreciation having a symbolic meaning for individuals (Kessler & McCrae, 1982).

Understanding the importance in how time is felt is reflected through the inclusion of feeling in the Well-Being module of the American Time Use Study (Bureau of Labor Statistics, 2014). The American Time Use Study is a large, nationally representative sample of Americans. Participants in the study complete a daily time diary and answer additional questions regarding their day. In the most recent American Time Use survey, several questions addressing the perception of time in different activities were included. A brief report published by the Pew Research Foundation presented preliminary analysis of these questions (Wang, 2013). Individuals varied in their perceptions of time in specific activities as positive perceptions (e.g., happy) and negative perceptions (e.g., sad). The wide variance within daily activities across individuals suggests that there are within individual differences occurring on a daily level.

**Work and Family Life in Intimate Relationships**

Recent work and family research assumes that work and family are intersecting aspects of a person’s life. It is easy to see these aspects intersecting in family businesses. How individuals manage the intersection of work and family boundaries have important implications for individuals and families, especially for their health, happiness, and functioning at work and at home (Kossek & Lambert, 2005). Integrating work and family together at the workplace is
viewed as both positive and negative. Workers who integrate can be more flexible in the workplace (Ashforth et al., 2000) and have been found to bring in more resources, such as support (Halbesleben et al., 2010). For example, integrating work and family can mean using flextime options in order to meet the family demands of picking-up children after school. Integration also increases role strain and ambiguity compared to segmentation (Ashforth et al.). A segmentation stance is easier for individuals to cognitively achieve, as they compartmentalize different roles and experience easier transitions between roles than integrators (Ashforth et al.). Ambiguity between roles, especially for integrators, can be experienced by both the worker and the employer. An individual’s integration of work and family can be construed to employers as a lack of commitment to his or her work role. If an individual is perceived as not being committed to work, employment can be affected through reduced opportunities for promotion, not being assigned highly visible work (e.g., high profile cases), or even termination (Lee, Carswell, & Allen, 2000).

While individuals who integrate work and family can be viewed negatively within an organization, people who segment work and family are valued in organizations (Carlson, Kacmar, Zivnuska, & Ferguson, 2015). One way through which segmentation is valued in the workplace is through employee “face time” at work. Individuals who integrate work and family are more likely to take work home with them at the end of the day, while individuals who segment work and family are more likely to stay at work past the end of the day to complete what they need to accomplish. This behavior provides individuals who segment work and family more face time and are therefore viewed as more committed.

Individuals’ health and well-being are influenced by decisions regarding integration with spillover from work to family (Ilies, Wilson, & Wagner, 2009) and work-family conflict (Kossek,
Lautsch, & Eaton, 2006; Olson-Buchanan & Boswell, 2006). Ilies and colleagues (2009) in a study on the spillover of daily job satisfaction found that work-family integration was positively related to daily spillover from work to family, with people who engage in more integration between work and family reporting more spillover between the two microsystems. However, when individuals were integrators between work and family, they were satisfied with their work and experienced positive spillover from work to family, however, when they were not satisfied, they experienced negative spillover. The use of segmentation of work and family was found to influence individual depression (Kossek et al., 2006). Kossek and colleagues contacted 245 individuals working in Fortune 500 companies (57% women) to assess how telecommuting linked with turnover, work and family, and depression. Kossek and colleagues propose that individuals who integrate work and family may have more difficulty processing the increased transitions between work and family roles, which results in more work and family conflict. People who integrated at home engaged in frequent switching from work to family activities. This switching back and forth was associated with more work and family conflict and depression. However, for women with children, engaging in formal telework (e.g., flextime, bereavement policies, sick time, FMLA use) resulting in lower depression. Kossek and colleagues conclude that this finding may be the result of women desiring to be both career and family centric. Identifying strongly with a particular role was linked with that role being integrated into other microsystems (Olson-Buchanan & Boswell, 2006).

Individuals inform their decisions on integrating work and family through the messages and work policies they receive from their workplaces and society (Hill, Yang, Hawkins, & Ferris, 2004; Nippert-Eng, 1996). The management of work-family integration or segmentation is influenced by practices and beliefs (Peng, Ilies, & Dimotakis, 2011; Rothbard et al., 2005). The
shared perception of culture within the larger context is important for family businesses, because it was postulated that individuals benefit when beliefs are congruent among systems (Bronfenbrenner, 2001).

Individuals who have a degree of overlap between their work and family Microsystems (such as couples who work for a same company) report more integration (Halbesleben et al., 2010). In a series of two studies, Halbesleben and colleagues (2010) assessed work-family integration and segmentation in workers who either worked in the same workplace as their spouse, worked in the same occupation as their spouse, or had no overlap in the workplace or occupation of their spouse. Their studies included gender as a control variable and did not include gender in their main analysis reports. Their findings from a study of 103 registered nurses (89 women, 14 men) and 487 working adults (259 women, 225 men) illustrated that individuals who have a common workplace report more integration of work and family than individuals who did not share a workplace or occupation. In line with the recommendation set forth by Halbesleben and colleagues, this study assesses integration in a unique population of work-linked couples: individuals who work with a spouse in family businesses. Specifically, it is hypothesized that:

Hypothesis 1: Individuals who believe in integrating work and family will report higher quality couple relationships than will individuals who believe in segmenting work and family.

Everyday Context of Work and Family Relationships

While the manner in which individuals seek to manage work and family influences individual health and well-being, previous research has found that the everyday experiences of work and family influence intimate relationships. In an overview of daily diary studies linking
work experiences with marital relationships, Doumas, Margolin, and John (2008) report past research has repeatedly found a positive relationship between behaviors and affective experiences at work and similar behaviors and affective experiences within the marital relationship. Research on linking workday experience to intimate relationships emphasizes relationship interaction, in terms of withdrawal and anger in a relationship, and feelings of intimacy, specifically closeness to partner.

**Withdrawal**

Withdrawal from intimate partners has been one outcome assessed in the connection between work and family microsystems. The experience of stress at work has been related to withdrawal from interactions within the family (Hammer, Bauer, & Grandey, 2003; Repetti, 1989). Withdrawal is the process of secluding oneself from interactions to avoid potential stress that may accompany interactions (Repetti, 1989). Individuals withdraw from social interactions by engaging in certain behaviors, such as reading or watching television. Individuals often unintentionally withdraw from their partner when they engage in these solitary activities (Repetti, 1992). While withdrawal suggests fewer interactions with spouses, it is highly possible that spouses are physically together, but engaging in either parallel work or leisure activities. Findings related to withdrawal from marital relationships after work have found that both objective (such as air traffic volume in a sample of air traffic controllers) and subjective (such as a busy day and prevalence of negative interactions at work) evaluations of work influenced both the individual’s report of withdrawal as well as their spouse’s report of withdrawal (Repetti, 1989; Story & Repetti, 2006). In addition, the experience of withdrawal as related to work experiences is different between men and women (Repetti, 1989; Story & Repetti, 2006).
One objective measure of work experience was related to the experience of marital withdrawal. The total number of hours worked per day was negatively related to marital withdrawal (Doumas et al., 2008). This study examined the effect of daily work and family experiences in single-earner couples (28 husband-earner only and 11 wife-earner only couples). Husbands reported that working longer hours was related to their own experience of more withdrawal from their relationships. Husbands in husband-earner only couples also reported more withdrawal on days that their wives reported working more hours in unpaid labor.

In analysis of objective and subjective reports of work experiences on marital relationships using a sample of air traffic controllers (all men), Repetti (1989) found that subjective measures of a difficult workday and busy workday influenced marital withdrawal in men. Wives’ reports on spousal withdrawal were also significantly related to the husbands’ reports of the degree of difficulty of work that day. Similarly, in further analysis on the same sample conducted by Story and Repetti (2006), wives reported an increase in marital withdrawal after their husband reported a busy day at work. While Repetti’s research only focused on the work experiences of husbands, research on wives’ experience of daily workload found that wives reported being more withdrawn from their relationship after high workload day (Schulz, Cowan, Cowan, & Brennen, 2004). However, the effect of high workload influencing withdrawal for husbands was not found in this study, compared to findings by Repetti. It may be that the operationalization of work experiences as difficult and busy versus high workload have different meanings attached based on gender, although the both measures attempt to assess the amount of work and pace of work each day. In addition to the subjective experience of workload, experiencing negative affect at work was related to withdrawal from relationships by husbands
(Schulz et al.), in that husbands who experience high negative affect at work report withdrawing more from their partner at night. This effect was not found for wives.

The influence of work on marital withdrawal illustrates that husbands who experience work that is high in difficulty and workload, is fast-paced, and entails long hours tends to withdraw from their intimate relationship that day. The overall pattern of work time influencing withdrawal from partner suggests that men are more likely to experience withdrawal as a result of the workday than are women. Both objective and subjective reports of work were significant predictors of spousal withdrawal from marital relationships. Hypothesis two therefore considers that both objective and subject evaluations of time in work experiences influences the experience of withdrawal in intimate relationships. Specifically:

Hypothesis 2: *Reporting longer time in work activities predicts higher relationship withdrawal. The subjective account of time within work activities will moderate this relationship, with viewing time as negative and working longer hours predicting higher withdrawal than will viewing time as negative and working shorter hours.*

Hypothesis 3: *Men will report more withdrawal from their relationship than will women.*

**Anger**

Similar to the research on the daily experience of withdrawal, anger in marital relationships is predicted by both objective and subjective reports of work experiences. On days that men reported both subjectively negative experiences and objective unfavorable conditions at work (objective conditions were provided by the workplace), men reported reduced marital anger (Repetti, 1989). In addition, the experience of negative affect at work was related to reduced angry behaviors with spouse (Schulz et al., 2004). In both cases, the wives of the husbands in
the studies also reported that their husbands displayed less marital anger on days that they reported negative work experiences.

The opposite effect of workday experiences and marital anger was found in women, but only in subjective reports. Women reported increased marital anger on days when they experienced high work overload (Story & Repetti, 2006) and high negative affect experienced at work (Schulz et al., 2004). Husbands’ reports of wives’ marital anger also supported this pattern (Schulz et al.). In addition, husbands perceived their wives as displaying more marital anger on days that were reported as high-paced by the wife (Schulz et al.).

For men, negative workday experiences, both objectively and subjectively, reduce the report of men’s marital anger. For women, negative perceptions of the workday are related to an increase in marital anger. The gender effect of stress on anger illustrates Risman’s (2004) notion that gender is a social structure through the expectations that individuals bring to interactions. It may be that because men are viewed as providers, fulfilling a difficult day’s work is expected and valued, such that their marital partner modulates their interactions depending on the work experience of husbands. However, this expectation is different for women in their interactions with their partner, as wives are expected and can be counted on to be supportive of husband’s when his workday is hard (i.e., emotion work; Erickson, 1993). Research hypothesis four explores the experience of work time and the perception of that time and the relationship to marital anger. Specifically:

Hypothesis 4: *Experiencing longer time in work activities predicts reduced expression of marital anger. This effect is moderated by the subjective experience of work time, in that experiencing negative perceptions of work time and working longer hours will be*
associated with more anger towards partner than will perceiving work time as positive and working shorter hours.

Hypothesis 5: There will be gender differences in the report of anger towards spouse.

Closeness to Partner

Perceived closeness is defined as the degree of psychological proximity to one’s partner (Reis, Lin, Bennett, & Nezlek, 1993). By defining closeness in this way, closeness is delineated from related concepts of intimacy, such as physical interaction or sexual proximity. In a qualitative study of 22 Jewish Israeli couples, Ben-Ari and Lavee (2007) present a conceptual model of closeness for couples. Closeness was defined by couples as containing three constructs: meanings and expression (such as friendship, caring, and spending time together), physical and emotion modes (such as being physically close, but emotionally distant), and trait and state closeness (an attribute of the relationship or a short-term fluctuation). State closeness was defined as being shaped by the daily or hourly activities in which an individual engages. Two studies have examined the link between closeness and work experiences. Both studies found that the number of work hours was associated with marital closeness for both men and women. Working longer hours during the day was related to feeling less close to partners (Doumas et al., 2003, 2008). Research hypothesis six includes how both objective daily work experiences influence perceptions of closeness in spouses.

Hypothesis 6: For both men and women, experiencing longer time in work activities is related to a reduction in perceived closeness to one’s partner.

The subjective experience of work was not assessed in either study mentioned above, limiting the ability to make predictions regarding the subjective experience of time in this study, so no specific hypothesis is made. While no specific hypothesis for subjective experience is made for
this study, the link between subjective experience of work time and relationship closeness will be assessed due to its theoretical importance.

**Current Study**

The review of literature suggests that understanding the experience of work and family among individuals in a family business can inform the larger research on family business, work and family, and couple relationships. Grounded in ecological theory, this study assesses the connection between time and the perception of time in the work microsystem of a family business and the quality of intimate relationship in the family microsystem through six hypotheses. The first hypothesis assesses a macrosystem message of the meaningfulness in distinguishing work and family. The remaining five hypotheses refer to the prediction of intimate relationship quality by time use and perception and gender. The next chapter describes the methodology used to assess these hypotheses.
Chapter 3: Methodology

This study assesses the daily relationship quality of individuals who work with their intimate partner. The study is grounded in quantitative research methods using an intensive methodology of daily diaries to address if objective work time and subjective experiences of work time interact to influence daily relationship quality. A total of 99 individuals who own a business and work with their intimate partner completed a demographic survey and daily diary regarding their work and family experiences.

Sample

Respondents included 99 individuals who were age 18 and older, married or in a committed intimate relationship, and owned a business in which their spouse/partner had some level of involvement. The average age of respondents was 45.67 years old ($SD = 13.00$; range 23 to 72 years old). The sample was split in terms of gender, with 52.53% identifying as men and 47.47% women. The majority of the sample was White (78.79%) followed by Asian (7.07%) and Black/African-American (6.06%). All respondents held at least a high school diploma or equivalent, with 63.63% of respondents having earned a Bachelor’s degree or higher. Yearly personal incomes varied, with 22.22% earning $40,000 a year or less and 28.28% earning $120,001 a year or more. The majority of the sample was legally married (91.92%). Four individuals reported as being in a formally committed intimate relationship (e.g., participated in a commitment ceremony) and the remaining four individuals indicated they were in a committed, but not legally defined relationship or in a domestic partnership. Individuals were married or legally committed for an average of 16.20 years ($SD = 12.74$ years), and 76.77% of respondents reported having children ($M = 1.77$ children, $SD = 1.53$).
Family involvement in the business was defined as having an intimate partner involved in some aspect of the business. Intimate partner involvement in the business varied: 40.40% reported spouses as founders of the business, 18.18% were a member of the governance board, 21.21% were shareholders, 24.24% held an executive position, 18.18% were a manager, 23.23% were employees of the company, 38.38% assisted the business on a need to basis, and 18.18% reported their partner had some other involvement within the business (individuals were permitted to select all manners in which a spouse/partner was involved). Average length of business was 13.59 years ($SD = 12.54$ years). Thirty respondents (30.30%) reported their business being worth less than $100,000, 24.24% worth between $100,000 and $500,000, 19.19% worth between $500,001 and $1 million, and 13.13% reported their business being worth $5 million or more. Businesses were primarily in a city setting (68.69% urban, 23.23% rural) with only 8.08% of businesses located online. Half of the respondents (50.51%) reported that their business is based in or from their home, with 14.14% of respondents indicating that their work is exclusively accomplished at home ($M = 43.60\%$ of work accomplished at home, $SD = 37.51\%$).

