WELL-BEING IN LATER LIFE: A LIFE COURSE PERSPECTIVE

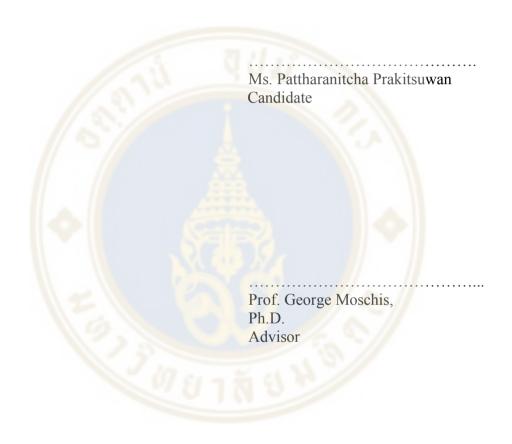


A THESIS SUBMITTED IN PARTIAL FULFILLMENT
OF THE REQUIREMENTS FOR THE DEGREE OF
DOCTOR OF PHILOSOPHY (MANAGEMENT)
COLLEGE OF MANAGEMENT
MAHIDOL UNIVERSITY
2020

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Thesis Entitled

WELL-BEING IN LATER LIFE: A LIFE COURSE PERSPECTIVE



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WELL-BEING IN LATER LIFE: A LIFE COURSE PERSPECTIVE

was submitted to the College of Management, Mahidol University for the degree of Doctor of Philosophy (Management) on June 18, 2020

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ACKNOWLEDGEMENTS

Undertaking The completion of my PhD has been completely life-changing for me. The wealth of support that I have received from many people has contributed significantly to the success of this work. First of all, I want to express my most profound gratitude to my advisor, Professor. George P. Moschis. It is thanks to him that my PhD experience has been so incredible. I thank him for his consistent academic support and for giving me many fantastic opportunities, including the chance to present my work for two consecutive years to the Consumer Life-course Studies Group (CLSG), an international network of academic researchers for. Moreover, he helped me throughout the publication in the Journal of Services Marketing (JSM), an international journal by Emerald listed in Quartile Q1 (the top 25%) of the Scopus citation database. For this, I offer him my most sincere thanks.

As well as my advisor, I want to express my gratitude to all other members of the dissertation committee, namely: Prof. Dr Roy Kouwenberg, Asst. Prof. Dr Randall Shannon, Dr Boonying Kongarchapatara, and Dr Peter De Maeyer. All of these members have provided me with important feedback and invaluable advice. Additionally, I want to thank all participants who took part in the study. I very much appreciate their assistance and time, as well as their provision of honest information, and thoughtful advice. I extend a special thanks to my PhD colleagues, as well as my family and friends, for providing me with consistent moral and emotional support.

Finally, I owe a heartfelt thank you to my parents who have given me unconditional love, support and encouragement. I would not have been able to complete my PhD, or many other life journeys, without them. I am very proud to have them as my parents and my dissertation is thus dedicated to them.

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WELL-BEING IN LATER LIFE: A LIFE COURSE PERSPECTIVE

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ABSTRACT

This research aims to identify factors that promote successful aging intending to overcome poor well-being in later life in the context of a rapidly aging society. Because investigators advocating the successful aging perspective for understanding well-being in later life have had limited theoretical and methodological tools, this study reports the results of a study using a viable framework for studying the factors that promote successful aging and well-being. A systematic literature review is used alongside philosophical discussions and comparative analyses of important research to illustrate how researchers can use the increasingly popular Life Course Paradigm (LCP) to develop research propositions within a viable research framework. Then, an interview-administered questionnaire was used to collect the data. A final sample size of 804 Thai participants aged more than 45 years old is used for data analyses. Both partial correlation and multiple linear regression were performed to test the hypotheses and research framework. This study suggests that both subjective and objective domains of well-being in later life are the outcomes of adaptation processes over the entire lifespan resulting from early life experiences as well as early developmental factors. The contextual factors including individual traits, time and timing, human-agency related factors, and structural factors have significant effects on early life experiences, adaptation processes, and well-being domains. The study findings support the application of LCP. By applying the principles and theoretical perspectives of LCP, researchers can investigate consumer wellbeing in later life as well as a wide variety of consumer behaviors at any stage in life, such as behaviors relevant to financial savings and preventive healthcare. The LCP is offered as a viable research blueprint which can be used by researchers to develop research propositions. Implications for theory and practice in marketing, consumer education, and public policy are discussed, and a research agenda is presented in the form of conceptual directions for innovatively studying various market phenomena.

KEY WORDS: WELL-BEING / SUCCESSFUL AGING / LIFE COURSE PERSPECTIVE / LIFE SATISFACTION

210 pages

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LIST OF ABBREVIATIONS

LCP Life Course Paradigm

LS Life Satisfaction

OWB Objective Well-being

SAP Successful Aging Perspective

SWB Subjective Well-being



CHAPTER I INTRODUCTION

1.1 Importance of the topic

The World Health Organization (2018) predicts that by 2050, 434 million people worldwide will be 80 years or older. With this in mind, paired with the well-documented fact that population aging is a global phenomenon, researchers are increasingly investigating the predictors of well-being in later life (WHO, 2018).

Indeed, across the world, many of the Baby Boomers recently enjoyed their 65th birthdays, and in many countries, the transformation to an aging society is proceeding at a brisk pace. In certain countries, demographic shifts have meant that age structures are becoming even older than they are in the United States, where approximately 14% of the population is older than 65 years (Ortman, Velkoff, and Hogan, 2014). Prominent examples include Germany, Japan, and Italy, where over 20% of the population is aged 65 or older (Ortman *et al.*, 2014).

Although longevity is constantly increasing, many older people experience poor well-being, such as inadequate financial resources (Hershey, Henkens and Van Dalen, 2010; Hershey and Jacobs-Lawson, 2012; van Solinge and Henkens, 2008) and poor health (Mittal and Griskevicius, 2016). For instance, people who entering retirement have insufficient money to cover their living expenses (Benartzi and Thaler, 2013) and one out of three Americans cannot come up with \$2,000 in case of emergency (Gupta *et al.*, 2018). Moreover, late-life depression becomes one of the most common problems for elders (Diniz and Teixeira, 2019).

In addition, the literature finds that owning negative perceptions toward aging associate with poorer functioning and higher mortality, while positive self-perceptions of aging can increase longevity (Levy *et al.*, 2002). Therefore, living well into old age is an important part of maintaining physical and mental well-being in the elderly by promoting successful aging. Several studies suggest that many older adults' well-being declines in later life due to their previous life decisions such as

decisions to engage in financial planning and saving behaviors (Hershey *et al.*, 2010) and preventive healthcare habits (Yingwattanakul and Moschis, 2019). Typically, well-being is defined based on the degree to which an individual is satisfied with their health, emotional, social, and economic conditions (Moen, Dempster-McClain, and Williams, 1992; George, 2010).

1.2 Problem Statement

Despite several decades of study of well-being in later life (e.g., Chehregosha et al., 2016; George, 2010), evidence on the factors responsible for different levels of subjective well-being among the elderly is inconclusive. For example, studies of life satisfaction suggest differences in happiness among the elderly not only in different parts of the world but also within continents and even countries (e.g., George, 2010; Kimm et al., 2012; Li et al., 2015; Lu et al., 2020). Therefore, previous studies have not been adequate in defining well-being in later life. According to a range of scholars, further examination is needed of the variables that inform consumer well-being, both collectively and individually (Mick et al., 2012). It is noteworthy that despite recent methodological and theoretical advancements in the behavioral sciences, researchers examining the domains of later life, particularly those focusing on life satisfaction, well-being, and successful aging, have yet to provide insights that would help promote well-being in later life (Moschis and Pettigrew, 2011; Stowe and Cooney, 2014; Rowe and Kahn, 2015; Moschis, 2019a and 2019b). Therefore, researchers have yet to fully understand the factors that enhance well-being in later life (Rowe and Kahn, 2015) as one of life's most consequential tasks.

Achieving a high level of life satisfaction has been viewed as a desirable life goal because it reflects well-being in later life. The vast majority of life satisfaction studies have attempted to understand the factors that promote life satisfaction, however, these studies measured the present standing and overlooked the relationship between the phenomenon of population aging and its possible impact on people's ability to participate in successful aging (Rowe and Kahn, 2015). The Successful Aging Perspective (SAP) focuses on planned behaviors. It asserts that an individual's well-being in later life can be improved through deliberate planning and

forward-looking decision-making (e.g., in terms of health and finances) during previous life stages (Hershey *et al.*, 2010). This perspective extends the scope, concept, and field of consumer behavior by transferring to consumers the responsibility for their well-being. Although the successful aging concept has given rise to numerous research initiatives, the SAP is only a concept but not a conceptual framework. Therefore, there is a lack of conceptual framework for understanding well-being in later life.

According to Moschis (2019a), studies of well-being in later life necessitates that attention is held by many researchers that well-being in later life can be enhanced by changing the aging person's habits and lifestyles (Kesavayuth, Liang, and Zikos, 2018; WHO, 2018), advocates of transformative research argue for a life course approach that focuses on significant life events, especially those experienced at earlier life stages (Moen *et al.*, 1992; George, 2010; Pettigrew and Moschis, 2012). These researchers contend that to understand behavior at a given point in time, one must examine a person's earlier-in-life experiences that have helped shape behavior in general and consumer behavior in particular. Thus, the literature remains sparse about how early life experiences enhance well-being in later life.

The study of well-being in later life requires the understanding of population aging, which focuses that the change occurs over time. This indicates that growth and adaptation can take place at any point in a person's life in terms of responses to changing biological, psychosocial and environmental demands that lead to changes in a persons' patterns, both in terms of their thinking and their behavior. As a case in this point, researchers have tended to overlook the relationship between the phenomenon of population aging and its possible impact on people's ability to participate in successful aging (Rowe and Kahn, 2015). Moreover, they largely neglect the trajectories and adaptation processes, both in terms of change and continuity, that take place over an individual's life course.

Additionally, people develop patterns of thought and action though experiences in the form of interactions with several types of socialization agents over a person's life (Mathur and Moschis, 1999). Rowe and Kahn's (2015) emphasis on the importance of examining how opportunities to age successfully are informed by the interaction between individual and socialization agents throughout the life course

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represents a key development in successful aging research. Although some studies highlighted the importance of a person's socialization experiences in early life which are key factors in the development of various habits and skills, as well as on adaptation mechanisms throughout one's remaining life, leading to higher levels of well-being (Karademas *et al.*, 2008; Yingwattanakul and Moschis, 2019), the literature on the effects of socialization agents that lead to the establishment and change in behavioral patterns in early life and that lead to each domain of well-being in later life are sparse.

Moreover, the critical role of contextual variables, whether social, historical, or cultural in aging and human development motivates the sensitive engagement of the researcher with the way in which the dialectical relationship between these variables and human agency informs the outcomes of aging. Rather than attempting to explain the aging person's consumer behaviors by interpreting changes in behavior according to observed age differences, there is a need to understand well-being in later life by viewing aging as an ongoing multi-dimensional process that can affect consumer behaviors due to different times, contexts and bio-psychological changes (Rowe and Kahn, 2015).

1.3 Research Objectives

The development of theory to understand and promote successful aging requires an examination of the process of aging over a lifespan. At present, numerous possibilities exist to examine the aging process in terms of opportunities for changing human life in long-lasting and meaningful ways. Given the gaps in existing literature on older consumer well-being and needed research for addressing them, the present research has the following objectives:

- 1. To identify significant domains that promote well-being in later life
- 2. To introduce a viable conceptual framework for studying well-being in later life
- 3. To explore the role of early-life experiences in promoting well-being in later life
- 4. To identify the effects of adaptation processes in promoting well-being in later life

- 5. To examine the effects of socialization agents in promoting well-being in later life
- 6. To discover the effects of socialization agents on early-life experiences
- 7. To gain insight into the important contextual factors that promote well-being in later life

1.4 Contribution to the Literature

This study contends that consumer well-being in later life can be enhanced by understanding the factors that promote the onset and change of consumption-related habits and lifestyles in earlier life. The life course paradigm (LCP), which has been increasingly used by researchers in social and behavioral sciences as a general conceptual model for studying a wide variety of phenomena (Moschis, 2019b), is introduced here as a viable framework for studying older consumers' well-being. This study builds on the recent development in the field of gerontology suggesting that well-being in later life can be enhanced by incorporating a successful aging perspective (SAP) within LCP. The application of LCP is illustrated by interpreting previous research findings in the context of this model, illustrating and testing hypotheses regarding the effects of early-life experiences and the underlying mechanism of successful aging and subsequent well-being in later life.