**Procedures**

All procedures regarding this study were approved by Virginia Tech’s Institutional Review Board. The initial study design included obtaining information from both individuals within the couple (dyadic data). Small business centers, chambers of commerce, downtown association, community organizations, and personal contacts were used as means of couple recruitment. Recruitment for couples occurred over the course of one and a half years and was met with little success. Individuals who were initially interested in participating did not continue with the study for a variety of reasons. Difficulty recruiting couples was also an issue in that one person wanted to complete the study, while the other person did not. Due to low participation of
couples, the study design adapted to an individual study of business owners in which individuals were recruited and completed study procedures through a large, national recruitment and panel survey company. All participant compensation procedures followed guidelines set forth by the survey company. All survey procedures were conducted online. The company has access to a pool of respondents who were emailed an invitation to participate in the survey based on a profile they generated for the company. If interested in participating, respondents followed a link to an informed consent page. A total of 618 individuals accessed the informed consent page. If individuals agreed to participate in the study (407 individuals), they answered three screening questions. The screening questions included, (a) being age 18 and older, (b) currently married or partnered, and (c) currently owning a business. If a person met all three criteria, they were then directed to the demographic survey. A total of 352 individuals qualified for the study.

The demographic survey included items pertaining to work and family, family business and business characteristics, the individual, their social life, and their family. The survey took approximately 30 minutes to complete. Standard data quality checks were used (e.g., Aust, Diedenhofen, Ullrich, & Musch, 2013), including an attention check and the time it took to complete the survey. Any responses that did not meet the attention check (writing the word ‘survey’ in a response box) or were shorter than one-third of the average time it took individuals to complete the survey were not included in analysis (n=8). In addition, text responses were assessed for nonsensical responses (e.g., asdjk1) and removed from analysis.

After completion of the demographic survey, respondents were invited to participate in the daily diary surveys. Respondents were provided with an additional consent form and, if they agreed to participate, they were directed to the survey. A total of 129 individuals completed the demographic survey and at least one daily diary and had a spouse/partner involved with their
business in some manner. Daily diaries consisted of two sections: a time dairy component and section regarding daily experiences regarding time use, work and family, intimate relationship, and personal health. Daily diaries took an average of 30 minutes to complete. Data quality checks were also used for the daily diaries. The first quality check was an attention check, which asked the respondent to select a particular option for the question. This question was located within the relationship quality measures of the daily diary. Length of completion time was assessed, with respondents who took under one-third of the average completion time removed from analysis. Two questions in which respondents were asked to detail what they did not get accomplished today that they needed to and what would they give-up if an emergency arose during the day, which were then assessed for nonsensical (e.g., asdjkl) or invalid responses (e.g., great or very good). The completion of the time diary data was also assessed for nonsensical and invalid responses. Thirty individuals were found to have provided data that was invalid, resulting in a sample of 99 individuals. Respondents were invited and instructed to complete daily diaries in the evening. Respondents were invited to complete a total of seven daily diaries.

**Measures**

**Outcome Variable: Relationship Quality**

Three indicators of daily relationship quality were assessed: anger, withdrawal, and closeness. These three indicators represent both positive and negative dimensions of relationship quality. Previous research has also shown that these three indicators vary on a daily level (Repetti, 1986; Schulz et al., 2004; Story & Repetti, 2006).

**Withdrawal**

Daily withdrawal behavior was assessed using Repetti’s (1989) Withdrawn Marital Behavior Scale. Repetti’s scale is an adaptation of the Spouse Observation Checklist (Weiss &
Perry, 1983). This is a 13-item scale that describes disengagement from the marital relationship. Example items include: “I was in my own world” and “I was withdrawn.” Adapting the measure to reflect intensity of withdrawal, Schulz et al. (2004) adapted the response format from a true/false format to a four-point scale indicating the extent to which individuals engaged in particular behaviors, with 0 = Not at all descriptive of my behavior or feelings and 3 = I did this or felt this to a great extent. One item was reversed coded. Items were summed so that a higher score represented higher withdrawal from the relationship. The daily withdrawal scale has a Cronbach’s alpha of .90 for this sample.

**Anger**

Relationship anger was assessed using Repetti’s (1989) Angry Marital Behavior Scale. Repetti adapted this scale from Weiss and Perry’s (1983) Spouse Observation Checklist. This scale is a 19-item scale that describes active expressions of angry, critical, or unkind behavior. Example items include “I yelled at my partner” and “I was mean to my partner.” Adapting the measure to reflect intensity of anger and aggression, Schulz, Cowan, Cowan, and Brennan (2004) adapted the response format from a true/false format to a four-point scale indicating the extent to which individuals engaged in particular behaviors, with 0 = Not at all descriptive of my behavior or feelings and 3 = I did this or felt this to a great extent. All items were totaled so a higher score represented greater anger and aggression in the relationship. This scale has a reported alpha value of .95 for this sample.

**Closeness**

Closeness was measured using one-item on which spouses rate the amount of closeness that they experience with their spouse that day (Laurenceau, Barrett, & Rovine, 2005; Zvonkovic, McGraw, & Manoogian-O’Dell, 2000). This item is rated on a 5-point scale with 1 = very little
and 5 = A great deal. One-item measures have been shown as valid and justified when using daily diaries (Laurenceau et al., 2005). In specific regards to the concept of closeness to individuals, Aron, Aron, and Smollan (1992) conducted a series of 10 studies that supported the validity and reliability for using a one-item measure of closeness.

**Independent Variables**

**Time in work activities**

Time in work activities was assessed via coding of time diaries. Time diaries were obtained using a modified version of the Day Reconstruction Method (Kahneman, Krueger, Schkade, Schwarz, & Stone, 2004). The Day Reconstruction Method asks respondents to reconstruct their day through recording a sequence of episodes. This method is useful for assessing both time use and subjective assessment of time (Kahneman et al.). Respondents were first asked to indicate what time they went to sleep the day prior and what time they awoke today. Respondents were then instructed to think about their day as a series of episodes; with indicators of different episodes being a change in activities, change in location, or a change in the people with whom they interacted. Individuals were asked to list each episode. Respondents recorded the approximate time at which each episode began and ended, a brief description of the activities they were doing during that time, and who they were with during that time. This study added an additional element to the episode, classifying the time as related to work, family, leisure, self-care, or intimate relationship. Individuals were allowed to classify elements in multiple categories (e.g., leisure and intimate relationship). To facilitate recall, the day was broken into parts: morning (from waking up until noon), afternoon (from Noon to 5:00 pm), evening (5 pm to 10 pm), and anticipated late evening/overnight (10 pm-planned wake-up time). A total of ten spaces were provided for individuals to list episodes for each part of the day.
This analysis used the amount of time that individuals reported engaged in work activities throughout the day. The following coding rules were used and developed through examination of the data. These rules are conservative in that they are designed to only assess the time directly engaging in work activities as opposed to time during which some work may be accomplished, but the focus was on multitasking (i.e., time deepening behaviors; Robinson & Godbey, 1999). (A) Only the episodes during which the amount of time in work activities could be determined can be coded as work time. For example, if a participant reported an episode beginning at 9 pm as work time, but did not indicate an end time, or the end time of the episode could not be determined, the time was not counted towards total time in work activities during the day. (B) Only time classified as work or any variation (i.e., ‘working’, ‘at work’) counted towards total work time. (C) Episodes in which the individual reported multiple classifications (i.e. multitasking) that included work did not count towards work time, because the amount of work was not reported separately and could not be adequately determined. Time in work activities was totaled across episodes, resulting in a total daily work time.

**Perception of time**

Perception of time operationalizes how individuals perceive their time in work activities during the day. Four items of time perception were assessed: feeling rushed, sad, appreciated, and happy. Respondents were asked how prevalent the feeling was during work time and reported their rating on a 7-point scale with 0 = *did not experience this feeling at all* and 6 = *this feeling was very strong*. Feeling rushed in work activities was adapted from Ballard and Seibold’s (2003) research on the experience of time at work. Feeling appreciated during work activities was adapted from Blair and Johnson (1992). Questions regarding feelings of sad and
happy were taken directly from the American Time Use Survey Well-Being Module (Bureau of Labor Statistics, 2014).

**Work-family beliefs related to time**

Work-family beliefs related to time were assessed via an item adapted from Westenholz (2006). The item assesses macrosystem beliefs related to the meaningfulness of distinguishing family and work. Respondents answer on a 3-point scale ranging from 1 = *It is very meaningful to distinguish between family and work* and 3 = *It is not meaningful to distinguish between family and work*. This item was assessed through the demographic survey.

**Gender**

Gender of the individual will be assessed through asking respondents to report with which gender they identify. This item was open-ended and assessed through the demographic survey.

**Age**

Age of the individual was assessed by asking respondents to report their current age in years. This item was addressed through the demographic survey.

The subsequent chapter will present the results of the study. Based on the six hypotheses of this study, a series of three regression models were conducted in STATA 13.1. These models examine the hypothesized connections between work (both objective work time and subjective work time) and the dependent variables related to relationship quality. Gender and beliefs regarding family and work time were included in the models to examine macrolevel variables.
Chapter 4: Results

This chapter presents findings related to the model connecting family and work microsystems in family businesses. Data from 99 individuals, who owned businesses in which their spouses were involved, were used for the analysis. All analyses were conducted in STATA SE 13.1 (StataCorp, 2011). This chapter presents information regarding data cleaning and assessment of missing data, followed by sample descriptions. Finally, regression models assessing the six hypotheses pertaining to time, perception, and intimate relationships are presented.

Preliminary Data Analysis

Assessment of each variable was conducted to examine data for outliers, skewed data, and missing data. The dependent variables, daily withdrawal and daily anger, had positively skewed distributions. Both variables were transformed via natural log transformation, as was necessitated and conducted in Story and Repetti (2006), a study which also had daily diary data. Daily closeness had a negatively skewed distribution. Daily closeness was transformed via reflection (reverse coding) and natural log transformation. Data were reflected back in order for higher values to indicate higher reported closeness.

A total of 99 individuals, who reported that they owned family businesses, completed the demographic survey and day one of the daily diary. The daily data collected had substantial respondent dropout. Twenty-four respondents completed day two of the daily diary, with four completing day three, two completing day four, two completing day five, and one completing day six. The unbalanced nature of the dataset as a result of dropout, with large variation in the number of daily diaries completed by individuals and too many people completing too few diaries, can lead to the inability to quantify within-person residual variation (Singer & Willett,
Due to this substantial dropout, preliminary analyses were conducted to provide guidance on whether multiple days of reporting could or should be used.

Respondent dropout is a common concern for daily diary methods (Iida, Shrout, Laurenceau, & Bolger, 2012). Iida and colleagues state three sources of burden that contribute to respondent dropout: daily length of reporting, frequency of reporting, and duration of collection period (i.e., one week versus one month). Analyses examining the difference between those who dropped out and those who completed at least two daily diaries were conducted. Difference tests between individuals who completed only one daily diary ($n = 75$) and the individuals who completed more than one daily diary ($n = 24$) found that those who completed more than one diary were younger ($t = 2.64, p < .01$) and more likely to be men ($\chi^2 = 9.02, p < .01$). Individuals did not differ on whether or not they completed more than one daily diary by the number of work hours they reported during the day, daily withdrawal from spouse, daily anger with spouse, daily closeness to spouse, income, ethnicity, level of education, or presence of children. This set of analyses seemed to indicate two differences between people who completed one or more than one day. The assumption regarding data missing at random for analysis was not supported, meaning that dropout from the study was not at random (Singer & Willett, 2003).

The next set of analyses was designed to assess how missing days of reporting would affect study results. To assess the influence of dropout and the Missing Not at Random pattern in the dataset, a series of models comparing potential analyses were conducted (selection and pattern mixture models; Singer & Willett, 2003). Models included regression models of data on each dependent variable (withdrawal, anger, closeness) using day one diaries only, a multilevel model using days one and two of the daily diaries, and a multilevel model using all days of the daily diaries. For example, for relationship withdrawal, a baseline multilevel model, a regression
model that included all predictors for day one only, a multilevel model with predictors including days one and two, and a multilevel model with predictors including days one through six were conducted and compared. Baseline multilevel models of closeness revealed no substantial change in closeness within individuals (across days) and a non-significant LR test, indicating that dependent variable of closeness was better suited for regression analysis than for the multilevel models (Rabe-Hesketh & Skrondal, 2008). Assessment of the three models for withdrawal and anger revealed small to no change between coefficients. As a result of the minimal change in coefficients (J. Savla, personal communication, February 28, 2016), along with concerns with variance predictors using unbalanced data (Singer & Willett, 2003), only day one daily diaries were used for analyses. Therefore, the regression models were determined to be the best way to approach the data, with data from the day one of reporting as the only daily diary used. While this approach loses the advantage of capturing daily variation in time use, behaviors, and feelings, it retains the strength of individual reporting on event-level time, behaviors, and feelings rather than requiring people to be more general in how they spend time, behave, and feel (Robinson & Godbey, 1999).

**Descriptive Characteristics**

Sample characteristics are presented in Table 1. The sample is middle-aged and higher socioeconomic status (as indicated by the average education being between a two-year degree and four-year degree and earning around $90,001 to $100,000 a year). Individuals reported being in their marital or partner relationship for an average of 17.41 years ($SD = 12.14$) and being in their business from 14.21 years ($SD = 12.54$). Follow-up analysis regarding the number of individuals who reported being in a relationship longer than being involved with their business indicated that 59.60% reported longer relationship lengths than business lengths, indicating that
the majority of respondents started their businesses after being married or partnered to their current partner.

The majority of day one of daily diaries was on a Tuesday (46.46%) or Wednesday (43.43%). One person reported on a weekend; however, they reported the day as a work day and did report time in work activities in their daily diary. Individuals engaged in work for their business approximately five hours on the daily diary day. Comparing the reported time engaged in work activities to another study using the Day Reconstruction Time Diary in a sample with employed women, the individuals in the current study reported a lower hours worked, with an average time working of 6.9 hours in Kahneman and colleagues’ study (2004) and an average of 5.24 ($SD = 3.65$) in the current study. In a study utilizing data from the American Time Use Survey, in which the sample was of individuals who were part of a couple in which one member worked for pay, Flood and Genadek (2001), found that the people reported working an average of 270.19 minutes in paid work (4.50 hours). Therefore, the daily work hours of this sample is comparable to the daily work hours of other studies using daily reports of work hours.

Analyses examining gender differences on sample characteristics were conducted. Men were older than women ($t = 2.47, p < .05$) and earned a greater yearly personal income ($t = 3.45, p < .001$). Women reported perceiving time at work as more appreciated ($t = -2.50, p < .01$) and happier ($t = -2.13, p < .05$) than men did at work.
Table 1

Sample Characteristics by Gender

<table>
<thead>
<tr>
<th></th>
<th>Men (n = 52)</th>
<th>Women (n = 47)</th>
<th>Total (N = 99)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>M</td>
<td>SD</td>
<td>M</td>
</tr>
<tr>
<td>Age</td>
<td>48.65</td>
<td>12.90</td>
<td>42.36</td>
</tr>
<tr>
<td>Education(^a)</td>
<td>4.81</td>
<td>1.31</td>
<td>4.49</td>
</tr>
<tr>
<td>Personal Income(^b)</td>
<td>12.69</td>
<td>8.39</td>
<td>7.72</td>
</tr>
<tr>
<td>Relationship Length</td>
<td>18.81</td>
<td>12.56</td>
<td>15.93</td>
</tr>
<tr>
<td>Number of Children</td>
<td>1.90</td>
<td>1.34</td>
<td>1.77</td>
</tr>
<tr>
<td>Business Length</td>
<td>17.43</td>
<td>14.14</td>
<td>10.64</td>
</tr>
<tr>
<td>Work Hours</td>
<td>5.67</td>
<td>3.81</td>
<td>4.77</td>
</tr>
<tr>
<td>Work as Rushed</td>
<td>3.56</td>
<td>1.71</td>
<td>3.32</td>
</tr>
<tr>
<td>Work as Sad</td>
<td>2.52</td>
<td>1.89</td>
<td>2.38</td>
</tr>
<tr>
<td>Work as Appreciated</td>
<td>5.69</td>
<td>1.34</td>
<td>6.28</td>
</tr>
<tr>
<td>Work as Happy</td>
<td>5.15</td>
<td>1.50</td>
<td>5.74</td>
</tr>
<tr>
<td>Distinguishing Work and Family</td>
<td>2.63</td>
<td>.53</td>
<td>2.79</td>
</tr>
<tr>
<td>Withdrawal from Partner(^c)</td>
<td>3.11</td>
<td>.30</td>
<td>3.09</td>
</tr>
<tr>
<td>Anger with Partner(^c)</td>
<td>3.29</td>
<td>.37</td>
<td>3.32</td>
</tr>
<tr>
<td>Closeness to Partner(^c)</td>
<td>2.05</td>
<td>.07</td>
<td>2.09</td>
</tr>
</tbody>
</table>

Note. \(^a\)Education coded as: 1 = Less than high school, 2 = High school degree, 3 = Some college, 4 = 2-year college degree, 5 = 4-year college degree, 6 = Graduate degree; \(^b\)Income coded as: 1 = Under $10,000, 7 = $60,001-$70,000, 10 = $90,001-$100,000, 12 = $110,001-$120,000; \(^c\)Natural Log Transformed. \(\dagger p < .10, * p < .05, ** p < .01, ***p < .001\) identify significant difference in variable by gender.
**Business Characteristics**

Individuals owned companies primarily related to business services (32.32%), general retail (18.18%), and industrial/manufacturing (15.15%). Other businesses were in the fields of public service (11.11%), technology (9.09%), health care (6.06%), and agriculture (1.01%). Businesses were started by the respondent (66.67%) or their intimate partner (16.16%). Thirteen respondents owned businesses that their family had started (i.e., were successors to their family’s business). Business characteristics are presented by gender (Table 2) and by who is primarily responsible for the business (self, partner, and equally responsible; Table 3). Total sample statistics are included in Table 2.

Women were more likely than men to have spouses/partners who were founders of the business ($\chi^2 = 4.22, p < .05$). Men were more likely than women to have spouses/partners who had other forms of involvement ($\chi^2 = 5.63, p < .05$). Finally, men had longer involvement with their business than women ($t = 2.78, p < .01$). Groups were different based on having control over strategic direction over the business ($F = 10.94, p < .01$) and spousal/partner involvement of: founder ($\chi^2 = 15.44, p < .001$), member of the board ($\chi^2 = 6.05, p < .05$), stepping in when the business needed help ($\chi^2 = 7.20, p < .05$) and other involvement in the business ($\chi^2 = 6.83, p < .05$).
Table 2

*Business Characteristics by Gender*

<table>
<thead>
<tr>
<th></th>
<th>Men</th>
<th></th>
<th></th>
<th>Women</th>
<th></th>
<th></th>
<th>Total Sample</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>%</td>
<td>M</td>
<td>SD</td>
<td>%</td>
<td>M</td>
<td>SD</td>
<td>%</td>
<td>M</td>
<td>SD</td>
</tr>
<tr>
<td>Family has control over direction</td>
<td>35</td>
<td>37</td>
<td>73</td>
<td>1.62</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Business has a succession plan</td>
<td>32</td>
<td>31</td>
<td>64</td>
<td>0.21</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Business vision includes family</td>
<td>32</td>
<td>30</td>
<td>63</td>
<td>0.06</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Number of generations in business</td>
<td>1.44</td>
<td>0.15</td>
<td>1.51</td>
<td>0.12</td>
<td>1.55</td>
<td>0.90</td>
<td>-0.35</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Spouse/partner involvement</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Founder</td>
<td>16</td>
<td>24</td>
<td>40</td>
<td>4.22*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Member of board</td>
<td>9</td>
<td>9</td>
<td>18</td>
<td>0.06</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Shareholder</td>
<td>13</td>
<td>8</td>
<td>21</td>
<td>0.94</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Executive</td>
<td>9</td>
<td>15</td>
<td>24</td>
<td>2.87†</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Manager</td>
<td>9</td>
<td>9</td>
<td>18</td>
<td>0.06</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Employee</td>
<td>8</td>
<td>15</td>
<td>23</td>
<td>3.78†</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Steps in when needed</td>
<td>20</td>
<td>18</td>
<td>38</td>
<td>0.00</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Other involvement</strong></td>
<td>14</td>
<td>4</td>
<td>18</td>
<td>5.63*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>-------------------------------------</td>
<td>-----</td>
<td>-----</td>
<td>-----</td>
<td>-------</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Length of work in family business</td>
<td>17.43</td>
<td>1.96</td>
<td>10.64</td>
<td>1.37</td>
<td>14.21</td>
<td>12.54</td>
<td>2.78**</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Length of business operation</td>
<td>16.17</td>
<td>2.23</td>
<td>13.81</td>
<td>2.34</td>
<td>15.05</td>
<td>16.02</td>
<td>0.73</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Employees</td>
<td>84.98</td>
<td>48.94</td>
<td>223.72</td>
<td>114.15</td>
<td>150.85</td>
<td>597.61</td>
<td>-1.16</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Work for business is compensated</td>
<td>49</td>
<td>41</td>
<td>91</td>
<td>1.46</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Business based in home</td>
<td>27</td>
<td>23</td>
<td>51</td>
<td>0.09</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>% work accomplished at home</td>
<td>44.19</td>
<td>5.11</td>
<td>42.94</td>
<td>5.63</td>
<td>43.60</td>
<td>37.51</td>
<td>0.17</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Have scheduled time off work</td>
<td>31</td>
<td>34</td>
<td>66</td>
<td>1.77</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Location of business</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Urban</td>
<td>40</td>
<td>28</td>
<td>69</td>
<td>3.45†</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Rural</td>
<td>9</td>
<td>14</td>
<td>23</td>
<td>2.16</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Online</td>
<td>3</td>
<td>5</td>
<td>8</td>
<td>0.79</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Gross business revenue (mil)</td>
<td>7.44</td>
<td>3.59</td>
<td>4.74</td>
<td>2.49</td>
<td>6.19</td>
<td>22.10</td>
<td>0.60</td>
<td></td>
<td></td>
</tr>
<tr>
<td>How successful is the business to date?</td>
<td>4.06</td>
<td>0.12</td>
<td>4.17</td>
<td>0.12</td>
<td>4.11</td>
<td>0.84</td>
<td>-0.66</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

*Note. † p < .10, * p < .05, ** p < .01, ***p < .001 identify significant difference in variable*
Table 3

**Business Characteristics by Who is Primarily Responsible for the Business**

<table>
<thead>
<tr>
<th></th>
<th>Self  (n = 62)</th>
<th>Partner (n = 12)</th>
<th>Equally Responsible (n = 25)</th>
<th>$\chi^2$ / F</th>
</tr>
</thead>
<tbody>
<tr>
<td>Family has control over direction</td>
<td>38 % 11 M SD</td>
<td>23 % 11 M SD</td>
<td></td>
<td>10.94**</td>
</tr>
<tr>
<td>Business has a succession plan</td>
<td>42 % 5 M SD</td>
<td>16 % 5 M SD</td>
<td></td>
<td>2.96</td>
</tr>
<tr>
<td>Business vision includes family</td>
<td>40 % 8 M SD</td>
<td>14 % 7 M SD</td>
<td></td>
<td>0.65</td>
</tr>
<tr>
<td>Number of generations in business</td>
<td>1.61 0.12 M SD</td>
<td>1.42 0.28 M SD</td>
<td>1.16 0.19 M SD</td>
<td>2.00</td>
</tr>
<tr>
<td>Spouse/partner involvement</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Founder</td>
<td>16 % 9 M SD</td>
<td>15 % 7 M SD</td>
<td></td>
<td>15.44***</td>
</tr>
<tr>
<td>Member of board</td>
<td>10 % 7 M SD</td>
<td>8 % 7 M SD</td>
<td></td>
<td>6.05*</td>
</tr>
<tr>
<td>Shareholder</td>
<td>14 % 7 M SD</td>
<td>7 % 7 M SD</td>
<td></td>
<td>3.99</td>
</tr>
<tr>
<td>Executive</td>
<td>13 % 8 M SD</td>
<td>8 % 8 M SD</td>
<td></td>
<td>1.19</td>
</tr>
<tr>
<td>Manager</td>
<td>12 % 2 M SD</td>
<td>4 % 2 M SD</td>
<td></td>
<td>0.16</td>
</tr>
<tr>
<td>Employee</td>
<td>12 % 5 M SD</td>
<td>6 % 5 M SD</td>
<td></td>
<td>2.82</td>
</tr>
<tr>
<td>Steps in when needed</td>
<td>30 % 2 M SD</td>
<td>6 % 3 M SD</td>
<td></td>
<td>7.20*</td>
</tr>
<tr>
<td>Other involvement</td>
<td>16</td>
<td>0</td>
<td>2</td>
<td>6.83*</td>
</tr>
<tr>
<td>-------------------------------------------------------</td>
<td>----</td>
<td>---</td>
<td>---</td>
<td>-------</td>
</tr>
<tr>
<td>Length of work in family business</td>
<td>15.31</td>
<td>1.59</td>
<td>10.33</td>
<td>3.62</td>
</tr>
<tr>
<td>Length of business operation</td>
<td>14.66</td>
<td>2.05</td>
<td>15.33</td>
<td>4.67</td>
</tr>
<tr>
<td>Employees</td>
<td>228.42</td>
<td>75.58</td>
<td>22.83</td>
<td>171.80</td>
</tr>
<tr>
<td>Work for business is compensated</td>
<td>60</td>
<td>9</td>
<td>22</td>
<td>5.29†</td>
</tr>
<tr>
<td>Business based in home</td>
<td>34</td>
<td>5</td>
<td>11</td>
<td>1.26</td>
</tr>
<tr>
<td>% work accomplished at home</td>
<td>47.35</td>
<td>4.77</td>
<td>37.33</td>
<td>10.85</td>
</tr>
<tr>
<td>Have scheduled time off work</td>
<td>37</td>
<td>10</td>
<td>18</td>
<td>3.09</td>
</tr>
<tr>
<td>Location of business</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Urban</td>
<td>45</td>
<td>6</td>
<td>17</td>
<td>2.39</td>
</tr>
<tr>
<td>Rural</td>
<td>12</td>
<td>5</td>
<td>6</td>
<td>2.82</td>
</tr>
<tr>
<td>Online</td>
<td>5</td>
<td>1</td>
<td>2</td>
<td>0.00</td>
</tr>
<tr>
<td>Gross business revenue (mil)</td>
<td>85.58</td>
<td>2.85</td>
<td>2.55</td>
<td>6.37</td>
</tr>
<tr>
<td>How successful is the business to date?</td>
<td>4.15</td>
<td>0.11</td>
<td>3.75</td>
<td>0.24</td>
</tr>
</tbody>
</table>

Note. † p < .10, * p < .05, ** p < .01, ***p < .001 identify significant difference in variable
Correlations Among Model Variables

Correlations between model variables were conducted and are presented in Table 4. Age was associated with perceptions of time at work, with younger respondents reporting time as more rushed, sad, appreciated, and happy than older respondents. Younger respondents reported a stronger belief in distinguishing between family and work than older respondents. Finally, younger respondents reported more daily behaviors related to withdrawal from partner and anger with partner. The amount of time in work hours during the day was not related to any of the model variables.