By using the LCP as a multidisciplinary framework, thus extending the existing successful aging model, and in line with this, illuminating earlier life experiences affect successful aging (Stowe and Cooney, 2014), this research will address a prominent gap in the literature. At the same time, this gap in the literature will be targeted by the research because it promotes an understanding of the process of population aging, as well as the factors associated with the possible effects on the capacity of individuals to age successfully. This contribution stems from the way the study dispenses with the limiting view of chronological age, thus identifying the biomedical, social, behavioral, and genetic factors that allow individuals to retain or enhance their late-life well-being and life satisfaction (Rowe and Kahn, 2015).

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In accounting for the above-mentioned gap in the problem statement, the present study has significance for the fields of public policy, marketing, and consumer education (See Chapter 6 section implications for research and practice). Overall, the significance of this study's findings is expected to emerge from its core focal point of delaying or preventing aging's unfavorable dimensions, while promoting, optimizing, and maximizing its favorable dimensions. The researcher anticipates that whether the reader is a layman, a scholar, or a marketer, consumer educator, or policymaker, they will come across many valuable findings in this study regarding the aging process and its implications for consumption.



CHAPTER II LITERATURE REVIEW

2.1 The Successful Aging Perspective in Life Course Context

Moschis (2019b) and Pettigrew and Moschis (2012) suggest that successful aging and late-life well-being can be conceptualized as continuous and complex developmental processes within LCP. In this conceptualization, successful aging and well-being in later life depend not only on an individual's effort but also on support from society (i.e., context). In this regard, the conceptualization of successful aging as a developmental process over the course of one's life becomes a relevant and viable approach to addressing issues of well-being throughout life. Such a conceptualization takes into consideration the varied ways in which developmental patterns manifest themselves over time and their sensitivity to the multi-faceted settings and events that individuals are exposed to throughout their lives.

With the above considerations in mind, the life course paradigm (LCP) is worth applying as a general framework for addressing issues of successful aging and well-being in late stages of life. LCP enables researchers to connect an individual's previous experiences and behaviors, including buying behavior such as financial decision-making, and their nature, duration, and contexts to late-life well-being (Pettigrew and Moschis, 2012). Because each consumer's active participation in decisions that affect their quality of life is a prerequisite for well-being in later life, a notion consistent with LCP's paradigmatic principle of human agency (Elder, 1998), the employment of LCP as conceptual research framework has merits. This paradigm implies that the patterns of behavior that can be established at an earlier life stage give rise to late-life well-being.

Another reason for applying the LCP as a general framework for examining late-life well-being stems from implications for the adopted research methods and research philosophy. In particular, the utilization of LCP encourages researchers to investigate consumers not simply as they currently are but also as they

have been and will be. Furthermore, LCP assumes that development and change are time- and context-dependent. For example, the paradigmatic principle of linked lives suggests that an individual's process of aging and development is significantly influenced by the social environment in which one is embedded at a given point in time or stage in life.

Because LCP regards aging as an ongoing process that commences at birth and illuminates late-life outcomes, it is consistent with the active identification and formulation of approaches for intervention and prevention (Berkman, Ertel, and Glymour, 2011). Alongside this, a life course perspective on aging, which emphasizes that the change occurs over time, indicates that growth and adaptation can take place at any point in a person's life. Furthermore, as emphasized by Dannefer (2012), LCP underlines the critical role of contextual variables, whether social, historical, or cultural in aging and human development. This viewpoint motivates the sensitive engagement of the researcher with the way in which the dialectical relationship between these variables and human agency informs the outcomes of aging. Accordingly, Stowe and Cooney (2014) highlight the fact that the utilization of LCP ensures that researchers do not overlook the heterogeneous nature of the aging process.

Thus, rather than attempting to explain the aging person's consumer behaviors by interpreting changes in behavior according to observed age differences, this study follows the recent trend in aging research of viewing aging as an ongoing multi-dimensional process that can affect consumer behaviors; that is, aging is studied as an event that occurs due to context and bio-psychological changes that can be cast and studied within the broader LCP (Moschis, 2019a and 2019b).

2.2 The Life Course Paradigm

Everyone needs to adapt to changing conditions over time. The way in which an individual respond and adjusts to life changes can be seen through a set of perspectives within the life course paradigm. Pfeiffer (1977, p. 650) says that these perspectives refer to the adaptations required by an individual to meet their biological, psychological and social needs in an environment that is constantly changing.

The life course paradigm assumes the following:

- Changes in external situations lead to...
- Typical life events, which then create...
- Physical, emotional and social demands which trigger...
- Changes in thoughts and actions.

This flow has been found in studies such as Giele and Elder (1998) and Pulkkinen and Caspi (2002). Any given behavior, then, can be seen as a response to changes either in past, current or future, anticipated life conditions, and such responses show up as choices or adjustments in terms of behavior or attitude.

The adaptations that are the focus of this research are responses to changing biological, psychosocial and environmental demands that lead to changes in a persons' patterns, both in terms of their thinking and their behavior. These demands arise within specific contexts and time periods.

2.3 A General Conceptual Life Course Model

This research adopts the life course paradigm framework that is frequently used in previous studies to organize and present the findings. This framework consists of two broad categories, or elements, each containing three variables, that collectively provide the foundation for the development of the conceptual model shown in Figure 2.1

The first set of three elements are;

- 1. Events or changes, either anticipated ones such as retirement, or unexpected events such as becoming seriously ill, at a specific time in their lives (T₁) (e.g. Hughes, George, and Blazer, 1988).
- 2. Adaption processes triggered by such events or changes. These processes can take several forms;
 - 1) Socialization, such as family communications (Mortimer and Simmons, 1978; John, 1999)
 - 2) Stress processes, which includes acute and chronic stress (Thoits, 1995), primary and secondary coping responses (Heckhausen and Schulz, 1995)

- 3) Changes in human capital (knowledge and mastery) can either increase or decrease (Bolger *et al.*, 1988).
- 3. Outcomes, which can be events, changes, or mental or behavioral patterns that occur at later points in time (T₂).

Events (T₁) and outcomes (T₂) can either be singular in nature, manifesting as a choice or a shift in thoughts or behaviors, either suddenly or gradually over time (Elder, 1998; Mayer and Tuma, 1990; Moschis, 2007a), or they can take the form of patterns of either thoughts or behaviors (Elder, 1998; George, 1989). In any event, studies have found that such events are often interdependent or, as named by Moschis (2007a) among others, "transactional", in that a shift in the likelihood of an event at T₂ is dependent on an earlier event occurring at T₁ (Mayer and Tuma, 1990).

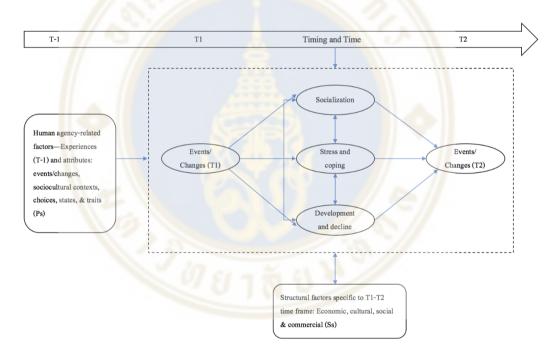


Figure 2.1 A conceptual life course model from Moschis, 2019b

The second set of three elements, designed to define the circumstances within which people find themselves (e.g., Bolger *et al.*, 1988; Elder, 1998; Elder, Johnson, and Crosnoe, 2003; George, 1989) are;

1. The age of the person when events occur, and the duration of the events (Ts).

- 2. The extent of their own agency in the events, with regard to events happening earlier in life (T₋₁) and a range of attributes including the events themselves, the changes the events initiate, the social and cultural contexts, the choices made, and the associated states and traits (Ps).
- 3. Structural factors related to the T_1 – T_2 time frame that can be defined at varying levels of aggregation and stability (Ss).

These contextual factors – shown outside the shaded area in Figure 2.1 – tend to affect the variables and relationships shown inside the shaded area such as events at T_1 (both experienced and expected), changes and adaptations resulting from these events, and the T_2 outcomes across the T_1 – T_2 time frame. Furthermore, some of the structural factors (Ss) can be affected by the events, and / or by the responses triggered by the events, which can then create reciprocal effects (e.g., Featherman and Lerner, 1985; Hetherington and Baltes, 1988).

For clarity, the T₁–T₂ time frame refers to the time between two events or changes occurring. It can be measured in whatever manner best serves the end result. For example, in some instances, it may be best to express this time frame in terms of time elapsed (days, weeks, months and so on); in others, it may make sense to use an age range, or range of several years or decades, or a particular stage of life such as adolescence, the 'full nest' period, post-retirement and so on.

The outcomes at T_2 , which can be changes in thought patterns or behavioral patterns, emerge from events or changes experienced in earlier life, the adaptation process adopted as a result of these events or changes, and any contextual factors within the T_1 – T_2 time frame. Clearly, the impact of all these changes depending on when, in the course of a life, the person experiences an event, because contexts change over time, as do the set of previously experienced events from which they can draw.

2.4 The Concept of Well-being and Life Satisfaction

Previous studies have conceptualized an older person's sense of well-being in terms of "life satisfaction," "happiness" and general "well-being" (e.g., George, 2010). And these conceptualizations comply with Rojas' criteria of parsimony,

meaning, and usefulness (Rojas, 2004). "Well-being is experiential, what people value being and doing" (Millennium Ecosystem Assessment, 2005, p.73). It can be considered as an important indicator of how people are doing in life by integrating mind and body as a holistic concept. It is generally seen through the lens of subjective well-being that indicates how a condition is perceived by each person, and through that of objective well-being that indicates an observable measurement of conditions according to several domains of well-being (Schueller and Seligman, 2010). These researchers also reported that, in order to achieve successful aging, it is necessary to have high levels of both objective and subjective well-being as these provide an individual with a positive standpoint from which higher levels of physical and mental health can be maintained. Furthermore, several researchers suggest that a well-being measure is useful only to the extent it possesses both subjective and objective elements (Schueller and Seligman, 2010), which are viewed as outcomes with particular aspects of their life, especially family, friends, work and social life (Cummins, 2005).

Similarly, Diener and Lucas (1999) described the concept of life satisfaction (LS) as the cerebral part of a wider paradigm termed well-being. LS can be considered as the individual's personal assessment of their own life value and, as such, plays a key role in aging as a major indicator of well-being (Diener, Diener, and Diener, 1995; Kong and You, 2013). It is reported that, in order to achieve successful aging, it is necessary to have a high level of LS as this provides the individual with a positive standpoint, from which higher levels of physical and mental health can be maintained. Therefore, LS can be used to measure the overall well-being concept.

2.5 Relevant Theories

Diener (1984), Headey, Veenhonen, and Weari (2005) and Lance *et al.* (1989) describe two different theoretical concepts of LS, these being the 'top-down' and the 'bottom-up' concepts, both of which have alternative causal assumptions. As the name suggests, the 'bottom-up' concept, presumes an individual's LS is based on their level of satisfaction with particular aspects of their life, particularly family, friends, work and social life (Heller, Watson, and Ilies, 2004; Pavot and Diener, 2008; Veenhoven, 1996). There are a number of theories and models that are based around

the 'bottom-up' theory that suggests that satisfaction within these life aspects can be described as a need with the more needs satisfied, the higher the level of LS. These models included Maslow's (1970) need hierarchy theory, Michalos' (1985) multiple discrepancy theory and Sheldon and Elliot's (1999) self-concordance model. These authors suggest that when life aspects are satisfied, any negative situational factors are easily mediated.

In contrast, the 'top-down' theory focuses on the individual's character and disposition, suggesting that an individual's personality dictates their LS (DeNeve and Cooper, 1998; Diener, Oishi, and Lucas, 2003; Steel, Schmidt, and Shultz, 2008). Whilst situational life factors are acknowledged as an influence, proponents of the 'top-down' theory believe that it is the interaction of these situational life factors with the individual's disposition that dictate LS (Brief *et al.*, 1993; Diener, 1996; Heller *et al.*, 2004).