Perceiving time at work as rushed was positively correlated with perceiving time as sad, with people reported time as more rushed perceived time as more sad. Feeling more rushed at work was also related to higher daily withdrawal from partner and anger with partner. Similarly, perceiving work time as sad was associated with more withdrawal and anger. Reporting feeling time at work as appreciated was positively associated with perceiving time as happy. Individuals who perceived more time at work as appreciated reported believing greater meaningfulness for distinguishing between family and work. Reporting feeling time at work as appreciated was associated with relationship qualities of withdrawal and closeness; more perceived appreciation was associated with less daily withdrawal from partner and more closeness to partner. Perceiving work time as happier during the day was associated with believing greater meaningfulness for distinguishing between family and work and more reported closeness to partner. The reported belief in distinguishing between family and work was associated with closeness, with individuals who reported believing in segmentation reporting feeling more close to their partner. Finally, all relationship qualities were correlated with each other with the
expected association and direction of effect (i.e., withdrawal and anger are positively correlated with each other, while both are negatively correlated with closeness).
Table 4  
*Correlations Among Model Variables*

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>8</th>
<th>9</th>
<th>10</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Gender</td>
<td></td>
<td>-</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. Age</td>
<td>-.24*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. Work Hours</td>
<td>-.12</td>
<td>.09</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. Work as Rushed</td>
<td>-.06</td>
<td>-.31**</td>
<td>.06</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5. Work as Sad</td>
<td>-.04</td>
<td>-.29**</td>
<td>-.08</td>
<td>.54***</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6. Work as Appreciated</td>
<td>.25*</td>
<td>-.24*</td>
<td>-.02</td>
<td>-.06</td>
<td>-.16</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7. Work as Happy</td>
<td>.21*</td>
<td>-.34***</td>
<td>.04</td>
<td>.10</td>
<td>-.10</td>
<td>.49***</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>8. Distinguishing Work and Family</td>
<td>.15</td>
<td>-.38***</td>
<td>.16</td>
<td>.15</td>
<td>.09</td>
<td>.26**</td>
<td>.20*</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>9. Withdrawal from Partner</td>
<td>-.04</td>
<td>-.29**</td>
<td>.12</td>
<td>.43***</td>
<td>.52***</td>
<td>-.23*</td>
<td>-.17†</td>
<td>.06</td>
<td></td>
<td></td>
</tr>
<tr>
<td>10. Anger with Partner</td>
<td>.05</td>
<td>-.42***</td>
<td>-.02</td>
<td>.46***</td>
<td>.59***</td>
<td>-.17†</td>
<td>-.10</td>
<td>.07</td>
<td>.80***</td>
<td></td>
</tr>
<tr>
<td>11. Closeness to Partner</td>
<td>.04</td>
<td>.05</td>
<td>-.02</td>
<td>-.03</td>
<td>-.16</td>
<td>.41***</td>
<td>.30**</td>
<td>.25*</td>
<td>-.42***</td>
<td>-.30**</td>
</tr>
</tbody>
</table>

*Note.* Gender coded as Men = 0 and Women = 1.

† *p* < .01, * *p* < .05, ** *p* < .01, *** *p* < .001
Regression Models

To address hypotheses concerning the effect of work time and feeling of work time on couple relationships, regression analyses were conducted for each of the three outcome variables: (A) withdrawal from partner, (B) anger with partner, and (C) closeness to partner. Included in the models were the daily experience of the individual, including time in work activities, perception of that time, and relationship quality. Individual characteristics included beliefs regarding distinguishing work and family, age, and gender. Interaction effects between time in work activities and perception of work time were added to the model. Models were conducted separately for each of the intimate relationship quality indicators (relationship withdrawal, relationship anger, relationship closeness) to test the six hypotheses proposed in chapter 2. Results are organized according to the relationship variables used as dependent variables within the models. As such, testing of hypothesis one, individuals who believe in integrating work and family will report higher quality relationships than will individuals who believe in segmenting work and family, is incorporated and assessed within all models.

Withdrawal from Partner

Hypothesis two proposes that time in work activities would be related to higher relationship withdrawal, but this relationship would be moderated by perception of time at work. Gender was also proposed to have an influence on daily withdrawal from partner (hypothesis three). Table 5 presents findings from the regression analysis.

The regression model was significant, $F(8, 90) = 5.62, p < .001$, with the model accounting for 40% of variance in self-reported withdrawal from partner. Main effects on daily withdrawal from partner include work hours ($B = 0.01, p < .05$), perceiving work as sad ($B = 0.05, p < .01$), and age ($B = -0.01, p < .01$). Perceiving time at work as rushed ($B = 0.03, p < .10$)
and happy ($B = -0.04, p < .10$) were associated with withdrawal on a trend level. Perceiving time at work as appreciated was not a significant predictor of withdrawal, nor were gender or beliefs regarding distinguishing between family and work.
Table 5

**Work Hours and Perceptions Predicting Daily Withdrawal**

<table>
<thead>
<tr>
<th></th>
<th>Daily Withdrawal from Partner</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
</tr>
<tr>
<td>Interception</td>
<td>3.57</td>
</tr>
<tr>
<td>Work hours</td>
<td>0.01</td>
</tr>
<tr>
<td>Perception of work time</td>
<td></td>
</tr>
<tr>
<td>Rushed</td>
<td>0.03</td>
</tr>
<tr>
<td>Sad</td>
<td>0.05</td>
</tr>
<tr>
<td>Appreciated</td>
<td>-0.03</td>
</tr>
<tr>
<td>Happy</td>
<td>-0.04</td>
</tr>
<tr>
<td>Distinguishing family and work</td>
<td>-0.03</td>
</tr>
<tr>
<td>Age</td>
<td>-0.01</td>
</tr>
<tr>
<td>Gender*</td>
<td>0.01</td>
</tr>
<tr>
<td>Interactions</td>
<td></td>
</tr>
<tr>
<td>Work Hours X Rushed</td>
<td>-0.00</td>
</tr>
<tr>
<td>Work Hours X Sad</td>
<td>0.00</td>
</tr>
<tr>
<td>Work Hours X Appreciated</td>
<td>0.01</td>
</tr>
<tr>
<td>Work Hours X Happy</td>
<td>-0.00</td>
</tr>
</tbody>
</table>

\[ \text{R}^2 = .40 \]

\[ F = 7.54^{***} \]

*Note. N = 99. CI = confidence interval. Gender coded as Men = 0 and Women = 1.*

† p < .01, * p < .05, ** p < .01, ***p < .001
Findings from the withdrawal model do not support hypothesis one, provide support for hypothesis two, and do not support hypothesis three. No effect of beliefs regarding distinguishing work and family was found in the model (Hypothesis 1). Work time was associated with withdrawal from partner and this effect was moderated by feelings of appreciation and happiness during work hours (Hypothesis 2). Gender was not found to be significant in the model predicting withdrawal behaviors (Hypothesis 3). Unanticipated main effects for age and perceiving work time as sad were significantly associated with withdrawal from spouse.

**Anger with Partner**

Hypotheses four and five propose that time in work activities would be related to anger with partner, but this relationship would be moderated by perception of time at work. Gender was also proposed to have an influence on daily anger with a partner. Table 6 presents findings from the regression analysis.

The regression model was significant, $F(8, 90) = 10.13, p < .001$, with the model accounting for 47% of variance in self-reported anger with partner. Main effects on daily anger with partner include perceiving time at work as sad ($B = 0.07, p < .001$) and age ($B = -0.01, p < .001$). Perceiving time at work as rushed ($B = 0.03, p < .10$) was associated with anger on a trend level. The number of hours at work, perceiving time as appreciated, perceiving time as happy, beliefs distinguishing between work and family, and gender were significant predictors of anger. The interaction between work time and perceiving work time as rushed was associated with anger at a trend level, however no significant interaction effects between work hours and perceptions of work time were found for influencing daily anger with a partner.
Table 6

*Work Hours and Perceptions Predicting Daily Anger*

<table>
<thead>
<tr>
<th>Daily Anger with Partner</th>
<th>B</th>
<th>SE</th>
<th>95% CI</th>
</tr>
</thead>
<tbody>
<tr>
<td>Intercept</td>
<td>3.95</td>
<td>0.30***</td>
<td>[3.36, 4.53]</td>
</tr>
<tr>
<td>Work hours</td>
<td>0.01</td>
<td>0.01</td>
<td>[-0.01, 0.02]</td>
</tr>
<tr>
<td>Perceptions of work time</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Rushed</td>
<td>0.03</td>
<td>0.02†</td>
<td>[-0.00, 0.07]</td>
</tr>
<tr>
<td>Sad</td>
<td>0.07</td>
<td>0.02***</td>
<td>[0.04, 0.11]</td>
</tr>
<tr>
<td>Appreciated</td>
<td>-0.03</td>
<td>0.03</td>
<td>[-0.08, 0.02]</td>
</tr>
<tr>
<td>Happy</td>
<td>-0.04</td>
<td>0.02</td>
<td>[-0.08, 0.01]</td>
</tr>
<tr>
<td>Distinguishing family and work</td>
<td>-0.06</td>
<td>0.06</td>
<td>[-0.18, 0.06]</td>
</tr>
<tr>
<td>Age</td>
<td>-0.01</td>
<td>0.00***</td>
<td>[-0.01, -0.00]</td>
</tr>
<tr>
<td>Gender^*</td>
<td>0.04</td>
<td>0.06</td>
<td>[-0.07, 0.16]</td>
</tr>
<tr>
<td>Interactions</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Work Hours X Rushed</td>
<td>-0.01</td>
<td>0.00</td>
<td>[-0.02, 0.00]</td>
</tr>
<tr>
<td>Work Hours X Sad</td>
<td>0.00</td>
<td>0.01</td>
<td>[-0.01, 0.01]</td>
</tr>
<tr>
<td>Work Hours X Appreciated</td>
<td>-0.00</td>
<td>0.01</td>
<td>[-0.01, 0.01]</td>
</tr>
<tr>
<td>Work Hours X Happy</td>
<td>-0.01</td>
<td>0.01</td>
<td>[-0.02, 0.00]</td>
</tr>
<tr>
<td>$R^2$</td>
<td>.47</td>
<td></td>
<td></td>
</tr>
<tr>
<td>$F$</td>
<td>10.13***</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

*Note. N = 99. CI = confidence interval. Gender coded as Men = 0 and Women = 1.*

† $p < .01$, * $p < .05$, ** $p < .01$, ***$p < .001$
Findings from the anger model do not support the hypothesized predictions (articulated in hypothesis one, three, and four). No effect of beliefs distinguishing work and family was found in the model. Work time was not found to be associated with anger with partner and this effect was not significantly moderated by perceptions of work time. Gender was not found to be a significant predictor of anger with spouse. Unanticipated main effects for perceiving work time as sad and age were significantly associated with anger with spouse.

**Closeness to Partner**

Hypotheses six proposes that time in work activities would be related to higher reported closeness to partner, but this relationship would be moderated by perception of time at work. Table 7 presents findings from the regression analysis.

The regression model was significant, $F(8, 90) = 4.38, p < .001$, with the model accounting for 28% of variance in self-reported closeness to partner. Main effects on daily closeness to partner include perceiving time at work as appreciated ($B = 0.15, p < .01$), beliefs regarding distinguishing between family and work ($B = 0.27, p < .05$), and age ($B = 0.01, p < .05$). Perceiving time at work as happy ($B = 0.07, p < .10$) was associated with closeness on a trend level. Work hours, perceiving time at work as rushed or sad, and gender were not significant. There were no significant interactions between time in work activities and perception of time in work activities.
### Table 7

**Work Hours and Perceptions Predicting Daily Closeness**

<table>
<thead>
<tr>
<th></th>
<th>Daily Closeness to Partner</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>$B$</td>
</tr>
<tr>
<td>Intercept</td>
<td>-0.36</td>
</tr>
<tr>
<td>Work hours</td>
<td>-0.02</td>
</tr>
<tr>
<td><strong>Perception of work time</strong></td>
<td></td>
</tr>
<tr>
<td>Rushed</td>
<td>0.02</td>
</tr>
<tr>
<td>Sad</td>
<td>-0.02</td>
</tr>
<tr>
<td>Appreciated</td>
<td>0.15</td>
</tr>
<tr>
<td>Happy</td>
<td>0.07</td>
</tr>
<tr>
<td>Distinguishing family and work</td>
<td>0.27</td>
</tr>
<tr>
<td>Age</td>
<td>0.01</td>
</tr>
<tr>
<td>Gender$^a$</td>
<td>-0.07</td>
</tr>
<tr>
<td><strong>Interactions</strong></td>
<td></td>
</tr>
<tr>
<td>Work Hours X Rushed</td>
<td>0.01</td>
</tr>
<tr>
<td>Work Hours X Sad</td>
<td>0.01</td>
</tr>
<tr>
<td>Work Hours X Appreciated</td>
<td>0.01</td>
</tr>
<tr>
<td>Work Hours X Happy</td>
<td>0.01</td>
</tr>
</tbody>
</table>

$R^2 = .28$

$F = 4.38^{***}$

**Note.** $N = 99$. CI = confidence interval. $^a$Gender coded as Men = 0 and Women = 1.

$† p < .01$, $* p < .05$, $** p < .01$, $***p < .001$
Findings regarding relationship closeness supported hypothesis one. Believing it is important to distinguish work and family was related to reported closeness to partner. Hypothesis six was not supported; time in work was not related to closeness and there was no mediation effect of perception of work time. No association between gender and relationship closeness was found. Unexpected findings from this model include main effects for perceiving work time as appreciated and age. Individuals who reported work time as more appreciated reported more closeness. Individuals who were older in age also reported more closeness.

**Summary**

Findings from three regression models provide limited support of the hypotheses. Hypotheses were based on the idea that time in work and the perception of time would influence relationship qualities and that this connection would be moderated by perception of work time. Time in work hours was significantly associated with withdrawal from intimate partner as a main effect, but not significantly associated with anger with partner or closeness to partner.

The main effects of perception of time at work on relationship quality were unanticipated. Perceiving work time as sad had a direct association with withdrawal and anger. Feeling sad during work time had a negative link to how people interacted with their partner. Feeling appreciated during work time was associated with greater report of closeness to partner. Across all three models, age had a direct effect on relationship quality. Being younger was associated with more relationship withdrawal, more anger, and less closeness.

The macrosystem influence of beliefs regarding distinguishing family and work received limited support for being associated with relationship quality. Reporting more closeness to a partner was related to the belief that distinguishing work and family was meaningful. The data
revealed no support for the gender of respondents being connected to their report of relationship quality in the model.
Chapter 5: Discussion

This study assessed the connection between working in a family business and intimate partner relationships. Guided by principles of ecological theory, this study explores the unique work and family microsystems among individuals who work with an intimate partner in a business they own. It was proposed that time spent in work activities and the perception of the time in work activities influences intimate relationship quality. Three models were used to examine six specific hypotheses. Limited support for this idea was found in the models conducted. Table 8 provides an overview of the hypotheses, the results, and the connection to previous literature. The findings are interpreted with the theoretical lens of ecological theory. This chapter concludes by addressing study limitations and future research.
Table 8

*Findings of Proposed Hypotheses Connected to Previous Literature*

<table>
<thead>
<tr>
<th>Hypothesis</th>
<th>Support through Results</th>
<th>Connection to Previous Literature</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Hypothesis 1</strong>: Individuals who</td>
<td>Belief in distinguishing between work and family was significant for closeness, with individuals who believed that distinguishing between work and family was more meaningful reporting more closeness to partner.</td>
<td>Findings support the importance of matching cultural messages for relationship closeness. To the extent that distinguishing between work and family is a cultural message, the results for closeness are consistent with the literature.</td>
</tr>
<tr>
<td>believe in integrating work and</td>
<td>and family will report higher quality relationships</td>
<td></td>
</tr>
<tr>
<td>family will report higher quality</td>
<td>with individuals who believed that distinguishing between work and family was more meaningful reporting more closeness to partner.</td>
<td></td>
</tr>
<tr>
<td>relationships than will individuals</td>
<td>who believe in segmenting work and family.</td>
<td></td>
</tr>
<tr>
<td>who believe in segmenting work and</td>
<td>was more meaningful reporting more</td>
<td></td>
</tr>
<tr>
<td>family.</td>
<td>closeness to partner.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Time in work activities was associated with relationship withdrawal. Perception of time did not moderate this relationship.</td>
<td>Findings support previous research: withdrawal in intimate relationships is influenced by time in work activities.</td>
</tr>
<tr>
<td><strong>Hypothesis 2</strong>: Reporting longer</td>
<td>Time in work activities was associated with relationship withdrawal. Perception of time did not moderate this relationship.</td>
<td></td>
</tr>
<tr>
<td>time in work activities will be</td>
<td>associated with higher relationship withdrawal. The subjective account of time within work activities will moderate this relationship.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>No difference in gender was found.</td>
<td>Contrary to previous research, men and women did</td>
</tr>
</tbody>
</table>
more withdrawal from their relationship than will women.