According to Erdogan *et al.*, (2012), the concepts of 'bottom-up' and 'top-down' have frequently been considered as competing theories. Nevertheless, there is a similarity between the two theories when the importance of dispositional factors is weighted more heavily than that of life aspects, such as family, friends, etc. (Erdogan *et al.*, 2012). This author claims that an individual's character plays a major role in influencing their own perceptions of situational life factors which leads them to place a higher or lower level of LS on their own life aspects. Brief *et al.* (1993) furthers this by suggesting that global LS is influenced by personality. However, Heller *et al.* (2004) completed a meta-analysis that showed that high levels of personal and work satisfaction, arbitrate the effect of the character of LS. To counter this, Erdogan *et al.* (2012) suggested that models should incorporate character and personality as a main predictor of LS rather than 'partialling' it out as a control variable. As such, individual character attributes are included in this study.

Researchers of well-being have enlarged the number of life aspects, from the 'bottom-up' approach, that potentially influence LS, to include areas such as housing, leisure time, sex life, education, social relationships, income, self-worth, health, safety and family (e.g. Argyle, 2001; Costa, 2008; Flanagan, 1978; Greenley, Greenberg, and Brown, 1997; Headey and Wearing, 1992; Praag *et al.*, 2003). Despite most people generalizing these life aspects, there is evidence that they are weighted

differently at different times of life (Cantor and Blanton, 1996; Cantor and Sanderson, 1999) and by individuals from different cultures (Diener, 2000; Diener and Lucas, 2000; Diener and Suh, 2000).

2.6 Well-being Across Different Cultures and Life Stages

According to Hofstede (1991) and Kim (1994), individuals from different cultures place more weight on particular life aspects as they shape that individual within their culture, for example, their values, goals, and attitude. Cantor and Sanderson (1999), Kasser and Ryan (1993) and Oishi *et al.* (1999) support this by suggesting that the values, goals, and attitudes of the individual influences the weight they place on each life aspect.

For example, Markus and Kitayama (1991) explain that East Asian cultures are more self-critical, and a higher value is placed on self-improvement and modesty. As such, previous personal successes are not considered to be of as high a value as they are in Western cultures (Heine *et al.*, 1999; Markus and Kitayama, 1991).

This is because the theory of LS is specifically grounded on external conditions and present standing rather than on previous events. Triandis (1989) suggested that these cross-cultural differences could be measured on the degree of individualism-collectivism of society, whilst Markus and Kitayama (1991) describe the same as a measurement of independence-interdependence. In Western cultures, the level of individualism is high, and, as such, individuals place a higher value on personal achievements, thereby judging well-being on their own successes and failures. Conversely, individuals from collectivist cultures consider the whole society as being primarily important and will, therefore, sacrifice their own desires for that of the wider community. Interestingly, Diener and Diener (1995) reported higher levels of SWB and LS in individualistic nations when compared to collectivistic nations.

Cantor and Blanton (1996) and Cantor and Sanderson (1999) explain that individuals place a different weight on life aspects at different times of their life, whilst Harlow and Cantor (1996) explains that prominent life tasks have a stronger influence on LS than those that are less visible. As an example, Oishi *et al.* (1999)

explain that one particular life task in young adulthood that is of high value is to build a sustainable, intimate relationship. This is, therefore, a prominent life task that directly influences LS in young adults.

In order to gain a better understanding of well-being, previous research has largely focused on homogenous populations that place similar weights on culture, values and prominent life tasks, to counteract the cross-cultural differences (Bretones and Gonzalez, 2011; Brown and Tierney, 2009; Ku *et al.*, 2008).



CHAPTER III

PROPOSED CONCEPTUAL MODEL AND MODEL ELEMENTS

3.1 Proposed Conceptual Model

Variables in previous models of successful aging and life satisfaction that have life course themes can be cast within the life course model (Moschis, 2019a and 2019b). For instance, with respect to Rowe and Kahn's (2015) suggested model, early life experiences during adulthood can be examined as human agency-related factors in terms of choices; and age may be viewed as a measure of timing and time (duration). Although theory and previous research suggest a wide range of measurement methods for well-being in later life, of interest of this study is the outcome of present life satisfaction as a measure of a person's well-being domains.

Thus, from the vantage point of a life course theorist, aging can be regarded as a lifelong event, and the outcomes of aging are likely to be affected by developmental influences. Evidently, these issues are essential to consider when examining late-life outcomes, the efficacy of programs seeking to address unfavorable outcomes, and an individual's development trajectories.

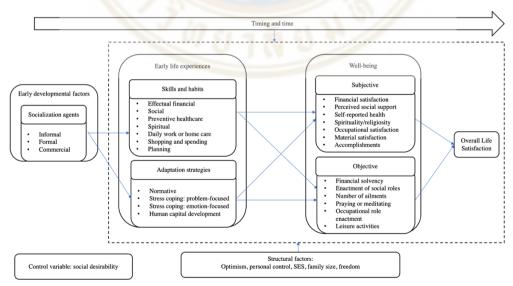


Figure 3.1 Proposed life course model of older consumer well-being (adapted from Moschis, 2019b)

Figure 3.1 provides an overview of the proposed conceptual model that will be used in this research. Importantly, the conceptual model is based on the core assumptions of the life course paradigm (LCP), particularly those relating to the connections that exist between the antecedent and outcome variables found in life course research. In addition to this, it is worth emphasizing that the proposed conceptual model indicates the way in which researchers can use the LCP to examine changes in development in well-being and life satisfaction throughout a lifespan. Finally, the theoretical rationale and empirical support for the relationships of this model are discussed in detail elsewhere (Moschis 2019a and 2019b).

3.2 Model Elements

According to the general life course conceptual model (Moschis, 2019b), the proposed conceptual model's elements can be classified into four categories: (a) outcomes in the form of well-being in later life; (b) early life experiences, which take the form of skills and habits as well as adaptation strategies developed and employed during adulthood; (c) early developmental factors that initially shaped the person's mindset; and (d) the contexts in which the person's experiences developed and are manifested in outcomes (well-being), both with respect to time and structure or place (Figure 3.1). Variables in previous models of successful aging and well-being have life course themes and can be cast within the life course model.

3.2.1 Early life experiences

Early life experiences during most of adult life are referred to as "antecedents" in the proposed conceptual model. Since the life course paradigm (LCP) considers that all behavioral or attitudinal changes represent life events (Mayer and Tuma, 1990), life satisfaction is directly and indirectly informed by early life experiences. Due to the retrospective nature of this study, early life experiences include both early-in-life skills and habits, and adaptation mechanisms (also viewed as habits of responding to life's challenges), while life events in LCP are excluded. Importantly, the way in which these adaptation habits manifest over time directly affect an individual's level of life satisfaction in later life. As such, life events and

transitions in terms of an individual's social role are determinative of their overall behavioral trajectories (Pulkkinen and Caspi, 2002). The adaptation mechanisms identified by Sherrod and Brim (1986) are normative, stress, and human capital. Noteworthy, an individual's adaptation incorporates normative, human capital, and stress and coping, where these processes are themselves initiated by early developmental factors.

3.2.2 Life satisfaction and domains of well-being

This category incorporates the implications of early life habits and adaptation processes by means of both domains of well-being and overall life satisfaction (labeled "outcomes" in the form of the lifespan process of aging (regarded as events in Figure 2.1's T2).

3.2.2.1 Well-being

Well-being is generally seen through the lens of life satisfaction or through that of happiness (Ferrer-i-Carbonell, 2002; Veenhoven, 1997) although, of the two lenses, life satisfaction is deemed closest to the philosophical idea of well-being as it is grounded in the judgment of the individual with regard to their own life (Tatarkiewicz, 1976). Furthermore, life satisfaction tends to be a more stable and intellectual measure, as opposed to the more emotional, subjective and volatile concept of happiness (Meadow et al., 1992; Michalos, 1980; Sirgy et al., 1995). Based on this judgment of life satisfaction against happiness, this study employs life satisfaction (as gleaned through direct questioning of elderly subjects) as a proxy measure for well-being.

3.2.2.2 Domains of well-being

When thinking of well-being, it is important to recognize that well-being in "life" is not a simple, one-dimensional concept, but is made up of numerous aspects, components, or domains. A life can, therefore, be seen as a matrix of many such domains, and well-being in later life may vary across those domains (Cummins, 2003; Headey and Wearing, 1992; Heady, Holmström, and Wearing, 1984, 1985; Saris and Ferligoj, 1996; Rampichini and D'Andrea, 1998; Van Praag et al., 2004). According to Van Praag et al. 2003, page 3), overall life satisfaction as expressed by an individual is really an aggregate of satisfaction across all the domains,

and closer questioning and study will reveal the differing levels of satisfaction in each of the domains of life.

By employing a domain-of-life approach, this study aims to identify the domain (or domains) that have the largest impact on overall life satisfaction. This approach must also recognize the law of diminishing returns when it comes to life domains (Rojas, 2004), requiring a focus not only on prioritizing domains in terms of their effect on overall life satisfaction but also on those domains that are also scoring very low in terms of satisfaction. This is where the greatest improvements in well-being can be made. This leads to a broad view on promoting well-being in older people, and encourages individual attention on individual domains, rather than concentrating on increasing satisfaction within just one domain in a 'one size fits all' approach.

One example of an important life domain – health – is highlighted in Rojas (2004), who found that a persons' satisfaction with their health is a good indication of their overall life satisfaction. Since good health satisfaction leads to good overall life satisfaction, then it follows that the promotion of healthy behaviors leads to a rise in overall life satisfaction (Kim *et al.*, 2014; Li *et al.*, 2009; Strine *et al.*, 2008). There's a positive feedback loop at work here, too, in that someone who is generally satisfied with life tends to take good care of their health, through a combination of lifestyle choices and preventative measures, leading to better health and fewer engagements with healthcare professionals (Kim *et al.*, 2014).

3.2.3 Early developmental factors

Apart from early life experiences, this study aims to further explore how do people develop or refrain from developing effectual habits about life such as effectual financial habits. For instance, there is substantial research in the field of personal finance showing the role of socialization agents as early developmental factors.

3.2.4 Other contextual factors

The proposed conceptual model acknowledges the contextual variables that individuals are affected by at certain points in time (Bolger et al., 1988). These variables range from the length of time an event lasts to the contextual and structural factors specified at certain aggregation levels. As the dotted square in Figure 2.1 indicates, contextual factors have a moderating effect on an individual's adaptation processes.

3.3 Hypotheses

The purpose of this section is to show how researchers can develop propositions from the conceptual life course model (Figure 3.1) to study well-being in later life. The hypotheses pertaining to older consumer well-being presented stem from two main sources: (a) general propositions presented by Moschis (2019b), who reviewed the literature in support of his general conceptual life course model and (b) research that suggests relationships between consumer satisfaction (as an indication of well-being) and other relevant variables of the conceptual model (Figure 3.1).

As shown in Figure 3.1, there are five sets of hypotheses relationships: (a) the direct effect of subjective and objective well-being on overall life satisfaction, (b) the effects of early life experiences in skills and habits and adaptation strategies on subjective and objective well-being, (c) the direct effect of early developmental factors on the older person's subjective and objective well-being, (d) the indirect effect of early developmental factors on early life experiences in skills and habits and adaptation strategies, and (e) the potential moderating effect of contextual variables.

3.3.1 Effects of dependent variables

The hypothesis of this study is based on the work of Moschis (2019b) who reviewed the literature on successful aging from the perspective of the general life course model. Using a 'bottom-up' perspective mentioned in the literature review section, this model has the two variables of overall life satisfaction, and satisfaction within the various domains of life, known as 'outcomes'. Overall life satisfaction tends to be a single measure, whereas domains of life can be almost infinite in number, depending on the number of differentiated components in one's life

This study, therefore, defines the most seven significant life domains that have already found to be important in later life satisfaction, each of which complies with Rojas' three criteria of parsimony, meaning, and usefulness (Rojas, 2007). Each domain is explained below and can be operationally defined as both subjective states (e.g., perceptions) and objective attributes as shown in Figure 3.1.

Specifically, the proposed model identifies the most seven significant life domains in later life: 1) financial, 2) social, 3) health, 4) spiritual/religiosity, 5) occupational, 6) spending money and leisure activities, and 7) accomplishments.

3.3.1.1 Financial

Financial satisfaction is an individual's subjective perception of the adequacy of his or her financial resources (Hira and Mugenda, 1998), while financial solvency is an objective measure that taps factors such as one's ability to pay debts and finance a desirable retirement lifestyle. The financial domain is an important determinant of well-being or satisfaction with life in general (Campbell, Converse, and Rodgers, 1976; Gudmanson and Dane, 2011; Netemeyer et al., 2018). Several studies support the positive link between financial satisfaction and well-being. However, this impact varies across cultures, for example, having a weaker impact on people in wealthier than in poorer countries (Diener and Diener, 1995; Oishi et al., 1999; Veenhoven, 1991). That is, people in wealthy countries base their overall life satisfaction less on financial domains than do people in poor countries.

Hypothesis 1.1 Life satisfaction is positively associated with (a) financial solvency and (b) level of financial satisfaction.

3.3.1.2 Social

Perceived *social support* refers to close friends and family who provide emotional and physical support on an on-going or required basis. It delivers an indirect impact by creating a protective shield against stress (Taylor and Aspinwall, 1996) during difficult times, and a direct impact by providing practical help, emotional support and a sense of belonging, all of which improve one's quality of life and well-

being (Song *et al.*, 201; Dalgard and Tambs, 1997). The mechanisms by which social support reduces stress and improves health are identified and examined by, among others, Greenblatt, Becerra, and Serafetinides (1982); Taylor and Aspinwall (1996). Berkman (1985) and Lin (1986) provide empirical evidence that social support improves health, happiness, and longevity, and it's clear that the support of family and friends plays a crucial role in overall life satisfaction (Bowling *et al.*, 2002; Gallagher and Vella-Brodrick, 2008; Moschis and Mathur, 2007; Piferi and Lawler, 2006; Pinquart and Sorensen, 2000; Hwang *et al.*, 2010; Vecchio *et al.*, 2007).

Beyond the need for social activity with loosely-knit groups of people, Tobinn and Neugarten (1961) found a positive link between *the enactment of social roles* and overall well-being, which was later verified by Graney (1975) who identified a positive relationship between high levels of social connection and participation and the overall well-being and happiness of older adults. More recent studies have also identified the importance of enactment of social roles and social activities, including those by Cummins (2005), Pinquart and Sörensen (2000), Ryff, (1982), and Ng *et al.*, (2009).

Hypothesis 1.2 Life satisfaction is positively associated with (a) perceived social support and (b) enactment of social roles.

3.3.1.3 Health

When *self-reported health* is employed as a measure of health (Cummins, 2005), perceived health significantly influences one's overall well-being (Brown *et al.*, 2004; Cummins, 2005; McCamish-Svensson *et al.*, 1999; Steverink *et al.*, 2001). Rojas (2004) highlighted in his research that people's satisfaction with their health is a good indication of their overall well-being. Furthermore, healthy lifestyle choices that deter the onset of disease lead to an *absence of ailments* that promotes high levels of health satisfaction, longer life, and overall well-being (Boehm *et al.*, 2011; Diener and Chan, 2011; Li *et al.*, 2009; Strine *et al.*, 2008; Xu and Roberts, 2010).

Hypothesis 1.3 Life satisfaction is (a) positively associated with self-reported health and (b) negatively associated with the number of ailments.

3.3.1.4 Religion, Spirituality, and Altruism

According to the definitions given by the Fetzer Institute in 1999, *religious practice* is a set of doctrines, and a form of worship, that is shared and practiced by a group. These shared practices tend to produce recognizable traits in terms of behavioral and social norms, as well as various doctrinal and denominational characteristics. *Spirituality*, on the other hand, assumes that there is more to life than what we see on the surface, and practitioners tend to be concerned about the transcendent, and about the ultimate meaning of life. Spirituality can be practiced in groups or alone, whereas religion tends to be practiced primarily as part of a group. Religion looks to encourage a deepening practice through worship and study, though it is perfectly possible for a person to take on the outward appearance of being religiously committed while, in the background, not experience much of a relationship with the transcendent.

Empirically, reviews of over 200 studies have revealed the positive effects *religious or spiritual beliefs and practices* have on the people's emotional, physical and psychological states (Kirby, Coleman, and Daley, 2004; Matthews, Larson, and Barry, 1993; Matthews and Larson 1995). Other studies show positive impacts on health and resilience (Brady *et al.*, 1999; for review, Koenig, MuCullough, and Larson, 2001); on life satisfaction (Crowther *et al.*, 2002; Ellison *et al.*, 2001; Warr, Butcher, and Robertson, 2004); on happiness (Ferriss, 2002; Greeley and Hout, 2006; Hadaway, 1978; Inglehart, 2010); and on resilience in the face of challenges and loss (Ellison, 1991).

Altruism is the selfless concern for other people, and the actions leading from such concerns. According to Yalom and Leszcz (1995) engaging in altruism tends to enhance a persons' sense of empathy and connection to others, as well as allowing them to grow, psychologically, as a person. Several studies identify a similar positive relationship in older people, including Bonhote, Tomano-Egan and Cornwell, (1999); Brown, Consedine and Magai, (2005); Chappell *et al.*, (2004); Cummins, (2005); Dunlin and Hill, (2003); Harris and Thoresen, (2005); Kahana *et*

al., (2013); Morrow-Howell et al., (2003); Poortinga, (2006); Van Willigen, (2000); and Warburton and McLaughlin, (2005).

Gerontological literature on activity and role theory reports that altruistic behavior signals a successful transition into the aging process of later years in that it often involves activity, and an element of role replacement (Havighurst and Albrecht 1953). Volunteering is a common form of altruism, and several studies have found a positive relationship between volunteering and good health, including Brown *et al.*, (2005); Erikson, Erikson and Kivnick, (1986); Gorski, (2000); Thoits and Hewitt, (2003); Va¨a¨na¨nen *et al.*, (2005); and Warburton and McLaughlin, (2005). In a broader context, the whole concept of giving freely (as opposed to receiving) was found to reduce morbidity in a group of older adults in a community in the USA, even after control was introduced for the capacity to give for each participant (Brown, Consedine and Magai, 2005). Furthermore, Schwartz and Sender (1999), using measures of anxiety, depression, life satisfaction and happiness, found that the positive effect on well-being of giving help was 7.5 times greater than the effects of receiving help.

Hypothesis 1.4 Life satisfaction is positively associated with (a) spirituality/religiosity and (b) praying and altruistic activities.

3.3.1.5 Occupational

A high level of *occupational satisfaction* and *role enactment* comes from the proximity between what one expects and what one perceives to have. The further apart these are, the further work satisfaction levels fall (Lawler, 1973; Locke 1969). A review of 23 studies by Rice *et al.* (1980) reveals over 350 instances of how occupational satisfaction and role enactment impact on life satisfaction, with the reported relationships among them being overwhelmingly positive. As Bowling *et al.* (2010) and Cummins (2005) more recently concluded, the occupational domain is a key domain in terms of overall life satisfaction and well-being based on education that links to other domains of well-being.

Hypothesis 1.5 Life satisfaction is positively associated with (a) occupational satisfaction and (b) occupational role enactment.

3.3.1.6 Material Satisfaction and Leisure Activities

The *spending and ownership of material goods* has been shown to enhance self-esteem and, for some, such goods also provide meaning, invoke happiness, create a sense of immortality, and act as reminders for past experiences and other people (Belk, 1988). According to Oropesa (1995), those who enjoy shopping tend to have a greater sense of well-being, leading to the conclusion that spending, as a life domain, is positively correlated to overall life satisfaction (Cummins, 2005).

Leisure activities and pursuits satisfy otherwise unmet needs and create positive feelings of contentment and pleasure in those engaging in them, resulting in a sense of satisfaction in this life domain. Studies by Palmore (1968), Peppers (1973), Decarlo (1974), Cummins, (2005), and Lee, Lan, and Yen (2011) all found that people who participate frequently in leisure activities tend to exhibit higher life satisfaction, and Thorson (1978) found the same positive correlation specifically in a sample of post-retirement individuals. Additionally, Ragheb and Griffith (1982) also found in a sample of older persons.

Hypothesis 1.6 Life satisfaction is positively associated with satisfaction from (a) material satisfaction and (b) leisure activities.

3.3.1.7 Accomplishments

Several studies also support the importance of *accomplishment* satisfaction as a specific domain toward life satisfaction (Cummins, 2005; Daukantaitė *et al.*, 2016; Ryff, 1982). For example, people who are achievement-oriented judge their life satisfaction based mostly on their success in accomplishment domains (Oishi *et al.*, 1999). According to Mason and Faulkenberry (1977), people assess their achievement level bases on the discrepancy between their perception of the state of their world and standard or aspiration level. So, the closer the achievements are, the greater their life satisfaction level is.

Hypothesis 1.7 Life satisfaction is positively associated with the favorability of cognitions about one's accomplishments.

3.3.2 Effects of early life experiences

Lying at the heart of the perspective of the LCP that consumers can participate actively in their transformation is the implicit assumption that late-life well-being-promoting patterns of behavior should be fostered throughout the lifespan, whether through childhood socialization or adulthood transformation (Pettigrew and Moschis, 2012). The literature acknowledges the highly-consequential role played by adulthood decisions, including the decision to smoke (e.g., its acceleration of the negative effects of aging) or the decision to expose oneself to excessive noise (e.g., accelerated hearing loss) (Agrawal, Platz, and Niparko, 2008). According to Moschis and Mathur (2007), numerous elderly individuals are concerned about the suffering associated with severe physical illness and disablement, and in view of this, they are often eager to take risk-mitigating measures. Nevertheless, as emphasized by the WHO (2002), the health and late-life well-being of many elderly individuals would have benefited significantly from different decisions and patterns of behavior during childhood and adulthood. Thus, skills and habits, and adaptation strategies in early life create significant example propositions as suggested in Figure 3.1.

3.3.2.1 Effectual habits

Seven main forms of skills and habits during adulthood have been found to relate to the level of life satisfaction in late life including effectual financial habits (Joo and Grable, 2004; Robb and Woodyard, 2011), active social habits (Bondevik and Skogstad, 1998; Kim, 1999; Pinquart and Sörensen, 2000; Riddick and Keller, 1992), preventive healthcare habits (Brach et al., 2003; Ferrucci et al., 1999; Yingwattanakul and Moschis, 2019) spirituality habits (Crowther et al., 2002), effectual work habits (Baker et al., 2005; Hinterlong, Morrow-Howell, and Rozario, 2007), shopping skills and spending habits (Cummins, 2005; Oropesa, 1995), and planning skills and productive habits (Cummins, 2005; Hinterlong, Morrow-Howell, and Rozario, 2007)

Since there is a growing need for research in decisions earlier adulthood years as an influential factor to determine the effect on satisfaction with life

in later life. The general purpose of this research is to investigate the influences of early-life experiences and lifestyles on the level of well-being in late life. Within the life course conceptual model (Figure 3.1), these habits are conceptualized as early-life experiences that affect the respective domains of the person's subjective and objective well-being.

Hypothesis 2.1 Older person's level of engagement in effectual financial skills and habits in earlier adulthood years is positively related to one's present level of (a) financial satisfaction and (b) level of financial solvency.

Hypothesis 2.2 Older person's level of employment of desirable social skills and habits in earlier adulthood years is positively related to one's present level of (a) perceived social support and (b) enactment of social roles.

Hypothesis 2.3 Older person's level of engagement in preventive healthcare habits in earlier adulthood years is (a) positively related to one's present level of self-reported health and (b) negatively related to the number of ailments.

Hypothesis 2.4 Older person's strength of spiritual values and habits earlier in life is positively related to one's present level of (a) spirituality/religiosity and (b) praying and altruistic activities.

Hypothesis 2.5 Older person's level of engagement in effectual work or home-care habits earlier in life is positively related to one's present level of (a) occupational satisfaction and (b) occupational role enactment.

Hypothesis 2.6 Older person's level of engagement in shopping skills and spending money habits earlier in life is positively related to one's present level of (a) material satisfaction and (b) leisure activities.

Hypothesis 2.7 Older person's level of employment of planning skills and habits earlier in life is positively related to one's present favorability of cognitions about one's accomplishments.

3.3.2.2 Adaptation strategies

The LCP further suggests the effects of a person's early-life adaptation habits on his or her present level of life satisfaction and well-being. It assesses the effects of the three types of strategies that tap the three adaptation

processes of the LCP: normative, stress and coping, and human capital development (Moschis, 2019b).

3.2.2.2.1 *Normative*

The normative adaptation perspective focuses on the person's response to life's challenges by engaging in socially accepted behaviors and avoiding socially unacceptable ones, pointing to their consequences in later life in terms of satisfaction and well-being. The ability to socialize from a very young age, and maintained throughout adulthood, points towards more positive outcomes in later life in terms of satisfaction and well-being.