<table>
<thead>
<tr>
<th>Hypothesis 4: Experiencing longer time in work activities will predict reduced expression of relationship anger. This effect is moderated by the subjective experience of work time.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time in work activities was not associated with relationship anger. Perception of time did not moderate this relationship.</td>
</tr>
<tr>
<td>Findings did not support previous literature; time in work activities was not associated with relationship anger. Findings did support for the results that women’s anger was associated with subjective time, although this study did not separate women’s and men’s subjective work time experiences.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Hypothesis 5: Men and women will report anger with partner differently.</th>
</tr>
</thead>
<tbody>
<tr>
<td>No difference in gender was found.</td>
</tr>
<tr>
<td>Contrary to previous research, men and women did not differ in their reports of anger with their spouse/partner.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Hypothesis 6: For both men and women, experiencing longer time in work activities will be related to a reduction in perceived closeness to one’s partner.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time in work activities was not associated with relationship closeness. Perception of time did not moderate this relationship.</td>
</tr>
<tr>
<td>Contrary to previous literature, closeness to spouse was not associated with time at work. This study did not find gender associations with closeness in relationships, supporting previous literature.</td>
</tr>
</tbody>
</table>
**Time and Relationship Quality**

The main crux of this study was to assess the mesosystem connection between work and family Microsystems in family businesses. Previous literature on work and family supported the connection between objective amount of time in work activities and relationship quality, with more time at work being associated with less reported relationship quality. Furthermore, previous research provided some evidence that how individuals perceived time in activities would be important to relationship quality. The findings of this study found inconsistent support for these connections.

**Work Hours**

In this study, objective work time was coded through a daily time diary. Reported hours of work in this study were less than an 8-hour workday. Using conservative coding procedures, estimated time in work activities were similar to other studies using daily diary time estimates (Flood & Genadek, 2001; Kahneman et al., 2004). Counter to the hypotheses, objective work time was not a main effect in the models of anger or closeness to partner. Objective work time had a main effect in the model on withdrawal from a spouse/partner. Together, these findings provide inconsistent support of previous literature on work time and relationship quality, which found that working long hours is negatively associated with relationship quality (Doumas et al., 2003; 2008).

The differences in findings related to the relationship measures can be found in the uniqueness of the sample and their experiences in family businesses. Rooted in ecological theory, two possible explanations emerge: (a) the connection between the two Microsystems may be that working long hours includes the family microsystem and (b) cultural messages from the macrosystem inform individuals that working long hours is what is best for the family.
economically. The first explanation is that working long hours in a family business means that individuals are maintaining connections and interactions with family members. As such, individuals may not view time in work activities as a distraction or separation of time from family. This explanation would account for the nonsignificant effect of work time on anger with partner and closeness to partner. It is possible that individuals in family businesses may also withdraw from their partner using work activities. To assess this relationship and potential explanation, further research should focus on how couples and families in family businesses engage with each other throughout the day and in what capacities (i.e., are couples actively working together or engaged in parallel work?).

The difference between previous research and current findings may also be attributed to macro-level influences and what it means for individuals in family businesses to work long hours. In capitalist societies in which time at work is highly rewarded (Carlson et al., 2015), families may view work time as rewarding. Work time may be viewed by an intimate partner as important to the growth and betterment of their family and increased economic status. The significant finding of work time related to withdrawal may be that individuals are reporting more withdrawal from their intimate partner because they have less opportunity for interaction. Future research exploring how couples make meaning of work in family businesses is warranted.

**Perception of Time**

Feeling time in work as sad and feeling time as appreciated had main effects on relationship quality. Feeling sad in work time was associated with withdrawal from the spouse or partner and with anger with the spouse or partner. While unexpected, this finding supports research on the consequences of negative valences of perceptions. Feeling sad in work activities could be the result of many factors, including both work and family factors. Sadness at work
may be influenced by work microsystem factors such as the business not performing up to the standards expected by an individual and the type of work that during that time. Sadness at work may also be influenced by the individual with whom the respondents are working with during their time at work.

Findings regarding appreciation and closeness indicate that feeling appreciated had a positive association with closeness within a relationship. This connection may be the result of working together generating interdependence, and resulting in closeness to intimate partners. As mentioned earlier, feeling appreciated is a source of social support. Feeling this support in the workplace from your partner may translate into feeling greater closeness to your partner.

**Macrosystem Connection to Work and Family Microsystems**

A contribution of this study to current work and family is the inclusion of the macrosystem in a model assessing the connection between work and family microsystems. Challenges of assessing macrosystem influences include teasing apart the different cultural messages (Rosa & Tudge, 2013). This study included the concept of the extent to which respondents felt that distinguishing work and family was meaningful in the model linking work time and relationship qualities. Rosa and Tudge suggest that when assessing behaviors in the microsystem, researchers should account for the belief systems that individuals receive concerning the mesosystem connections between the microsystems in which they engage. This study attempted to account for these beliefs.

Findings indicate that believing in distinguishing between work and family was related to increased closeness to partner, but not withdrawal from partner or anger with the partner. These findings were contrary to the hypothesis and previous research that indicated that believing in integrating work and family would lead to greater relationship quality. Previous literature
focusing on integration and segmentation of work and family found that what is important, above and beyond integrating and segmentation, is that individuals match the culture of a workplace. Again, the nature of family businesses as compared to the large, formalized workplaces that characterize the literature may account for the surprising finding. Because families in family businesses are generating their own workplace culture to some extent, it may be that the rhetoric from popular press and mainstream society in the United States for segmentation and believing in distinguishing between work and family is what is important to match for their overall well-being filters through to work and family businesses in a unique way.

**Gender**

Contrary to hypotheses, no significant associations with gender were found in the models. The role of gender on relationship quality had been established for withdrawal and anger. In the examination of sample characteristics, women in the study were younger than men, had lower yearly personal income than men, felt more appreciated during work time than men, and felt happier during work time than men. Gender patterns in the sample are important to discuss. Being younger and reporting lower personal yearly income compared to the men in the sample is characteristic of women business owners (Loscocco & Leicht, 1993). The lack of effect of gender in the model is the result of many possibilities.

Research on distributive justice in housework supports the idea that women compare their experiences of fairness and feelings of appreciation across different microsystems (Blair & Johnson, 1992; Thompson, 1991). The findings that women perceive work time as more appreciated and happier during work time than men may support this finding, in the sense that women in family businesses may have very positive experiences in their work as compared to in the home (that is, they may be comparing within their own microsystems). In this way, women in
the sample may not see their time in other activities as appreciated as much as their time in which they work in the family business is appreciated for their family system. Indeed, logging hours of work for a family business is one way in which other family members, including intimate partners, can directly see the direct economic contribution women are making to the family. As such, work represents a space of valued contribution for women in family businesses.

The non-finding of gender associations with relationship quality may indicate that, for family businesses, the messages of work time having an economic benefit may be particularly prominent. Family businesses may represent a population of stalled gender equity (England, 2010). Women participate in both microsystems, but their experiences within each microsystem may be different. Within the family microsystem, no gender differences were found, possibly indicating that women and men have similar relationship effects within family businesses. In the work microsystem, mean levels of income and feelings of time indicate gender imbalances, with men reporting more money and women feeling more positive. However, gender in this study was assessed as a binary (man or woman; respondents were permitted to write in other gender identities, but not further information regarding gender roles or identities was collected). Further research assessing gender enactment in family businesses should be conducted. Particularly informative would be an ethnographic study of doing gender in family businesses, so that we could see if women are appreciated across microsystems.

Age

No predictions of age were made in the hypotheses; however, age was associated with relationship quality. In this study, being older was connected to higher quality relationships. This study was based on ecological theory as presented in phase one of Bronfenbrenner’s conceptualization (1973-1979; Rosa & Tudge, 2013). During phase three, Bronfenbrenner
focused on the passage of time. This focus on development and time resulted in the creation of an additional system of influence on development, the chronosystem. The chronosystem suggests the need to account for the experiences that individuals have over the life course and the historical time in which they live (Rosa & Tudge, 2013). Macrot ime, the historical time of the individual within the society, has been assessed in work-family research by exploring how historical events, such as the passage of work-life legislation and policies, influence the experience of work-family conflict (Voydanoff, 1988). Ecological theory, in its later iterations, would suggest that age has an important impact on microsystems, including the family microsystem. This study supports the need for including chronosystem influences in model development.

Younger people may have reported reduced relationship quality as a result of time in both work and family microsystems. Due to potential multicollinearity effects, only age was included into the model and not business length and relationship length. Younger people could be in newer businesses and have shorter relationship lengths than older respondents. Establishing a business can be a tumultuous experience for individuals and families. Approximately 70% of family businesses end within 10 years (Das pit et al., 2016), indicating the success rate of businesses in their early years is low. In addition to the challenge of establishing a business, profit from a business may not occur for years after the business starts. The length of business operation has been connected to family dynamics (Olson et al., 2003). In early family business development, there is a higher amount of resources transferred from a family to a business; however this relationship may switch in later years, with family members expecting more resources from the business (Ward, 1997).
Relationship length and time have a complex relationship. Relationships go through a period of idealization, a time-period through which individuals view their partner in a positive manner (viewing their partner with rose-colored glasses; Niehuis, Lee, Reifman, Swenson, & Hunsaker, 2011). This effect is also called a honeymoon period. While idealization generally occurs during the early stages of a relationship, another relationship process, disillusionment, can occur in the relationship. Disillusionment is the transition of making all positive attributions towards partner (they can do no wrong) to making negative attributions towards a partner (they can do no right). In addition, connections between age and relationship quality could be the result of a survivor effect on marriages (Vaillant & Vaillant, 1993). As people age in their relationship, relationships that are unstable or experience more withdrawal and anger and less closeness, may end. Future research should examine how temporal patterns in business development and relationship development are linked together.

**Family Businesses**

This study applied ecological theory as a theory to inform the connection between work and family microsystems in family businesses. In addition to the specific questions addressed in this study, the study addressed a need in family business research to focus on family dynamics and the connection between work and family. By focusing on the connection between the work microsystem and the family microsystem in family business, this study addressed the core of what make family businesses unique (Litz, 2008; Litz et al., 2012; Zahra & Sharma, 2004). This study has produced three important findings for future research on work and family and family businesses. First, objective work, through the quantification of work time within a family business, had no association with relationship quality beyond its statistical interactions with how family business members perceived work time at home. Secondly, the subjective assessment of
work time within a family business was associated with relationship quality. Finally, age was important to relationship quality.

Regarding the first point, time spent in work activities as a predictor of the work microsystem’s influence on family microsystems was not supported. For family businesses, it may be that the quantity of time in work or family may not matter, perhaps because time at work for family businesses might be a fundamentally different phenomenon from time at work for other people. Families in family businesses may focus on task accomplishment and management practices as opposed to putting-in “face-time” as they consider their own success or importance to an organization. There are some studies in the literature for interventions for family businesses related to work and family conflict that would explain the way work hours operate in family businesses. Olson and colleagues (2003), in a study assessing time management in families, found that spending more time in family activities instead of business tasks did not significantly influence family functioning (Olson et al.). Family business owners who spent more time in family did not report higher family function that those who put in less time with family. The authors of the study suggest that it is better for family businesses to not focus on work time and the allocation of hours as a means of intervention in order to balance work and family. For family businesses, the time in the family business may itself be a way to balance work and family. The current study supports the idea that perception of, rather than time at work, might be a fruitful focus of interventions.

The second contribution this study has made to work and family research among family businesses is the importance of subjective evaluations of time. Feeling time at work to be sad and feeling time as appreciated were associated with intimate relationship qualities. This finding is supportive of Iles and colleagues’ (2007) finding that the perception of workload influences
work-family conflict, rather than only the amount of work. Perception of time within family businesses may be a result of the couple’s interdependence within the family business. Kadis and McClendon (1991) theorize that couples need to create a sense of interdependence in order to be successful in their business and relationship. For couples to create interdependence, each person in the couple needs to be recognized as important for the business. The association between feeling time as appreciated and closeness supports this argument and supports previous research on appreciation as a feeling with symbolic meaning.

Similarly, feeling time as sad may reflect that an individual’s time in work for a business is not being valued. It could also be the case that there are business reasons for feeling work time as sad, or there could be relationship reasons. Future research should evaluate the differing effects of time perception and evaluation of the time as important for the business by both individuals within a couple. This study supports a perception-based intervention for work-family conflict for family businesses. The perception of time in the work microsystem is associated with relationship quality in the family microsystem. Focusing on understanding what makes time perceived as sad or appreciated for individuals and identifying what it is about the activities performed during that work time maybe useful for family businesses.

The final contribution of this study to understanding family businesses is the importance of age. Age was significantly associated with the family microsystem, with older individuals reporting higher relationship qualities than younger individuals. Length of business has been researched from the vantage point of how experience impacts the success of the business, but length of business may have confounding links to age and relationship processes.

**Limitations**
This study has several limitations. A major limitation of this study is the dropout rate of the daily diaries and resulting missing data. Online recruitment may have affected respondent buy-in and commitment to the project (Aust et al., 2013). Research analyzing Amazon’s Mechanical Turk (a popular, inexpensive online tool for survey research) as a platform found studies with lower compensation and a long time required for completion had lower response rates (Buhrmester, Kwang, & Gosling, 2011). Although this study used an established and well respected panel survey company, a similar effect may have occurred for the sample. Financial resources were targeted for gaining a sufficient sample size for the demographic and first day of daily diaries. Combined with survey lengths being approximately 30 minutes, respondents may not have viewed completing the remaining diaries as a priority.

Despite the significant dropout rate, there are several advantages of use the daily diary approach. In examining time use trends over time among United States populations, Robinson and Godbey (1999) underscore the value of diaries, particularly time diaries, for individuals with different work patterns. For example, they suggest that individuals who work long, irregular times have less anchors on which to base their time use during the day, which poses a challenge when asking respondents to estimate the number of hours they worked in a week or on an average basis. Given the flexibility and hectic nature of family businesses, having a report of a day rather than a generalization that respondents would have to estimate provided better data (Robinson & Godbey).