For example, the literature acknowledges the negative consequential effects of certain behaviors on a person's financial well-being, such as reckless financial behaviors (i.e., paying bills late, spending over budget; Benmoyal-Bouzaglo et al., 2019; Klontz et al., 2012; Ntanialis and Wise, 2010) and excessive possession of material objects (e.g., Chaplin et al., 2014). Similarly, the literature also acknowledges the negative consequential effects of certain behaviors on the person's health, such as the onset of smoking habits (i.e., its negative effects on health and the acceleration of aging) and the decision to expose oneself to excessive noise that contributes to early hearing loss (Agrawal et al., 2008). In a parallel vein, a metaanalysis of 36 studies reveal evidence that supports a strong effect of physical activity on psychological well-being and improved overall well-being in old age according to social-cognitive theory (Netz et al., 2005).

Specifically, socialization during adolescence is a key time to develop these skills, which then help with adaptation in old age, leading to higher levels of well-being (Karademas et al., 2008; Van Ryzin et al., 2009). Participation in the broader social life of a community brings involvement, support, and recognition while reducing anxiety, stress, and preoccupation with self (Moen, Dempster-McClain, and Williams, 1992). Thus, it is assumed that one learns how to proactively or reactively respond to life's changes and challenges by engaging in socially desirable activities, such as an engagement in financial skills and preventive healthcare habits that promote a person's well-being.

Hypothesis 3.1 The aging person's socialization level during his or her adulthood years is positively associated with his or her present level of (a) financial satisfaction and (b) financial solvency.

Hypothesis 3.2 The aging person's socialization level during his or her adulthood years is positively associated with his or her present level of (a) perceived social support and (b) enactment of social roles.

Hypothesis 3.3 The aging person's socialization level during his or her adulthood years is (a) positively related to the present level of self-reported health and (b) negatively related to the number of ailments.

Hypothesis 3.4 The aging person's socialization level during his or her adulthood years is positively associated with his or her present level of (a) spirituality/religiosity and (b) praying and altruistic activities.

Hypothesis 3.5 The aging person's socialization level during his or her adulthood years is positively associated with his or her present level of (a) occupational satisfaction and (b) occupational role enactment.

Hypothesis 3.6 The aging person's socialization level during his or her adulthood years is positively associated with his or her present level of (a) material satisfaction and (b) leisure activities.

Hypothesis 3.7 The aging person's socialization level during his or her adulthood years is positively associated with his or her present favorability of cognitions about one's accomplishments.

3.2.2.2.2 Stress and coping

In the LCP, stress can be conceptualized as the disturbance to an individual's mental steadiness and stability that arises in response to external or internal change. From this viewpoint, coping responses for the management of stress give rise to behavioral changes or changes in thought, which can be considered as attempts to restore psychological equilibrium (Thoits, 1995). Prominent stressors include significant life events, and coping responses for the management of the effects of these stressors typically involve stress-mitigating actions and thoughts. Noteworthily, according to Lazarus and Folkman (1984), coping

responses can become ingrained into an individual's behavior, persisting long after the original stressor has disappeared.

Golant (2014) drew attention to the critical part played by the environment with regard to successful aging as well as designed a conceptual model to account for the fact that elderly individuals living in different residential settings tend to develop different coping responses for the management of their unsatisfied objectives and requirements. Additionally, this researcher suggested that the degree to which an elderly individual cope effectively in such a setting is related to the nature of the coping responses they have access to, as well as their assessment of their decision-making efforts. With these considerations in mind, it is clear that environmental and individual disparities are highly-consequential. In particular, such disparities account for the existence of varied coping strategies, each of which contributes to successful adaptation differently.

People develop different coping responses and strategies for handling stress, and these strategies tend to alter through life. Young people are more likely to face challenges around career and finances and tend to adopt strategies that are interpersonal, pro-active and focused on problem-solving and seeking support from others (Folkman et al., 1987). Blanchard-Fields and Irion (1988) found that in both young and middle-aged adults, coping strategies differed depending on whether the situation was perceived as under control, where they adopted primarily problemsolving strategies, or out of control, which led to strategies focused more on easing the emotional strains.

Those with the ability to cope well with stress tend to enjoy higher life satisfaction, longevity, and good physical and emotional well-being (Burroughs and Rindfleish, 2002). For instance, those with the ability to cope well with stress tend to enjoy higher occupational satisfaction from worksite stress (Bond and Bunce, 2000). Those who rely on emotional strategies, such as praying, tend to be less skillful in handling stress than those who employ problem-solving coping strategies that appear to protect against the negative effects of stress (Thoits, 1995). Therefore, the literature suggests that the employment of problem-focused coping responses promotes successful adaptation and subsequent well-being, while the employment of emotion-focused strategies has negative consequences (Moschis,

2007b). For instance, those associated with the use of emotion-coping strategies such as avoiding true problems tend to develop undesirable financial behaviors (i.e. compulsive buying; Faber *et al.*, 1995; O'Guinn and Faber, 1989) that undermine financial well-being (Sabri *et al.*, 2020).

Hypothesis 4.1 Aging person's present level of financial satisfaction is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

Hypothesis 4.2 Aging person's present financial solvency (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

Hypothesis 5.1 Aging person's present level of perceived social support is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

Hypothesis 5.2 Aging person's present enactment of roles (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

Hypothesis 6.1 Aging person's present level of self-reported health is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

Hypothesis 6.2 Aging person's number of ailments is (a) negatively associated with the use of problem-focused coping strategies and (b) positively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

Hypothesis 7.1 Aging person's present level of spirituality/religiosity is (a) negatively associated with the use of problem-focused coping strategies and (b) positively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

Hypothesis 7.2 Aging person's present level of praying and altruistic activities is (a) negatively associated with the use of problem-focused coping strategies and (b) positively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

Hypothesis 8.1 Aging person's present level of occupational satisfaction is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

Hypothesis 8.2 Aging person's present level of occupational role enactment is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

Hypothesis 9.1 Aging person's present level of material satisfaction is (a) negatively associated with the use of problem-focused coping strategies and (b) positively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

Hypothesis 9.2 Aging person's present level of leisure activities is (a) negatively associated with the use of problem-focused coping strategies and (b) positively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

Hypothesis 10 Aging person's present favorability of cognitions about one's accomplishments is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years.

3.2.2.2.3 <u>Human capital development</u>

Learning theories base on an assumption of human capital development (Bandura, 1997; Gudmunson and Danes, 2011; and Hershey *et al.*, 2010), which is further supported by the impact of socialization in later life (Mathur and Moschis, 1999). According to Brim (1966) social learning includes straightforward knowledge and skills, plus dispositions such as habits, motives, beliefs, and attitudes. These learnings may mostly occur at a relatively young age, and the processes by which this learning takes place merits further study (Mathur and Moschis, 1999).

According to Elder *et al.* (1996) and Frytak *et al.* (2003), human capital is the term given to the acquired knowledge, capabilities, and resources that individuals have, with which they can adapt to changing life conditions both behaviourally and psychologically. The development of human capital can occur throughout life and can affect one's behavior and well-being. A meta-analysis of 188 papers and articles about financial knowledge (literacy), skills, attitudes, and behaviors (financial capability) suggests that financial education can impact financial behaviors, including savings and record-keeping (Miller *et al.*, 2014). Thus, an increase in financial skills and knowledge leads to positive change in financial habits (Von Gaudecker, 2015), resulting in higher financial satisfaction and financial skills and lead to higher incomes in later life (Peng *et al.*, 2007)

Additionally, health and well-being tend to be better in subjects who have good social skills and higher levels of support from friends and family (for reviews, see Beehr and McGrath, 1992; Cohen and Wills, 1985; Vaux, 1988). Several studies, including Beehr and McGrath, (1992); Caplan *et al.*, (1975); Kaufmann and Beehr, (1986); and McIntosh, (1991) identify the nature of this support as being either emotional in nature, providing a sympathetic, empathetic ear, or instrumental, more tangible help designed to solve the problem.

Hypothesis 11.1 The aging person's development in skills and knowledge during his or her adulthood years is positively associated with his or her present level of (a) financial satisfaction and (b) financial solvency.

Hypothesis 11.2 The aging person's development in skills and knowledge during his or her adulthood years is positively associated with his or her present level of (a) perceived social support and (b) enactment of social roles.

Hypothesis 11.3 The aging person's development in skills and knowledge during his or her adulthood years is (a) positively related to the present level of self-reported health and (b) negatively related to the number of ailments.

Hypothesis 11.4 The aging person's development in skills and knowledge during his or her adulthood years is positively associated with his or her present level of (a) spirituality/religiosity and (b) praying and altruistic activities.

Hypothesis 11.5 The aging person's development in skills and knowledge during his or her adulthood years is positively associated with his or her present level of (a) occupational satisfaction and (b) occupational role enactment.

Hypothesis 11.6 The aging person's development in skills and knowledge during his or her adulthood years is positively associated with his or her present level of (a) material satisfaction and (b) leisure activities.

Hypothesis 11.7 The aging person's development in skills and knowledge during his or her adulthood years is positively associated with his or her present favorability of cognitions about one's accomplishments.

3.3.3 Effects of early developmental factors

The early developmental factors include one's socialization, as suggested by the paradigmatic principle of human agency in the LCP (Elder, 1998), experienced in the form of interactions with several types of socialization agents that explain how people develop patterns of thought and action (Mathur and Moschis, 1999). Socialization agents include informal sources, such as parents, friends, coworkers, and acquaintances. They can also include, formal socialization agents such as schools, advisers, and professionals. Lastly, various commercial sources that can include mass media (newspapers, magazines, television) and the Internet can also serve as socialization agents. Specifically, a person's socialization experiences with these three types of socialization agents in early life are key factors in the development of various habits and skills, as well as on adaptation mechanisms throughout one's remaining life, leading to higher levels of well-being (Karademas et al., 2008; Yingwattanakul

and Moschis, 2019). Therefore, these socialization agents may have a direct effect as well as an indirect impact, creating two sets of hypotheses, as suggested by Figure 3.1.

With respect to the direct effects of early developmental factors on seven domains of well-being, several studies highlight the role of socialization agents in the development of health domain of well-being (e.g. Paek *et al.*, 2011), especially the effects of family (Kaplan *et al.*, 2006; Zambrana *et al.*, 2015), school (Slater *et al.*, 2006), and commercial media (Bernhardt and Cameron, 2003). Similarly, several studies have also highlighted the role of socialization agents in the development of the financial well-being (e.g., Drever *et al.*, 2015; Shim *et al.*, 2009).

Hypothesis 12.1 Older person's interactions with informal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) financial satisfaction and (b) financial solvency.

Hypothesis 12.2 Older person's interactions with formal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) financial satisfaction and (b) financial solvency.

Hypothesis 12.3 Older person's interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her present level of (a) financial satisfaction and (b) financial solvency.

Hypothesis 13.1 Older person's interactions with informal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) perceived social support and (b) enactment of social roles.

Hypothesis 13.2 Older person's interactions with formal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) perceived social support and (b) enactment of social roles.

Hypothesis 13.3 Older person's interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her present level of (a) perceived social support and (b) enactment of social roles.

Hypothesis 14.1 Older person's interactions with informal socialization agents during his or her developmental years have (a) a positive effect on his or her present level of self-reported health and (b) a negative effect on his or her number of ailments.

Hypothesis 14.2 Older person's interactions with formal socialization agents during his or her developmental years have (a) a positive effect on his or her present level of self-reported health and (b) a negative effect on his or her number of ailments.

Hypothesis 14.3 Older person's interactions with commercial socialization agents during his or her developmental years have (a) a positive effect on his or her present level of self-reported health and (b) a negative effect on his or her number of ailments.

Hypothesis 15.1 Older person's interactions with informal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) spirituality/religiosity and (b) praying and altruistic activities.

Hypothesis 15.2 Older person's interactions with formal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) spirituality/religiosity and (b) praying and altruistic activities.

Hypothesis 15.3 Older person's interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her present level of (a) spirituality/religiosity and (b) praying and altruistic activities.

Hypothesis 16.1: Older person's interactions with informal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) occupational satisfaction and (b) occupational role enactment.

Hypothesis 16.2 Older person's interactions with formal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) occupational satisfaction and (b) occupational role enactment.

Hypothesis 16.3 Older person's interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her present level of (a) occupational satisfaction and (b) occupational role enactment.

Hypothesis 17.1 Older person's interactions with informal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) material satisfaction and (b) leisure activities.

Hypothesis 17.2 Older person's interactions with formal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) material satisfaction and (b) leisure activities.

Hypothesis 17.3 Older person's interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her present level of (a) material satisfaction and (b) leisure activities.

Hypothesis 18.1 Older person's interactions with informal socialization agents during his or her developmental years have a positive effect on his or her present favorability of cognitions about one's accomplishments.

Hypothesis 18.2 Older person's interactions with formal socialization agents during his or her developmental years have a positive effect on his or her present favorability of cognitions about one's accomplishments.

Hypothesis 18.3 Older person's interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her present favorability of cognitions about one's accomplishments.

Moreover, Moschis (2019b) suggests that human-agency related factors (early developmental factors) in LCP have a positive effect on early life experiences in the form of skills and habits and adaptation strategies (Early life experiences in Figure 2.1). Specific habits and values can be acquired from different socialization agents, although the influence of socialization agents varies by type and context. For example, with respect to development of financial habits, studies report the effects of informal socialization agents, such as parents, co-workers, peers, and acquaintance (Sundarasen *et al.*, 2016), formal agents in the form of instruction at school or work (Ntalianis and Wise, 2010), and commercial agents such as Internet, TV, and magazines (Hershey *et al.*, 2007). More recently, Mathur and Kasper (2019) have found strong positive links between the frequency of a person's interaction with all three types of socialization agents in early life and his or her financial behaviors.

Hypothesis 19.1 Older person's frequency of interactions with informal socialization agents during his or her developmental years have a positive effect on his or her (a) engagement in effectual financial skills and habits, (b) employment of desirable skills and habits, (c) engagement in preventive healthcare habits, (d) strength of spiritual values and habits, (e) engagement in effectual work or homecare habits, (f) engagement in shopping skills spending habits, and (g) employment of planning skills and habits during adulthood years.

Hypothesis 19.2 Older person's frequency of interactions with formal socialization agents during his or her developmental years have a positive effect on the older person's (a) engagement in effectual financial skills and habits, (b) employment of desirable skills and habits, (c) engagement in preventive healthcare habits, (d) strength of spiritual values and habits, (e) engagement in effectual work or homecare habits, (f) engagement in shopping skills spending habits, and (g) employment of planning skills and habits during adulthood years.

Hypothesis 19.3 Older person's frequency of interactions with commercial socialization agents during his or her developmental years have a positive effect on the aging person's (a) engagement in effectual financial skills and habits, (b) employment of desirable skills and habits, (c) engagement in preventive healthcare habits, (d) strength of spiritual values and habits, (e) engagement in effectual work or homecare habits, (f) engagement in shopping skills spending habits, and (g) employment of planning skills and habits during adulthood years.

Hypothesis 20.1 Older person's frequency of interactions with informal socialization agents during his or her developmental years are (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during adulthood years.

Hypothesis 20.2 Older person's frequency of interactions with formal socialization agents during his or her developmental years are (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during adulthood years.

Hypothesis 20.3 Older person's frequency of interactions with commercial socialization agents during his or her developmental years are (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during adulthood years.

3.3.4 Effects of contextual factors

As variables outside the dotted square in Figure 2.1 indicates, contextual factors can have both direct effects on well-being as well as indirect effects by impacting early-life experiences; and they can even moderate the effects of the relationship among these factors shown inside the dotted square. Life-course theory and research provide bases for these specific contextual factors.

3.3.4.1 Effects of timing and time

Timing (age) and time (duration) are significant factors in LCP. People experience different events at different ages or stages in life, and the timing of such experiences have significant implications. For instance, Baby Boomers in the United States were raised at different times and therefore exposed to different environments and social values than their parents; as a result, Baby Boomers have more positive attitudes toward spending (Moschis and Mathur, 2007) and experienced inadequate financial preparation in later life (Lusardi and Mitchell, 2007). Another important factor is the duration of a person's experiences because duration is an important condition for any form of development (Featherman and Lerner, 1985).

Although timing and duration have been linked to people's early-life experiences and well-being (George 2010), researchers offer little theory as to the reasons for the observed relationships. In contrast, developmental theorists assert the direct, indirect, and moderating role of these factors (Moschis, 2019b). As earlier timing (younger age) also implies a longer duration, both timing and duration are expected to promote the onset and stability of skills and habits, and they are likely to moderate four types of relationships between early-life experiences and well-being (shown in Figure 2.1), leading to stronger relationships between these types of variables.

These concepts are in accordance with both the socioemotional selectivity theory (SST) proposed by Lockenhoff and Carstensen (2004) and the lifespan theory put forward by Heckhausen and Schulz (1995). These two theories address the underlying reasons for changes in decision-making behaviours throughout an individuals' life course. Based on the fundamentals of the control theory, Heckhausen and Schulz contend that when an elderly person endeavors to succeed in one domain of their life (for example, continuing to make competent choices), it can generate resources that reduce the probability of failing in other domains; hence, their self-esteem is not detrimentally impacted as they age. They assert that younger people typically have long life-expectancies, and therefore feel a stronger sense of control over their surroundings. Consequently, when faced with a high-stress scenario such as an important decision, they may find acquiring objective information to be a more beneficial coping strategy, as it enables them to focus on the problem and make a definitive plan. Conversely, Lazarus and Folkman (1984) argue that older individuals will not have the same long-term outlook on life and will be more likely to act on emotion (use emotion-focused coping strategy) regarding a situation than employing problem-focused coping approaches, and in this case, their decisions may result in their self-esteem being negatively affected. In a similar vein, SST suggests that people's behaviors and emotions are the result of their perceived time left before the end of life, with decreasing time left (i.e., shorter future time durations) resulting in the employment of emotional over rational responses to marketing offerings (e.g., Williams and Drolet, 2005). The lifespan theory describes how aging individuals' stress and coping strategies are shaped by the effects of time and timing over their lives, which impacts their behavior. In contrast, SST clarifies the elements that directly affect an aging individuals' lack of enthusiasm in terms of making the best or most sensible decisions, which can be considered in the context of the LCP's stress. For example, concerning the effects of timing and duration on the earlier skills and habits, it is hypothesized that:

Hypothesis 21.1 Aging person's level of engagement in effectual financial skills and habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits.

Hypothesis 21.2 Aging person's level of employment of desirable social skills and habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits.

Hypothesis 21.3 Aging person's level of engagement in preventive healthcare habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits.

Hypothesis 21.4 Aging person's strength of spiritual values and habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits.

Hypothesis 21.5 Aging person's level of engagement in effectual work or home-care habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits.

Hypothesis 21.6 Aging person's level of engagement in shopping skills and spending habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits.

Hypothesis 21.7 Aging person's level of employment of planning skills and habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits.

With respect to the effects of timing and duration (time) on the relationship between early-life experiences on well-being domains (subjective and objective), it is proposed that:

Hypothesis 22.1 Timing moderates the relationships between the aging person's level of engagement in financial skills and habits during adulthood years and one's present level of (a) financial satisfaction and (b) level of financial solvency, so that an earlier timing of onset of such skills and habits leads to stronger positive relationships.

Hypothesis 22.2 Timing moderates the relationships between the aging person's level of employment of desirable social skills and habits during adulthood years and one's present level of (a) perceived social support and (b) enactment of social roles, so that an earlier timing of onset of such skills and habits leads to stronger positive relationships.

Hypothesis 22.3 Timing moderates the relationships between the aging person's level of engagement in preventive healthcare habits during adulthood years and one's (a) present level of self-reported health, so that an earlier timing of onset of such skills and habits leads to stronger positive relationship; and (b) the number of ailments, so that an earlier timing of onset of such skills and habits leads to stronger negative relationship.

Hypothesis 22.4 Timing moderates the relationships between the aging strength of spiritual values and habits during adulthood years and one's present level of (a) spirituality/religiosity and (b) praying and altruistic activities, so that an earlier timing of onset of such skills and habits leads to stronger positive relationships.

Hypothesis 22.5 Timing moderates the relationships between the aging person's level of engagement in effectual work or home-care habits during adulthood years and one's present level of (a) occupational satisfaction and (b) occupational role enactment, so that an earlier timing of onset of such skills and habits leads to stronger positive relationships.

Hypothesis 22.6 Timing moderates the relationships between the aging person's level of engagement in shopping skills and spending habits during adulthood years and one's present level of (a) material satisfaction and (b) leisure activities, so that an earlier timing of onset of such skills and habits leads to stronger positive relationships.

Hypothesis 22.7 Timing moderates the relationships between the aging person's level of employment of planning skills and habits during adulthood years and one's present favorability of cognitions about one's accomplishments, so that an earlier timing of onset of such skills and habits leads to stronger positive relationships.

3.3.4.2 Effects of structural factors

The LCP also suggests many individual characteristics that can affect an aging person's well-being Some are in the form of attributes that do not change in time and context (e.g., gender, race), while others are likely to develop early in life or undergo formation and change throughout life (Moschis, 2019b). Such factors define the circumstances within which development occurs and can serve as structural variables (Figure 2.1). For example, they can be in the form of personality characteristics that can undergo formation and change during adulthood years; or they can be in the form of structural factors that locate the person in his or her social environment and remain constant or change little in time (e.g., culture, social class, family structure). Such factors can have direct, indirect, and moderating effects on older people's well-being.

3.3.4.2.1 Optimism

According to Scheier and Carver, (1985, p. 219), optimism is the consistent, natural ability to see and expect the good, rather than the bad, and to expect positive outcomes across all contexts, and regardless of age. This feeds into the idea of successful aging, and how aging is perceived by individuals (Rowe and Kahn, 2015). There is a body of evidence that suggests optimism is one of the characteristics that can lead to higher levels of life satisfaction and general well-being (Halama and Dedova, 2007; Ho, Cheung, and Cheung, 2010; Myers, 1992; Myers and Diener, 1995; Wrosch and Scheier, 2003), thus, expecting this variable to have a positive direct effect on all five domains of well-being, both subjective and objective.

Hypothesis 23 Optimism is positively associated with the aging person's present level of well-being.

3.3.4.2.2 Freedom

Siegenthaler and O'Dell (2000) define freedom as feelings people have about their ability to do what they do willingly in pursuing life's goals. An example study of 39 nations of Oishi, Diener, Lucas, and Suh (2009) supports a significant inclusion of freedom in the list of life satisfaction domains, while freedom is more strongly among people in individualist nations than people in collectivist nations.

Hypothesis 24 Freedom is positively associated with people's present level of life satisfaction.

3.3.4.2.3 Personal Control

Bandura (1982) defines personal control as beliefs people have about their own personal agency with regard to behaving well and avoiding negative events and outcomes in their lives. Such beliefs have a direct impact on outcomes in later life, particularly life satisfaction and well-being. Peterson and Stunkard, (1989) suggest that the concept of personal control goes some way to challenging the old ideas around human behavior being purely driven by biological, environmental and / or social conditions. Spilka *et al.*, (2003) go further, stating that people tend to attempt to understand their own behaviors, as well as the causes and effects that they witness as a result, in order to maintain a sense of personal control. These efforts also increase self-esteem and a sense of meaning, something that Heider (1958) refers to as the can of behavior. A sense of personal control can lead to higher levels of motivation, greater achievement, and lower stress levels (Averill, 1973; Miller, 1979; Thompson, 1981), as well as an overall sense of well-being (Peterson and Stunkard, 1989).

Those with a solid sense of personal control tend to take responsibility for their own levels of life satisfaction by engaging in behaviors that promote satisfaction, such as effectual research and problem-solving skills, seeking medical help in a timely manner, avoiding obviously risky behaviors and lifestyle choices, and asking for help and support from friends and family when they need it. Indeed, the link between personal control and life satisfaction is now supported by a number of studies, including Berg *et al.*, (2011), Bisconti and Bergeman, (1999); Kunzmann, Little and Smith, (2002); Windle and Woods, (2004).

Hypothesis 25 Personal control is positively associated with people's present level of life satisfaction.

Personal control is also expected to have indirect effects on the aging person's well-being by affecting one's skills and habits and adaptation strategies employed in response to life changes. Persons with a solid sense of personal control tend to take responsibility for their own levels of life satisfaction by engaging in behaviors that promote satisfaction, such as effectual research and problem-solving skills, seeking medical help in a timely manner, avoiding obviously risky behaviors and lifestyle choices, and asking for help and support from friends and family when they need it (Cain *et al.*, 2019). A sense of personal control can lead to higher levels of motivation to change one's environment, greater achievement, and lower stress levels (Averill, 1973). Thus, personal control can promote the onset of effectual skills and habits and the employment of adaptation strategies that enhance well-being.

Hypothesis 26.1 Personal control is positively associated with engagement in (a) effectual financial skills and habits, (b) desirable social skills and habits, (c) preventive healthcare habits, (d) spiritual values and habits, (e) effectual work or home care habits, and (f) planning skills and habits.