The ability to assess within individual change in time use, perception, and relationships would have been advantageous. With only using the first day of diary reporting, the study does not account for within-person variability. However, by utilizing the daily diary, the current study minimized the cognitive burden on respondents by avoiding having them aggregate their
behavior and experiences (Bolger, Davis, & Rafaeli, 2003). Robinson and Godbey (1999) proposed that having time diaries provide a greater level of detail in activities, resulting in lower estimates of activity time, particularly for work. Individuals provided details on their activities throughout the day and instead of combining activities differentiated by purposed time. Instead, individuals separated out time and tasks. For example, if an individual had to take care of errands for the business and did personal errands while they were out, they were permitted to indicate this in their daily diary. This leads to more specific time classifications and results in lower estimated time in work. Conservative decisions about work time yielded similar estimates to other time diary studies, but may have reduced the effect of time in work activities.

This study relies on self-reported data. Observation and interview data should be used to triangulate findings from the study (Morse, 1991). In addition, this study only includes one individual’s perspective on an intimate relationship. Having data from both partners would enhance the ability to interpret and assess the connection between work and family microsystems in family businesses. For example, an ethnography of couples at work and home would provide richness to further examine the connection between work and family microsystems in family businesses.

**Conclusion**

Grounded in ecological theory, this study found limited support that the work microsystems of individuals who work in a family business are connected to their family microsystems through the perception of time in the work microsystem. Connections came from the perception of time at work as time in which they were sad and time in which they were appreciated. Macrosystem influences of work and family (gender and beliefs on meaningfulness for distinguishing between work and family) have limited associations for intimate partner
relationships in family businesses, with only findings supporting the meaningfulness of distinguishing work and family and relationship closeness.

Intimate relationships among business owners were associated with age, indicating the importance to account for chronosystem influences within family businesses. Limited support for the model indicates that there may be unique processes of work and family operating within family businesses. Although connections between work and family were uncovered, these connections between work and family were inconsistent with previous research. Future research should untangle the processes through which work and family and time are connected, with attention to larger cultural influences, particularly how individuals within family businesses ascribe to and enact gender.
References


StataCorp. 2011. *Stata Statistical Software: Release 12*. College Station, TX: StataCorp LP.


http://pewsocialtrends.org/files/2013/10/parental-time-use_10-2013.pfd


10.1177/0961463X06061349


Appendix A: Demographic Survey

Overview
This project aims to understand how individuals who own a business weave together their family lives and their work lives. It is important to understand how individuals manage their personal lives and work lives in businesses to help build and strengthen businesses.

All responses are voluntary and confidential. Please answer the questions as honest as possible. Thank you

Informed Consent
You have been asked to participate in an academic study conducted by researchers at Virginia Tech titled, "Work and Family among Business Owners".

Your participation in this study has the potential to provide needed information for individuals regarding business ownership and navigating work and family. This study is for academic knowledge, not a commercial study or market study.

To assess work and family among business owners, we are collected a series of 8 daily surveys from approximately 50 business owners who are in a committed intimate relationship. The survey will last approximately 30 minutes. Questions ask relate to your experiences in regards to work, family, business, and individual characteristics. No foreseeable risks will occur as a result of participating in this study. No promise or guarantee of benefits have been made to encourage you to participate.

Your participation is confidential. We will not ask you any identifying information, such as your name or address. It is possible that the Institutional Review Board (IRB) at Virginia Tech may view this study’s collected data for auditing purposes. The IRB is responsible for the oversight of the protection of human subjects involved in research. If you have questions, please contact: Andrea Swenson (aswenson@vt.edu). If I should have any questions about the protection of human research participants regarding this study, I may contact Dr. David Moore, Chair Virginia Tech Institutional Review Board for the Protection of Human Subjects, telephone: (540) 231-4991; email: moored@vt.edu.

We know that your time is extremely valuable. Thank you in advance!

I have read the Consent Form and conditions of this project. I have had all my questions answered. I hereby acknowledge the above and give my voluntary consent.

- I voluntarily agree to participate in this study.
The following questions concern your navigation of work and family in your business.
1. Do any of your family members (such as intimate partner, children) participate in the day-to-day business functioning?
   a. Yes
   b. No
2. Does your family have control over the business’ strategic direction?
   a. Yes
   b. No
3. Do you have a succession or exit plan for your business?
   a. Yes
   b. No
   3a. If Yes Is Selected: Do you plan to pass the business on to another member of your family?
      i. Yes
      ii. No
4. Does the long-term vision for your business include to build something for your children?
   a. Yes
   b. No
5. How many generations of your family are involved in the business? (text entry)
6. Does one or more of your family members have management responsibility?
   a. Yes
   b. No
7. Please select ways in which your spouse or intimate partner is involved in the family business (select all that apply):
   a. Founder
   b. Member of governance board
   c. Shareholder
   d. Executive
   e. Manager
   f. Employee
   g. Steps in when need
   h. Other involvement
   i. Spouse/intimate partner not involved at all
8. Things I learn at work help me be more successful in my family life.
   a. Strongly agree
   b. Somewhat agree
   c. Somewhat disagree
   d. Strongly disagree
9. Things I learn in my family life help me be more successful at work.
   a. Strongly Agree
   b. Somewhat agree
   c. Somewhat disagree
   d. Strongly Disagree
10. Please select how meaningful it is to you to distinguish between family and work:
    a. It is very meaningful to distinguish between family and work
    b. It is somewhat meaningful to distinguish between family and work
c. It is not meaningful to distinguish between family and work

11. Please select your availability of work hours for your business:
   a. Not available for work in the morning, while commuting to and from work, on weekends, during holidays, at night
   b. Available for work to varying degrees in the morning, while commuting to and from work, in the evening, on weekends, during holidays, at night
   c. Available for work in the morning, while commuting to and from work, in the evening, on weekends, during holidays, at night

How much tension is there in your family related to...

<table>
<thead>
<tr>
<th></th>
<th>No tension</th>
<th>2</th>
<th>Moderate tension</th>
<th>4</th>
<th>A great deal of tension</th>
</tr>
</thead>
<tbody>
<tr>
<td>12. Confusion over who does what in the business?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>13. Confusion over who has the authority to make decisions?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>14. Unequal ownership of the business by family members?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>15. Unfair compensation for family members?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>16. Failure to resolve business conflict?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>17. Unfair workloads among family members due to the business?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>18. Competition for resources between family and business?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>

Select how much you agree with each statement below:

<table>
<thead>
<tr>
<th></th>
<th>Strongly Disagree</th>
<th>Disagree</th>
<th>Neither Agree nor Disagree</th>
<th>Agree</th>
<th>Strongly Agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>19. I give the moral support my intimate partner needs to succeed in the business.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>20. My intimate partner would come to me if he or she were feeling down about the business without feeling funny about it later.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>21. My intimate partner and I are very open about what we think about the business.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>
22. My intimate partner gives me the moral support I need to succeed in the business.  
23. I could go to my intimate partner if I were feeling down about the business without feeling funny about it later.  

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
</tr>
</thead>
<tbody>
<tr>
<td>22.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>23.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

24. How long have you worked in business? (Text entry)  
25. Do you have a work title?  
   a. Yes  
   b. No  
   25a. If yes: What is your work title? (Text entry)  
26. How would you classify the business?  
   a. Public Service  
   b. Health Care  
   c. Technology  
   d. Industrial/ Manufacturing  
   e. Business Services  
   f. General Retail  
   g. Agricultural  
   h. Other  
   26a. If Other: Please describe how you would classify the business: (Text entry)  
27. Who started the business?  
   a. You  
   b. Your Partner  
   c. Your Family  
   d. Your partner's family  
   e. Other  
   27a. If Other: Please describe who started the business: (Text entry)  
28. Between you and your spouse/intimate partner, who is the primary individual responsible for the business?  
   a. Self  
   b. Partner  
   c. Equally Responsible  
29. How long has the business been in operation?  
   a. Years  
   b. Months  
30. How many total employees, other than yourself, work for the business (Please list)? (Text entry)  
31. Is your work for the business paid:  
   a. No  
   b. By the hour  
   c. Salaried  
   d. On some other basis  
32. Is the business based in or from your home?  
   a. Yes  
   b. No
33. Approximately what percentage of work for the business is done at home? (Text entry)
34. In your opinion, which of the following is the most important long-range goal of the business? (Please select only one option)
   a. Adequate Financing
   b. Profit
   c. A Positive Reputation
   d. Long-term Viability
   e. Growth
35. Think of a scale from 1 to 5, where a 1 means that for you the business is a way of life, and a 5 means that for you the business is only a way to earn income. Which number best describes you?
   1. For me, business is a way of life
   2.
   3.
   4.
   5. For me, business is only a way to earn income
36. Think of a scale from 1 to 5, where a 1 means that for you the business comes first, and a 5 means that for you the family comes first. Which number best describes you?
   1. For me, the business comes first
   2.
   3.
   4.
   5. For me, the family comes first
37. Do you have scheduled time off from work?
   a. Yes
   b. No
38. Please select any days that are typically days off from the business or days in which you purposefully work “lighter” (Select all that apply).

<table>
<thead>
<tr>
<th>Day</th>
<th>Day off</th>
<th>&quot;Lighter&quot; work day</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sunday</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Monday</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Tuesday</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Wednesday</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Thursday</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Friday</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Saturday</td>
<td>1</td>
<td>2</td>
</tr>
</tbody>
</table>

39. Please select any time of year that is your busiest (Select all that apply).
   a. Winter
   b. Spring
   c. Summer
   d. Fall
   e. Other
39a. If Other: Please explain your busiest time of year:
40. Which of the following best describes the structure of the business?
   a. C-Corp
   b. Partnership
   c. Sole Proprietorship
   d. S-Corp
   e. LLC

41. What is the primary location of the business?
   a. Urban
   b. Rural
   c. On-line

42. Please estimate the total value, including assets, of your company today.
   a. Less than $100,000
   b. $100,000 - $500,000
   c. $500,001 - $1 Million
   d. $1 - $2 Million
   e. $2 - $3.5 Million
   f. $3.5 - $5 Million
   g. $5 - $7.5 Million
   h. More than $7.5 Million

43. Please record the gross business revenue for the last fiscal year: (Text entry)

Compared to your main competitors:

<table>
<thead>
<tr>
<th></th>
<th>Extremely bad performance</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>Excellent performance</th>
</tr>
</thead>
<tbody>
<tr>
<td>44. How did your business fare in the past 5 years on gross margin?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>45. How did your business fare in the past 5 years on growth of employees?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>46. How did your business fare in the past 5 years on sales growth rate of your firm?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>47. How did your business fare in the past 5 years on profitability?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>48. How did your business fare in the past 5 years on cash flow?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>

49. How does the business perform compared to your expectations?
   1. Extremely bad performance
   2. 
   3. 
   4. 
   5. Excellent performance
50. Overall, how successful is the business to date?
   1. Very Unsuccessful
   2.
   3.
   4.
   5. Very Successful

Please rate the extent to which

<table>
<thead>
<tr>
<th></th>
<th>Not at all</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>To a large extent</th>
</tr>
</thead>
<tbody>
<tr>
<td>51. Your family has influence on your business.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>52. Your family members share similar values.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>53. Your family and business share similar values.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>

Please rate the extent to which you agree with the following statements:

<table>
<thead>
<tr>
<th></th>
<th>Strongly Agree</th>
<th>Disagree</th>
<th>Neither Agree nor Disagree</th>
<th>Agree</th>
<th>Strongly agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>54. My family members are willing to put in a great deal of effort beyond that normally expected in order to help the business be successful.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>55. I support the business in discussions with friends, employees, and family members.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>56. I feel loyalty to the business.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>57. I find that my values are compatible with those of the business.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>58. I am proud to tell others that I am a part of the business.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>59. There is so much to be gained by</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>
participating with the business on a long-term basis.

60. I really care about the fate of the business.

61. Deciding to be involved with the business has a positive influence on my life.

62. For family businesses: I understand and support my family's decisions regarding the future of the family business.

63. Who is listed as the owner of the businesses?
   a. You
   b. Partner
   c. Other

64. Who has financial control over the business?
   a. You
   b. Partner
   c. Other

65. In general, how many hours a week do you work for the business? (Text entry)

66. Do you work any jobs in addition to the business?
   a. Yes
   b. No

66a. If yes: Approximately how many hours a week do you work outside of the business? (Text entry)

The following questions ask about your work and how satisfied you are.

<table>
<thead>
<tr>
<th>Question</th>
<th>A lot</th>
<th>Some of the time</th>
<th>A little</th>
<th>Not at all</th>
</tr>
</thead>
<tbody>
<tr>
<td>67. I like the sort of work that I am doing.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>68. I feel my work gives me a chance to do my best.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>69. I feel a sense of accomplishment from my work.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>70. I consider the job I do to be important.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>

The following questions pertain to how you feel at work, in general.
<table>
<thead>
<tr>
<th></th>
<th>Strongly Agree</th>
<th>Agree</th>
<th>Neither Agree nor Disagree</th>
<th>Disagree</th>
<th>Strongly Disagree</th>
</tr>
</thead>
<tbody>
<tr>
<td>71. I have to do things which I don't really have the time and energy for.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>72. There are too many demands on my time.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>73. I need more hours in the day to do all the things which are expected of me.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>74. I can't ever seem to get caught up.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>75. I feel it would be my personal responsibility to this business to help it achieve its goals.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>76. I don't ever seem to have any time for myself.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>77. There are times when I cannot meet everyone's expectations.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>78. Sometimes I feel as if there are not enough hours in the day.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>79. Many times I have to cancel commitments.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>80. Whenever in public, I would like to think of myself as an owner of this business.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>81. I seem to have to overextend myself in order to be able to finish everything I have to do.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>82. I seem to have more commitments to overcome than some of the other people in the same family situation I know.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>83. I feel it is my duty to support the goals of this business.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>84. I find myself having to prepare priority lists (lists which tell me which things to do first) to get done all the things I have to do. Otherwise I forget because I have so much to do.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>
85. I feel I have to do things hastily and maybe less carefully in order to get everything done.
86. I just can't find the energy in me to do all the things expected of me.
87. I am dedicated to the goals of the business.

How satisfied are you with....

<table>
<thead>
<tr>
<th></th>
<th>Very Dissatisfied</th>
<th>Dissatisfied</th>
<th>Neutral</th>
<th>Satisfied</th>
<th>Very Satisfied</th>
</tr>
</thead>
<tbody>
<tr>
<td>88. Your financial situation?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>89. The amount of leisure time that you have?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>90. The amount of time that you have with your spouse?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>91. Your friendships?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>92. Your sex life?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>93. Your family life?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>94. Your present work life?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>

95. On the whole, I am satisfied with myself.
   a. Very Dissatisfied
   b. Dissatisfied
   c. Somewhat Dissatisfied
   d. Neutral
   e. Somewhat Satisfied
   f. Satisfied
   g. Very Satisfied

The following questions ask for your views about your health, how you feel and how well you are able to do your usual activities.