Hypothesis 26.2 Personal control is negatively associated with engagement in shopping skills and spending habits.

Furthermore, personal control is likely to affect the employment of adaptation strategies that one may use to handle life's changes and challenges.

Hypothesis 27 People with high personal control, compared to those with lower personal control, are more likely to use (a) problem-focused coping strategies, and less likely to use (b) emotion-focused coping strategies in handling major life changes during most of their adult lives challenges.

3.3.4.2.3 Other contextual factors

Because socioeconomic status (SES) is measured by using both education and income, the more educated people are more likely to change their habits in order to adapt to new life conditions than less educated (Leigh and Fries, 1993). Additionally, several studies show that SES status is positively linked to life satisfaction (Diener, Emmon, Larsen, and Griffin, 1985; Hamvai and Piko, 2010, Pinquart and Sörensen, 2000).

Furthermore, according to the paradigmatic principle of linked lives in LCP, an individual's process of aging and development is also significantly influenced by the social environment such as family size. People living in large families tend to have higher levels of social support and activity. Several scholars such as Shin and Sok (2012) have confirmed that living with family is one of the greatest factors influencing well-being in terms of life satisfaction, perceived health status, self-esteem and also depression compared with people living alone. Therefore, the last two hypotheses are included.

Hypothesis 28 Socio-economic status or SES is (a) positively associated with the use of problem-focused coping strategies, and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during most of their adult lives challenges, and (c) positively associated with people 's present of life satisfaction.

Hypothesis 29 Older people living with family are more likely to report higher levels of well-being compared to older people living alone.

CHAPTER IV RESEARCH METHODOLOGY

4.1 Research Method

This research aims to identify factors that promote successful aging with the goal of overcoming poor well-being in later life in the context of a rapidly aging society. In order to examine the hypotheses, this study applies a retrospective and prospective cross-sectional questionnaire.

It should be noted that independent variables including early life experiences and early developmental factor are retrospective measurements. The challenge with collecting retrospective data is that the study is heavily reliant on the accuracy of respondents' memories. Therefore, the principal limitation of this study is its utilization of a partial retrospective measurement approach for self-reported behaviors in both early developmental factors and early life experiences. Although the retrospective measurement approach has been employed in the literature, it represents a potential limitation because it may give rise to recall bias, thereby affecting the study's internal validity. However, Richins and Chaplin, (2015) found that this can be somewhat mitigated depending on what is actually being measured, especially where specific times, dates and frequencies of events are less important. Hence, to limit the degree to which recall bias is a concern, several measures were taken.

Firstly, a clearly-structured and standardized questionnaire was employed (Hassan, 2005). Secondly, a relevant operationalized measure (namely, early in life habits) was used, thus heightening the reliability (Scott and Alwin, 1998). According to Scott and Alwin, (1998), the reliability of retrospective surveys can be increased by ensuring that the measured variables and events are important or significant to the respondents, and the greater the frequency of past events, the more accurate the recall (Potts and Seger 2013 for a review). Thirdly, in line with the recommendations of Belli (1998), context-based cues were employed to aid the cognitive process, thereby heightening the degree to which each participant's recall was accurate. Since this

study focuses on early life experiences which, in many cases, are both frequent and salient to the respondents, so it can be reasonably expected that the levels of accuracy and reliability in the data will be sufficiently high to test the hypotheses. It must be borne in mind, though, that memory does decrease over time, even with regard to unusual or important events (Schwarz and Oyserman, 2001). This can be partially addressed by incorporating contextual cues into the questionnaire (Conway and Pleydell-Pearce, 2000; Menon and Yorkston, 2000; Dijkstra and Kaup, 2005), as well as by making the meaning of the questions clear, the contexts precise and, in some cases, breaking the context down into smaller parts to further facilitate accurate recall. Several studies, including Blair and Burton, (1987); and Sudman and Schwarz, (1989) find empirical evidence to suggest that questions succinctly are broken down into their constituent parts lead to a better understanding and more reliable results. Finally, giving respondents time to answer the questions, having given them proper thought, also increases the accuracy of recall. Unfortunately, people tend not to be sufficiently motivated to take this time, even if they have the time available. This can be partly addressed by selective use of instruction that states the next question is particularly important, and that they should take their time in answering it and to give as accurate an answer as possible (e.g., Cannell et al., 1981). This should be employed infrequently, though, in order to maintain its credibility.

In conclusion, this present study is a quantitative design using a face-to-face survey as a data collection instrument in Thailand. The survey is developed to appropriately measure the variables in the focus and the quantitative analysis is then employed to test the hypothesized relationships because data from the questionnaire can be used to identify relationships between scores on the variable(s) that the questionnaire is assumed to measure.

4.2 Questionnaire Development

The questionnaire was developed in line with existing literature, expert guidance, and theoretical input, and a pre-test with a smaller sample to test and refine the questionnaire to ensure a higher degree of reliability. An interview-administered questionnaire was developed and used as an instrument for data collection and

preparation. The respondents were presented with a comprehensive set of questions about early life experiences, present well-being domains as well as basic demographic questions. The questionnaire was submitted to the Ethics Committee of the Institutional Review Board (IRB) of the Institute of Population and Social Research at Mahidol University for approval [Appendix A]., after which it is professionally translated, and then back-translated to reduce errors [See Appendix B1 and B2].

In addition, a possible limitation in questionnaire development relates to early in life skills and habits scale, particularly in terms of the degree to which it can be considered reliable and valid. These concerns stem from the fact that no standardized psychometric test can be administered since the scale does not have an internal structure. Excluding the internal attributes, this scale's external validity is informed by the use of a specific measure, as well as the nature of the sampling strategy (Lin, 1976). With this in mind, Morrison (1968) reported that the measure's external validity is acceptable if the operational problems are addressed. For the present study, it is possible to solve the sampling concern by recruiting a diverse set of participants, since this may bolster the external validity (Tausig, 1982). Therefore, large sample size is applied in this study.

4.3 Sample and Data Collection

The majority of gerontological studies have been conducted in the West, leaving Asia largely untouched. Thailand, in particular, has been neglected in this field, and yet it is ideal as the Thai people tend to be collectivist in nature, with strong family bonds and who tend to define themselves within a framework of widely accepted norms (Hofstede, 1980; Traindis, 1989).

Sine this research aims to examine the effects of early life experiences on well-being in later life, it requires a large sample of older Thai adults (45 years old and above) The reason for using a sample of 45 years old and above is that it is the suggested age in one of the largest cohort studies in the world to help understand how people can be healthy and independent as they age called the Sax Institute's 45 and Up Study in collaboration with Cancer Council NSW; The National Heart Foundation

(NSW Division); NSW Health; beyondblue: the national depression initiative, Department of Human Services NSE, Aging; Disability and Home Care; and UnitingCare Aging (see www.45andUp.org.au for details). According to Up Study Collaborators (2008), The 45 and Up Study is a long-term collaborative resource used for investigating healthy ageing, in order to fills the knowledge gaps and researchers' needs. Besides, more than 300 papers are published under the "45 and Up Study" such as Rosenkranz *et al.*, (2013) on overall health and quality of life.

In order to meet the proposed theoretical framework and satisfy statistical requirements, a convenient sampling method, as well as a snowball technique, is used for data collection. A face-to-face survey is conducted by an interviewer asking questions of a respondent in person; therefore, it is considered the most suitable method for data collection in this study for several reasons according to Neuman (2012). Firstly, participants are more willing to give longer periods of time in face to face situations due to the length of the questionnaire. Secondly, generally has a higher response rate because most old people in Thailand have reading difficulty. Thirdly, it allows for more complex questions as interviewers are present to clarify.

Therefore, this study has conducted the survey by employing face-to-face interviews by the trained interviewers. The respondents were older Thai adults who live in Bangkok and vicinity areas. Since the mandatory retirement age in Thailand is 60 (Knodel *et al.*, 2015), those ages more than 60 are reached via members in old-age associations including Department of Older Persons, Provincial Administration Organization, Senior Citizen School Dindeang District Community Bangkok, Yannawa Elderly School, and Tambon Bueng Kham Phrom Health Care Center by firstly asking for permissions from the administrators.

In order to protect data confidential, these following methods were applied

- Use study codes on data from completed questionnaires instead of recording identifying information and keep a separate document that links the study code to subjects' identifying information locked in a separate location and restrict access to this document by only allowing primary investigators access
- 2. Encrypt identifiable data

- Remove face sheets containing identifiers including names and addresses from survey instruments containing data after receiving from study participants
- 4. Properly dispose of, destroy, or delete study data/documents
- 5. Limit access to identifiable information
- 6. Securely store data documents within locked locations
- 7. Assign security codes to computerized records.

Peers (1996) also points out that the success of a study, in terms of statistical analysis, spotting associations, and identifying interactions between variables, depends heavily on selecting the correct sample size. Hair *et al.*, (1995) suggests that the ratio of observation to an independent variable should be 5 or greater, to ensure the validity and reliability of any data analysis. Ratios under 5 can indicate overfitting, where the results are too specific to the sample and are therefore not suitable to be applied to a more general population. In fact, an observation ratio of between 5 and 10 is preferred (Halinski and Feldt, 1970; Miller and Kunce, 1973), suggesting a sample size of around 500. Considering the appropriate research design and resource constraints, data was collected over a period of two months from November 2019 to January 2020. The final sample consisted of 804 completed questionnaires.

4.4 Variables and Measurements

4.4.1 Well-being outcomes

In previous studies, life satisfaction has been operationalized in several ways, including psychological well-being measured by self-esteem scales, physical well-being measured by the person's state of health, and overall life satisfaction assessed with a wide range of single-item and multi-item scales (e.g., Burroughs and Rindfleisch, 2002; Baker, Moschis, and Ong, 2013; Ong and Mochis, 2009). In the present study, well-being outcomes include overall life satisfaction and domains of well-being in both objective and subjective categories.

4.4.1.1 Overall life satisfaction as dependent variables

Overall Life Satisfaction is operationally defined as the individual's personal assessment of their own life value (Diener, Diener, and Diener, 1995; Kong and You, 2013). The Satisfaction With Life Scale (SWLS) (Diener et al., 1985) is used because it has been found to be reliable and valid across different cultures (e.g. Larson 1978; Amato and Sobolewski 2001; Thoits and Hewitt 2001; Wong, Rindfleisch, and Burroughs 2003) and has demonstrated strong psychometric properties (Robinson, Shaver, and Wrightman 1991). Measurement is made by summing responses to the following five items indicating life satisfaction in the present time of filling questionnaire (In most ways my life is close to my ideal, The conditions of my life are excellent, I am satisfied with my life, So far I have gotten most important things I want in life, If I could live my life over, I would change almost nothing) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1- to a 4-point scale.

4.4.1.2 Domains of well-being as dependent variables

Domains of well-being are treated as constructs consisting of seven distinct domains found in the previous literature that may affect life satisfaction in late life. They are measured by asking respondents to indicate *how much satisfaction you frequently get* from both *doing* and *thinking* each. Responses are summated across affirmative answers to form indexes of each domain of life satisfaction.

4.4.1.2.1 Financial domain

Financial solvency is operationally defined as the satisfaction of one's ability to pay debts as well as future needs. Respondents will be asked to estimate the monthly amount from all investment instruments for use during retirement year including their spouse's account. Respondents categories include less than THB 15,000 (1), THB15,001-THB30,000 (2), THB30,0001-THB50,000 (3), THB50,001-THB70,000 (4), THB70,001-THB100,000 (5), THB100,001-THB200,000 (6), more than THB200,000 (7), resulting in a 1- to a 7-point scale.

Level of financial satisfaction is operationally defined as an individual's subjective perception of the adequacy of his or her own financial resources (Hira and Mugenda, 1998). Measurement is made by summing responses to the following items indicating one's present satisfaction toward financial satisfaction

from mental states (I am becoming financially secure, I will achieve the financial goals that I have set for myself, I have saved (or will be able to save) enough money to last me to the end of my life, I will be financially secure until the end of my life) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1- to a 4-point scale.

4.4.1.2.2 Social domain

Perceived social support is operationally defined as mental satisfaction from the close friends and family who provide emotional and physical support on an on-going or as-required basis. Measurement is made by summing responses to the following items indicating one's present satisfaction toward social support (relationship with your spouse/partner or close family members, loved ones' achievements or potentials, relationships with friends or significant others, knowing that your close relatives or friends understand the way you feel about things, knowing how much your close relatives or friends really care about you, knowing how much you can rely on your close relatives or friends for help if you have a serious problem) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1- to a 4-point scale.