96. In general, would you say your health is:
   a. Excellent
   b. Very Good
   c. Good
   d. Fair
e. Poor

97. Compared to one year ago, how would you rate your health in general now?
   a. Much better
   b. Somewhat better
   c. About the same
   d. Somewhat worse
   e. Much worse

98. How much bodily pain have you had during the past 4 weeks?
   a. None
   b. Very mild
   c. Mild
   d. Moderate
   e. Severe
   f. Very severe

99. During the past 4 weeks, how much did pain interfere with your normal work (including work both outside the home and housework)?
   a. Not at all
   b. A little bit
   c. Moderately
   d. Quite a bit
   e. Extremely

How true or false is each of the following statements for you?

<table>
<thead>
<tr>
<th>Statement</th>
<th>Definitely True</th>
<th>Mostly True</th>
<th>Don't Know</th>
<th>Mostly False</th>
<th>Definitely False</th>
</tr>
</thead>
<tbody>
<tr>
<td>100. I seem to get sick a little easier than other people</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>101. I am as healthy as anybody I know</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>102. I expect my health to get worse</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>103. My health is excellent</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>

Feelings and Emotions

<table>
<thead>
<tr>
<th>Feeling</th>
<th>Not at all</th>
<th>A little</th>
<th>Moderately</th>
<th>Very much so</th>
</tr>
</thead>
<tbody>
<tr>
<td>104. I feel calm</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>105. I feel secure</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>106. I am tense</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>107. I am regretful</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>108. I feel at ease</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>109. I feel upset</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>110. I am presently worrying over possible misfortunes</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>
For each of the following statements, check the box that best describes how often you have felt this way during the past month.

<table>
<thead>
<tr>
<th>Statement</th>
<th>Rarely or none of the time</th>
<th>A little of the time</th>
<th>A moderate amount of time</th>
<th>Most or all of the time</th>
</tr>
</thead>
<tbody>
<tr>
<td>124. I was bothered by things that don't usually bother me</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>125. I did not feel like eating; my appetite was poor</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>126. I felt that I could not shake the blues even with help from my family or friends</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>127. I felt that I was just as good as other people</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>128. I had trouble keeping my mind on what I was doing</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>129. I felt depressed</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>130. I felt that everything I did was an effort</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>131. I felt hopeful about the future</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>132. I thought my life has been a failure</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>133. I felt fearful</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>134. My sleep was restless</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>135. I was happy</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>136. I talked less than usual</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>137. I felt lonely</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>138. People were unfriendly</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>139. I enjoyed life</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>140. I had crying spells</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>141. I felt sad</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>142. I felt that people disliked me</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>143. I could not &quot;get going&quot;</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>

The following questions are background questions that will be used for comparison purposes only.

144. Please indicate your age: (Text entry)

145. Please indicate your gender:
   a. Man
   b. Woman
   c. Other

146. What is your race/ethnic background?
   a. White/Caucasian, non-Hispanic
   b. Black/African-American, non-Hispanic
   c. Mexican-American, Hispanic
   d. Other Hispanic
   e. Asian
   f. Other

147. What is the highest educational level you have completed?
   a. Less than high school
   b. High school
   c. Some college
   d. 2 year college degree
   e. 4 year college (Bachelor's degree)
   f. Graduate degree
   g. Other

148. What is your yearly personal income?
   a. Under $10,000
   b. $10,001-$20,000
   c. $20,001-$30,000
   d. $30,001-$40,000
   e. $40,001-$50,000
   f. $50,001-$60,000
   g. $60,001-$70,000
   h. $70,001-$80,000
   i. $80,001-$90,000
   j. $90,001-$100,000
   k. $100,001-$110,000
   l. $110,001-$120,000
   m. $120,001-$130,000
   n. $130,001-$140,000
   o. $140,001-$150,000
   p. $150,001-$160,000
   q. $160,001-$170,000
   r. $170,001-$180,000
   s. $180,001-$190,000
   t. $190,001-$200,000
   u. $200,001-$210,000
   v. $210,001-$220,000
   w. $220,001-$230,000
   x. $230,001-$240,000
   y. $240,001-$250,000
   z. $250,001 or above
149. What is your yearly household income?
   a. Under $10,000
   b. $10,001-$20,000
   c. $20,001-$30,000
   d. $30,001-$40,000
   e. $40,001-$50,000
   f. $50,001-$60,000
   g. $60,001-$70,000
   h. $70,001-$80,000
   i. $80,001-$90,000
   j. $90,001-$100,000
   k. $100,001-$110,000
   l. $110,001-$120,000
   m. $120,001-$130,000
   n. $130,001-$140,000
   o. $140,001-$150,000
   p. $150,001-$160,000
   q. $160,001-$170,000
   r. $170,001-$180,000
   s. $180,001-$190,000
   t. $190,001-$200,000
   u. $200,001-$210,000
   v. $210,001-$220,000
   w. $220,001-$230,000
   x. $230,001-$240,000
   y. $240,001-$250,000
   z. $250,001 or above

150. Are you and your intimate partner:
   a. Legally married
   b. Formally committed (e.g., participated in a commitment ceremony)
   c. Other

   149a. If Other: Please describe: (text entry)

151. Length of ______ (marriage, formal commitment, other)
   a. Years
   b. Months

152. How many children do you have? (text entry)

153. How often have your spouse/intimate partner and you had open disagreements about spending time together?
   a. Never
   b. Less than once a month
   c. Several times a month
   d. About once a week
   e. Several times a week
   f. Almost every day

The following questions concern you and your intimate partner.

<table>
<thead>
<tr>
<th>Question</th>
<th>Strongly Agree</th>
<th>Neither Agree nor Disagree</th>
<th>Strongly Disagree</th>
</tr>
</thead>
<tbody>
<tr>
<td>154. We have a good relationship.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>155. My relationship with my partner is very stable.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>156. Our marriage is strong.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>157. My relationships with my partner makes me happy.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>158. I really feel like part of a team with my partner.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
</tbody>
</table>
159. On a scale of 1 to 10, with 1 = not at all happy and 10 = very happy, what is the degree of happiness, everything considered, in your relationship?
   1. 1 = Not at all Happy
   2. 2
   3. 3
   4. 4
   5. 5
   6. 6
   7. 7
   8. 8
   9. 9
   10. 10 = Very Happy
Appendix B: Daily Diary Survey

Overview
This project aims to understand how individuals who own a business weave together their family lives and their work lives. It is important to understand how individuals manage their personal lives and work lives in businesses to help build and strengthen businesses.

All responses are voluntary and confidential. Please answer the questions as honest as possible. Thank you.

Informed Consent Form
You have been asked to participate in an academic study conducted by researchers at Virginia Tech titled, "Work and Family among Business Owners".

Your participation in this study has the potential to provide needed information for individuals regarding business ownership and navigating work and family. This study is for academic knowledge, not a commercial study or market study. To assess work and family among business owners, we are collected a series of 8 daily surveys from approximately 50 business owners who are in a committed intimate relationship.

The survey will last approximately 30 minutes. Questions ask relate to your daily experiences including time in activities, work, and family. No foreseeable risks will occur as a result of participating in this study. No promise or guarantee of benefits have been made to encourage you to participate.

Your participation is confidential. We will not ask you any identifying information, such as your name or address. It is possible that the Institutional Review Board (IRB) at Virginia Tech may view this study’s collected data for auditing purposes. The IRB is responsible for the oversight of the protection of human subjects involved in research.

If you have questions, please contact: Andrea Swenson (aswenson@vt.edu). If I should have any questions about the protection of human research participants regarding this study, I may contact Dr. David Moore, Chair Virginia Tech Institutional Review Board for the Protection of Human Subjects, telephone: (540) 231-4991; email: moored@vt.edu.

We know that your time is extremely valuable. Thank you in advance!

I have read the Consent Form and conditions of this project. I have had all my questions answered.

I hereby acknowledge the above and give my voluntary consent.

- I voluntarily agree to participate in this study.
1. What is today's date?
2. I am reporting on a:
   a. Sunday
   b. Monday
   c. Tuesday
   d. Wednesday
   e. Thursday
   f. Friday
   g. Saturday
3. What is the current time?
4. What time did you go to sleep yesterday?
5. What time did you wake-up today?

We would like to learn better what you did and how you felt today. Not all days are the same - some are better, some are worse, and others are pretty typical. Here we are only asking you about today.

Think of your day as a continuous series of scenes or episode in a film. Describe what you were doing during that episode (for example, "commuting to work" or "at lunch with a friend"). Write down the approximate times at which each episode began and ended. The episodes people identify usually last between 15 minutes and 2 hours. Indications of the end of an episode might be going to a different location, ending one activity and starting another, or a change in the people you are interacting with. Include how you would classify the activities you are doing during this time - Work-related, Family-related, Leisure, Self-care, and Intimate relationship related. Classify the activity with as many classifications that apply.

There is one page for each part of the day - Morning (from waking up until Noon), Afternoon (from Noon to 6:00 p.m.) and Evening (from 6:00 p.m. until you plan to go to bed). There is room to list 10 episodes for each part of the day, although you may not need that many, depending on your day. It is not necessary to fill up all of the spaces - use the breakdown of your day that makes the most sense to you and best captures what you did.

6. Morning (from waking up until Noon)
   Episode 1
   a. Time it began:
   b. Time it ended:
   c. Description of activity/Who was with you during that time?
   d. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship
7. Morning (from time you wake-up until Noon)
   a. Time:
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship
8. Morning (from time you wake-up until Noon)
   a. Time:
   b. Description of activity/Who was with you during that time?
c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

9. Morning (from time you wake-up until Noon)
   a. Time:
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

10. Morning (from time you wake-up until Noon)
    a. Time:
    b. Description of activity/Who was with you during that time?
    c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

11. Morning (from time you wake-up until Noon)
    a. Time:
    b. Description of activity/Who was with you during that time?
    c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

12. Morning (from time you wake-up until Noon)
    a. Time:
    b. Description of activity/Who was with you during that time?
    c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

13. Morning (from time you wake-up until Noon)
    a. Time:
    b. Description of activity/Who was with you during that time?
    c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

14. Morning (from time you wake-up until Noon)
    a. Time:
    b. Description of activity/Who was with you during that time?
    c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

15. Morning (from time you wake-up until Noon)
    a. Time:
    b. Description of activity/Who was with you during that time?
    c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

16. If more space is needed for Morning Activities: (Text entry)

17. Afternoon (Noon-5 pm)
    a. Time:
    b. Description of activity/Who was with you during that time?
    c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

18. Afternoon (Noon-5 pm)
    a. Time:
    b. Description of activity/Who was with you during that time?
c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

19. Afternoon (Noon-5 pm)
   a. Time:
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

20. Afternoon (Noon-5 pm)
   a. Time:
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

21. Afternoon (Noon-5 pm)
   a. Time:
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

22. Afternoon (Noon-5 pm)
   a. Time:
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

23. Afternoon (Noon-5 pm)
   a. Time:
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

24. Afternoon (Noon-5 pm)
   a. Time:
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

25. Afternoon (Noon-5 pm)
   a. Time:
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

26. Afternoon (Noon-5 pm)
   a. Time:
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

27. If more space is needed for Afternoon Activities: (Text entry)

28. Evening (5 pm - 10 pm)
   a. Time
   b. Description of activity/Who was with you during that time?
c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

29. Evening (5 pm - 10 pm)
   a. Time
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

30. Evening (5 pm - 10 pm)
   a. Time
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

31. Evening (5 pm - 10 pm)
   a. Time
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

32. Evening (5 pm - 10 pm)
   a. Time
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

33. Evening (5 pm - 10 pm)
   a. Time
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

34. Evening (5 pm - 10 pm)
   a. Time
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

35. Evening (5 pm - 10 pm)
   a. Time
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

36. Evening (5 pm - 10 pm)
   a. Time
   b. Description of activity/Who was with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

37. Evening (5 pm - 10 pm)
   a. Time
   b. Description of activity/Who was with you during that time?
c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

38. If more space is needed for Evening Activities: (Text entry)

39. Anticipated Late Evening/Overnight (10 pm - planned wake-up time)
   a. Time:
   b. Description of activity/Who was (will be) with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

40. Anticipated Late Evening/Overnight (10 pm - planned wake-up time)
   a. Time:
   b. Description of activity/Who was (will be) with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

41. Anticipated Late Evening/Overnight (10 pm - planned wake-up time)
   a. Time:
   b. Description of activity/Who was (will be) with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

42. Anticipated Late Evening/Overnight (10 pm - planned wake-up time)
   a. Time:
   b. Description of activity/Who was (will be) with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

43. Anticipated Late Evening/Overnight (10 pm - planned wake-up time)
   a. Time:
   b. Description of activity/Who was (will be) with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

44. Anticipated Late Evening/Overnight (10 pm - planned wake-up time)
   a. Time:
   b. Description of activity/Who was (will be) with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

45. Anticipated Late Evening/Overnight (10 pm - planned wake-up time)
   a. Time:
   b. Description of activity/Who was (will be) with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

46. Anticipated Late Evening/Overnight (10 pm - planned wake-up time)
   a. Time:
   b. Description of activity/Who was (will be) with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

47. Anticipated Late Evening/Overnight (10 pm - planned wake-up time)
   a. Time:
   b. Description of activity/Who was (will be) with you during that time?
c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

48. Anticipated Late Evening/Overnight (10 pm - planned wake-up time)
   a. Time:
   b. Description of activity/Who was (will be) with you during that time?
   c. How would you classify this activity (write-in all that apply): Work, Family, Leisure, Self-Care, Relationship

49. If more space is needed for Anticipated Late Evening/Overnight Activities: (Text entry)

**Time in work activities for the family business**

Please think about all the time you spent at work for the family business today and answer the following:

50. Would you describe your work today for the family business as a:
   a. No work day
   b. Light work day
   c. Heavy work day

51. How much time at work was spent engaging with your intimate partner? (Text entry)

<table>
<thead>
<tr>
<th>Question</th>
<th>0</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
</tr>
</thead>
<tbody>
<tr>
<td>Did not experience this feeling at all</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>52. How happy did you feel?</td>
<td></td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>53. How tired did you feel?</td>
<td></td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>54. How stressed did you feel?</td>
<td></td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>55. How sad did you feel?</td>
<td></td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>56. How meaningful was the time?</td>
<td></td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>57. How rushed was the time?</td>
<td></td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>58. How calm was the time?</td>
<td></td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>59. How scarce did you feel your time was?</td>
<td></td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>60. How much control did you have?</td>
<td></td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
</tbody>
</table>

61. Was this time at work for the family business...
   a. Unappreciated
   b. 2
   c. 3
   d. 4
   e. 5
   f. 6
   g. Appreciated
62. Was this time at work for the family business...
   a. Boring
   b. 2
   c. 3
   d. 4
   e. 5
   f. 6
   g. Interesting

63. Was this time at work for the family business...
   a. Lonely
   b. 2
   c. 3
   d. 4
   e. 5
   f. 6
   g. Sociable

64. How much did you engage in multitasking at work?
   a. None
   b. 1
   c. 2
   d. 3
   e. 4
   f. 5
   g. All the time

65. Where was the majority of your work conducted?
   a. Home
   b. At the business
   c. Other

66. Did you work for pay outside the family business today?
   a. Yes
   b. No

314a. If yes, how many hours? (Text entry)

Please think about all the time you spent in family activities today and answer the following:

67. How much time in family activities was spent with your intimate partner? (Text entry)

When thinking about your time with family,

<table>
<thead>
<tr>
<th></th>
<th>Did not experience this feeling at all</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>This feeling was very strong</th>
</tr>
</thead>
<tbody>
<tr>
<td>68. How happy did you feel?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>69. How tired did you feel?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>Question</td>
<td>Score Options</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>-------------------------------------------------------------------------</td>
<td>---------------</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>70. How stressed did you feel?</td>
<td>0 1 2 3 4 5 6</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>71. How sad did you feel?</td>
<td>0 1 2 3 4 5 6</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>72. How meaningful was the time?</td>
<td>0 1 2 3 4 5 6</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>73. How rushed was the time?</td>
<td>0 1 2 3 4 5 6</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>74. How calm was the time?</td>
<td>0 1 2 3 4 5 6</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>75. How scarce did you feel your time was?</td>
<td>0 1 2 3 4 5 6</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>76. How much control did you have?</td>
<td>0 1 2 3 4 5 6</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

77. Was the time spent in family activities...
   a. Unappreciated
   b. 2
   c. 3
   d. 4
   e. 5
   f. 6
   g. Appreciated

78. Was the time spent in family activities...
   a. Boring
   b. 2
   c. 3
   d. 4
   e. 5
   f. 6
   g. Interesting

79. Was the time spent in family activities...
   a. Lonely
   b. 2
   c. 3
   d. 4
   e. 5
   f. 6
   g. Sociable

80. How much did you engage in multitasking during this time?
   a. None
   b. 1
   c. 2
   d. 3
   e. 4
   f. 5
   g. All of the time

81. How much time did you and your partner spend together today for the sole purpose of your relationship? (i.e., talking about things other than work, going out together) (Text entry)
82. How much time did you and your partner spend together today in joint leisure activities? (Text entry)

Please think about all the time you spent in relationship activities today and answer the following:

<table>
<thead>
<tr>
<th>Question</th>
<th>Did not experience this feeling at all</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
</tr>
</thead>
<tbody>
<tr>
<td>83. How happy did you feel?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>84. How tired did you feel?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>85. How stressed did you feel?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>86. How sad did you feel?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>87. How meaningful was the time?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>88. How rushed was the time?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>89. How calm was the time?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>90. How scarce did you feel your time was?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>91. How much control did you have?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
</tbody>
</table>

92. Was the time spent in relationship activities...
   a. Unappreciated
   b. 2
   c. 3
   d. 4
   e. 5
   f. 6
   g. Appreciated

93. Was the time spent in relationship activities...
   a. Boring
   b. 2
   c. 3
   d. 4
   e. 5
   f. 6
   g. Interesting

94. Was the time spent in relationship activities...
   a. Lonely
   b. 2
   c. 3
   d. 4
   e. 5
   f. 6
g. Sociable

95. How much did you engage in multitasking during this time?
   a. None
   b. 1
   c. 2
   d. 3
   e. 4
   f. 5
   g. All the time

Time in personal activities

96. Please think about all the time you spent in personal activities today and answer the following: (Text entry)

97. How much time was spent with your intimate partner? (excluding time spent sleeping) (Text entry)

When thinking about your time in personal activities,

<table>
<thead>
<tr>
<th></th>
<th>Did not experience this feeling at all</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>This feeling was very strong</th>
</tr>
</thead>
<tbody>
<tr>
<td>98. How happy did you feel?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>99. How tired did you feel?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>100. How stressed did you feel?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>101. How sad did you feel?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>102. How meaningful was the time?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>103. How rushed was the time?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>104. How calm was the time?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>105. How scarce did you feel your time was?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>106. How much control did you have?</td>
<td>0</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
</tbody>
</table>

107. Was the time spent in personal activities...
   a. Unappreciated
   b. 2
   c. 3
   d. 4
   e. 5
   f. 6
   g. Appreciated

108. Was the time spent in personal activities...
   a. Boring
   b. 2
   c. 3
d. 4
  e. 5
  f. 6
  g. Interesting

109. Was the time spent in personal activities...
  a. Lonely
  b. 2
  c. 3
  d. 4
  e. 5
  f. 6
  g. Sociable

110. How much did you engage in multitasking during this time?
  a. None
  b. 1
  c. 2
  d. 3
  e. 4
  f. 5
  g. All of the time

111. I was quite good at managing the many responsibilities of my daily life today.
  a. Strongly Agree
  b. 2
  c. 3
  d. 4
  e. Strongly Disagree

112. What did you need to do today that you didn't do? (Please list/describe) (Text entry)

113. Suppose early today you discovered that something had come up suddenly. You could tend to it any part of the day or night, but somehow you simply had to find one hour to take care of it before you went to bed again. In a day like the one you had today, what things would you have given up to make room for that hour? (Text entry)

Experiences in Spousal/Intimate Partner Interactions
This section pertains to the interactions you experienced today with your intimate partner.

<table>
<thead>
<tr>
<th></th>
<th>Not at all descriptive of my behavior or feelings</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
</tr>
</thead>
<tbody>
<tr>
<td>114. I was supportive of my partner.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td></td>
</tr>
<tr>
<td>115. I took out my frustrations on my partner.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td></td>
</tr>
<tr>
<td>116. I was understanding.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td></td>
</tr>
<tr>
<td>117. I wanted to be alone.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td></td>
</tr>
<tr>
<td>118. I was impatient.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>---</td>
<td>-----------------------------------------------------------------</td>
<td>---</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>119.</td>
<td>I was too tired to interact with people.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>120.</td>
<td>I expressed appreciation for something he/she did well.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>121.</td>
<td>I was a little touchy.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>122.</td>
<td>I wanted some quiet time to myself.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>123.</td>
<td>I started an argument.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>124.</td>
<td>I acted patiently when my partner was cross.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>125.</td>
<td>I was in my own world.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>126.</td>
<td>I disagreed with something my partner said.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>127.</td>
<td>I ignored my partner when he/she asked for some attention.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>128.</td>
<td>I was sarcastic to my partner.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>129.</td>
<td>I did not pay attention when my partner was talking about</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td></td>
<td>something that interests him/her; I looked away or had a</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>bored expression.</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>130.</td>
<td>I commanded my partner to do something.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>131.</td>
<td>I read the paper (or watched TV) when my partner would have</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td></td>
<td>preferred some attention.</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>132.</td>
<td>I disapproved of my partner or of something he/she did.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>133.</td>
<td>I refused to talk about a problem we share.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>

134. How satisfied are you with your partner today?
   a. Very Unsatisfied
   b. 2
   c. 3
   d. 4
   e. 5
   f. 6
   g. Very Satisfied

135. How satisfied are you with your relationship with your partner today?
   a. Very Unsatisfied
   b. 2
   c. 3
   d. 4
   e. 5
   f. 6
   g. Very Satisfied

136. How satisfied are you with your marriage/partnership today?
   a. Very Unsatisfied
   b. 2
   c. 3
137. I am satisfied with the amount of time I spent with my partner today?
   a. Strongly Disagree
   b. 2
   c. 3
   d. 4
   e. Strongly Agree

138. I experienced tension with my partner today?
   a. Strongly Disagree
   b. 2
   c. 3
   d. 4
   e. Strongly Agree

139. How stressful was the experience?
   a. Not at all stressful
   b. 1
   c. 2
   d. Completely stressful

140. How close to your partner did you feel today?
   a. Very close
   b. 2
   c. 3
   d. 4
   e. Very distant

141. Which of the following best describes how you feel relative to your intimate partner today?
   a. More important than partner
   b. 2
   c. Same importance
   d. 4
   e. Less important than partner

142. How many conversations lasting more than 5 minutes did you have with your intimate partner today? (Text entry)

When thinking about the interactions you experienced today with your intimate partner:

<table>
<thead>
<tr>
<th></th>
<th>Not at all descriptive of my behaviors or feelings</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
</tr>
</thead>
<tbody>
<tr>
<td>143. I calmed my partner down when he/she was being unreasonable.</td>
<td></td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>144. I complained about something my partner did.</td>
<td></td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>
145. I didn't want to talk about my problems with my partner. | 1 | 2 | 3 | 4
146. I criticized my partner. | 1 | 2 | 3 | 4
147. I refused to listen to my partner's feelings. | 1 | 2 | 3 | 4
148. I thanked my partner for doing something. | 1 | 2 | 3 | 4
149. I interrupted my partner. | 1 | 2 | 3 | 4
150. I couldn't get work-related matters off my mind. | 1 | 2 | 3 | 4
151. I tried to cheer my partner up. | 1 | 2 | 3 | 4
152. I got angry and wouldn't tell my partner why. | 1 | 2 | 3 | 4
153. I complained. | 1 | 2 | 3 | 4
154. I was thinking about work most of the time. | 1 | 2 | 3 | 4
155. I was tolerant when my partner made a mistake. | 1 | 2 | 3 | 4
156. I was unpleasant. | 1 | 2 | 3 | 4
157. I told my partner about problems I am having at work. | 1 | 2 | 3 | 4
158. I was uptight. | 1 | 2 | 3 | 4
159. I comforted my partner when he/she was upset. | 1 | 2 | 3 | 4
160. I was tense. | 1 | 2 | 3 | 4
161. I talked to my partner about problems he/she was having at work. | 1 | 2 | 3 | 4
162. I yelled at my partner. | 1 | 2 | 3 | 4
163. I did not respect my partner's opinion. | 1 | 2 | 3 | 4
164. I said something unkind to my partner. | 1 | 2 | 3 | 4
165. I listened sympathetically to my partner's problems. | 1 | 2 | 3 | 4

166. I was successful in balancing work and family demands today.
   a. Very Successful
   b. Very Unsuccessful

167. I am satisfied with how things went today.
   a. Very Satisfied
   b. Somewhat Satisfied
e. Very Unsatisfied

168. How often did you put your job before your family today?
   a. Very Often
   b. Often
   c. Sometimes
   d. Rarely
   e. Never

169. How often did you put your family before your job today?
   a. Very Often
   b. Often
   c. Sometimes
   d. Rarely
   e. Never

170. I missed family activities today because I had to be at work.
   a. Very Often
   b. Often
   c. Sometimes
   d. Rarely
   e. Never

171. I missed work-related activities today because of family issues.
   a. Very Often
   b. Often
   c. Sometimes
   d. Rarely
   e. Never

<table>
<thead>
<tr>
<th></th>
<th>Strongly Disagree</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>Strongly Agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>172. I had too many demands on me at work today.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>173. I had too many demands on me at home today.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>174. My job required a high level of skill today.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>175. I used a variety of different skills at work today.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>176. My family required a high level of skill today.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>177. I used a variety of skills in regards to my family today.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>178. I had a say in deciding what tasks I did at work today.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>179. I had the freedom to decide how I did my job today.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>---</td>
<td>---</td>
<td>---</td>
<td>---</td>
<td>---</td>
<td>---</td>
</tr>
<tr>
<td>180. I had a say in deciding what tasks I did for my family today.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>181. I had the freedom to decide how I did my family work today.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>182. Something that happened at work made me unhappy at home.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>183. I couldn't do some things I wanted to do at home because of work.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>184. Even though I wanted to, I couldn't get work off my mind.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>185. I had a really good day at work so I was a happier person.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>186. Doing my job gave me a more positive attitude at home today.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>187. My mood when after work made me a better person at home.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>

188. I was committed to the family business today.  
   a. Strongly Disagree  
   b. 2  
   c. 3  
   d. 4  
   e. Strongly Agree

189. I was committed to my relationship with my spouse/partner today.  
   a. Strongly Disagree  
   b. 2  
   c. 3  
   d. 4  
   e. Strongly Agree

190. I was more energetic as a result of my work with the family business today.  
   a. Strongly Disagree  
   b. 2  
   c. 3  
   d. 4  
   e. Strongly Agree

191. I was more energetic as a result of my intimate relationship today.  
   a. Strongly Disagree  
   b. 2  
   c. 3  
   d. 4  
   e. Strongly Agree
192. I am satisfied with the amount of time I worked for the family business today.
   a. Very Satisfied
   b. 2
   c. 3
   d. 4
   e. Very Unsatisfied

How much did you feel...

<table>
<thead>
<tr>
<th></th>
<th>All of the time</th>
<th>Most of the time</th>
<th>Some of the time</th>
<th>A little of the time</th>
<th>None of the time</th>
</tr>
</thead>
<tbody>
<tr>
<td>193. nervous today?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>194. full of life today?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>195. in good spirits today?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>196. calm and peaceful today?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>197. extremely happy today?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>198. that everything was an effort today?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>199. hopeless today?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>200. cheerful today?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>201. restless or fidgety today?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>202. worthless today?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>203. satisfied today?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>204. so sad that nothing could cheer you up today?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>

The next questions are about common health issues and behaviors you may have experienced today:

How much of the time today did you have:

<table>
<thead>
<tr>
<th></th>
<th>All of the time</th>
<th>Most of the time</th>
<th>Some of the time</th>
<th>A little of the time</th>
<th>None of the time</th>
</tr>
</thead>
<tbody>
<tr>
<td>205. A headache, backache, or muscle soreness?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>206. A cough, sore throat, fever, chills, or other cold and flu symptoms?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>207. Nausea, diarrhea, poor appetite, or other stomach problems?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>208. Any chest pain or dizziness?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>209. Any menstrual-related</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>
symptoms such as cramps, bloating or breast tenderness?

210. Hot flashes or flushes?  

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
</tr>
</thead>
</table>

211. How many caffeine drinks did you have today? (Text entry)
212. How many cigarettes did you smoke today? (Text entry)
213. During today, how many servings of fruit did you consume? (Text entry)
214. During today, how many servings of vegetables did you consume? (Text entry)
215. Please rate the quality of your sleep last night.
   a. Excellent
   b. 2
   c. Average
   d. 4
   e. Poor