Enactment of social roles is operationally defined as satisfaction from interacting with others. Measurement is made by summing responses to the following items indicating one's present satisfaction toward social activities (spending time with close family members, socializing with friends or "significant others) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1- to a 4-point scale.

4.4.1.2.3 *Health domain*

Self-reported health is operationally defined as mental satisfaction regarding a respondent's health status. Measurement is made by summing responses to the following items indicating one's present satisfaction toward subjective health (the state of your present health compared to 10 years ago, the state of your present health compared with others your age, experiencing less physical pain or discomfort than others your age) on a four-point scale (1=strongly disagree, 4=strongly agree) and (how would you describe your health) on a five-point scale

(1=terrible, 5=excellent). Positive responses are summated to form a 1- to a 4-point scale.

Objective health is operationally defined as satisfaction from an engaging physical body. Measurement is made by summing responses to the following items indicating one's present satisfaction toward objective health: number of health problem you have experienced or have been treated in the last 12 months (stoke; chronic orthopedic, back or spine problem; high blood pressure; ulcers; heart attack or heart problems; kidney or bladder disease; cancer; nervous or mental disorder; diabetes; asthma or respiratory disorders; arthritis or rheumatism; migraine headaches), number of prescription drugs for chronic conditions are you taking on a regular basis, and age you hope to live at very last. These three items are factor-analyzed and factor scores are saved to represent a continuous measure of objective health.

4.4.1.2.4 Spiritual, religiosity, and altruism domain

Spirituality/religiosity is operationally defined as mental satisfaction from spirituality and religiosity. Measurement is made by summing responses to the following item indicating one's present satisfaction toward spiritual satisfaction from mental states (religiosity and spirituality) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1-to a 4-point scale.

Praying and altruistic Activities are operationally defined as satisfaction in performing spiritual or religious behaviors and acting of selfless concern for the well-being of others. Measurement is made by summing responses to the following item indicating one's present satisfaction toward spiritual behaviors and altruistic activities (praying or meditating, giving time and money to non-profit organizations, helping needy people or animals) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1- to a 4-point scale.

4.4.1.2.5 Occupational

Occupational satisfaction is operationally defined as mental satisfaction from work. Measurement is made by summing responses to the following item indicating one's present satisfaction toward work satisfaction from mental states

(present or previous jobs or career choice(s)) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1- to a 4-point scale.

Occupational role enactment is operationally defined as satisfaction from working. Measurement is made by summing responses to the following item indicating one's present satisfaction toward satisfaction from working behaviors (doing your regular job or chores, at work or home) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1-to a 4-point scale.

4.4.1.2.6 Material satisfaction and leisure activities

Material satisfaction is operationally defined as mental satisfaction from spending money and material possession. Measurement is made by summing responses to the following items indicating one's present satisfaction toward shopping and possessing materials (things that show your legacy, life, or your family's history' like photos and mementos; cherish or irreplaceable things that you own; material possessions, like your car, home, clothes, and jewelry) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1-to a 4-point scale.

Leisure activities are operationally defined as satisfaction from spending time to refresh one's mind and body as a quality experience or a free time. Measurement is made by summing responses to the following items indicating one's present satisfaction toward leisure activities (using social media, like Facebook and Instagram; watching TV, or reading books, magazines or newspapers; planning or taking trips; gambling or playing games of a chance; spending time on special leisure activities or hobbies; shopping and buying things) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1- to a 4-point scale.

4.4.1.2.7 <u>Accomplishments</u>

Accomplishments are operationally defined as mental satisfaction from life accomplishments (mastering of knowledge, skills, control, or standards) and mental satisfaction to something left after an individual is gone. Measurement is made by summing responses to the following items indicating one's

present satisfaction toward accomplishments (present or future financial situation; present or previous job(s) or career; plan for the future; previous life's experiences, life's accomplishments, in comparison to the accomplishments of others at similar stages in life; life's accomplishments, in comparison to what you or others expected of you; things that show your legacy, life, or your family history, like photos and mementos; cherish or irreplaceable things that you own) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1-to a 4-point scale.

4.4.2 Early life experiences

Early life experiences include six types of skills and habits (effectual financial skills and habits, desirable social skills and habits, preventive healthcare habits, spiritual values and habits, effectual work or homecare habits, shopping and spending skills, and planning skills and habits) and four adaptation mechanism processes (normative adaptation strategy, problem-focused coping strategy, emotion-focused coping strategy, and human capital development).

4.4.2.1 Skills and habits

Six different types of habits and lifestyles are developed as a construct from previous studies. They are measured by asking respondents to indicate how much the statement describes your habits and lifestyle during *most of your adult life*. Responses are summated across affirmative answers to form indexes of each domain of life satisfaction.

4.4.2.1.1 Effectual financial skills and habits

Effectual financial skills and habits are operationally

defined as the level of good habits regarding financial matters. Measurement is made by summing responses to the following items indicating one's early in life lifestyles toward financial habits (keeping track of the money spent on a daily basis, paying the full balance of credit cards, saving only when there is money left after paying for other things[reverse], automatically setting aside money out of each paycheck, contributing to a retirement plan through an employer or other types that you set up yourself, saving money for a rainy day rather than spending it) on a four-point scale (1=strongly disagree, 4=strongly agree). Responses to the control denial statement (statement 3)

are coded in a reverse manner. Positive responses are summated to form a 1- to a 4-point scale.

4.4.2.1.2 <u>Desirable social skills and habits</u>

Desirable social skills and habits are operationally defined as the level of good habits regarding social matters. Measurement is made by summing responses to the following items indicating one's early in life lifestyles toward social habits (trying to make new friends and spend time with them, spending time with family at the expense of other activities of personal interests, trying to be a good parent or spouse (or partner), putting my family's needs ahead of mine) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1- to a 4-point scale.

4.4.2.1.3 Preventive healthcare habits

as the level of good habits regarding health matters. Measurement is made by summing responses to the following items indicating one's early in life lifestyles toward healthy habits (engaging in some type of physical fitness regularly, having annual physical exams, sacrificing good nutrition for good taste, taking vitamins and minerals daily, having flu shots annually) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1- to a 4-point scale.

4.4.2.1.4 Spiritual values and habits

Spiritual values and habits are operationally defined as the level of good habits regarding spiritual matters. Measurement is made by summing responses to the following item indicating one's early in life lifestyles toward spiritual habits (praying or attending religious services) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1-to a 4-point scale.

4.4.2.1.5 Effectual work or homecare habits

Effectual work or homecare habits are operationally defined as the level of good habits regarding work matters. Measurement is made by summing responses to the following items indicating one's early in life lifestyles toward work habits (working with passion on every task or assignment) on a four-

point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1- to a 4-point scale.

4.4.2.1.6 Shopping skills and spending habits

Shopping skills and spending habits are operationally defined as the level of good habits regarding shopping and spending matters. Measurement is made by summing responses to the following items indicating one's early in life lifestyles toward shopping skills and spending habits (trying to buy a lot of expensive things, buying things to impress people, trying to have luxury in my life) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1- to a 4-point scale.

4.4.2.1.7 Planning skills and habits

Planning skills and habits are operationally defined as the level of good habits regarding planning matters. Measurement is made by summing responses to the following items indicating one's early in life lifestyles toward work habits (making lists of things that have to be done, planning the time to do things during the day, planning ahead to deal with the worst thing that could happen, ensuring the bad things don't happen, keeping detailed records of important events or activities, sticking to scheduled plans rather than changing them constantly, setting goals and timelines for reaching them, prioritizing things to be done during the day, having the need to do something during the day, finding ways to overcome or adapt to major life adversities and challenges, taking care of things that had to be done first, before doing non-pressing or pleasurable things) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1-to a 4-point scale.

4.4.2.2 Adaptation habits

Adaptation habits consist of three categories including normative, coping and stress, and human capital. Stress and Coping can be categorized into two strategies including problem-focused and emotion-focused. Respondents will be asked to indicate the extent to which it describes the way you handled important changes and challenges <u>during most of your adult life</u> in order to overcome or adapt to new situations.

4.4.2.2.1 Normative adaptation strategies

Normative adaptation strategy is operationally defined as the level of socialization skills. Measurement is made by summing responses to the following items indicating one's early in life adaptation mechanism toward normative process (doing what others expected me to do, doing what most people would do when facing the same kinds of problems, seeking advice from others in similar situations on how to handle new situations, seeking advice from professional on how to handle the new situation or problem) on a three-point scale (1=not describe at all, 3=describe a lot). Positive responses are summated to form a 1- to a 3-point scale.

4.4.2.2.2 Problem-focused coping strategies

Problem-focused coping strategy is operationally defined as the level of one's logical and cognitive skills in solving challenges. Measurement is made by summing responses to the following items indicating one's early in life coping mechanism using problem-focused strategies (analyzing the situation or problem before taking actions, try to understand the new situation or problem or new situation before taking action, taking time to think of available options to handle the problem or new situation, doing what it takes to put an end to the problem myself, looking at things from a different point of view, trying not to act too hastily) on a three-point scale (1=not describe at all, 3=describe a lot). Positive responses are summated to form a 1- to a 3-point scale.

4.4.2.2.3 Emotion-focused coping strategies

Emotion-focused coping strategy is operationally defined as the level of one's emotional skills in solving challenges. Measurement is made by summing responses to the following items indicating one's early in life coping mechanism using emotion-focused strategies (keeping feelings to yourself, avoid thinking about the problems or new situation, seeking and accepting sympathy and understanding, avoiding being with people, daydreaming or imagining better times, keeping others from knowing, praying (or mediating) hoping things will change, waiting and hoping the problem or situation will change by their own) on a three-point scale (1=not describe at all, 3=describe a lot). Positive responses are summated to form a 1- to a 3-point scale.

4.4.2.2.4 <u>Human capital development</u>

knowledge, capabilities, and resources that individuals have, with which they can adapt to changing life conditions both behaviorally and psychologically (Elder, 1996; Frytak *et al.*, 2003). Measurement is made by summing responses to the following items indicating one's early in life adaptation mechanism toward normative process (learning as much as you could about the about the new problem or situation you were facing, trying to understand your options before deciding, relying on others who were more knowledgeable to help me solve life's problems and challenges [reverse], relying on my gut feeling or intuition rather than on facts [reverse]) on a three-point scale (1=not describe at all, 3=describe a lot). Responses to the control denial statements (statements 3-4) are coded in a reverse manner. Positive responses are summated to form a 1- to a 3-point scale.

4.4.3 Early developmental factors

They are measured by asking respondents to indicate their sources they found useful in learning about engagement in effectual habits (effectual financial habits, active social habits, preventive healthcare habits, spiritual habits, and effectual work habits). To obtain the measure of *informal socialization agents*, respondents can check as many boxes as applicable for two informal sources (a) parents and (b) friends, co-workers, and acquaintances. Responses to one or more of these six effectual habits are assigned a score of 1, otherwise 0. Thus, the measures of the influence of the six socialization agents are six dummy variables. Informal socialization agents for each type of effect habit can be measured by summating to obtain a 0- to a 2-point index, while overall informal socialization agents can be measured by summating all responses to obtain a 0- to a 12-point index.

Similarly, *formal socialization agents* measure was constructed by summing responses to the same options with respect to two formal socialization agents where they could learn about six effectual habits: (a) school and (b) advisors/professionals. Formal socialization agents for each type of effect habit can be measured by summating to obtain a 0- to a 2-point index, while overall formal

socialization agents can be measured by summating all responses to obtain a 0- to a 12-point index.

Finally, *commercial socialization agents* measure is formed by summing responses to the same three options for mass media (newspapers and magazines, TV, and Internet). Commercial socialization agents for each type of effect habit can be measured by summating to obtain a 0- to a 1-point index, while overall commercial socialization agents can be measured by summating all responses to obtain a 0- toa 6-point index.

4.4.4 Individual attributes

Personal Control is operationally defined as the beliefs an individual has about their own personal agency with regard to behaving well and avoiding negative events and outcomes in their lives (Bandura, 1982). Respondents are asked to rate their level of agreement and disagreement with eight statements on the generalized sense of personal control construct (Mirowsky and Ross, 1992). Measurement is made by summing responses to the following items (I am responsible for my own successes; I can do just about anything I really set my mind to; my misfortunes are the result of mistakes I have made; I am responsible for my failures; the really good things that happen to me are mostly luck; there is no sense planning a lot—if something good is going to happen, it will; most of my problems are due to bad breaks; I have little control over the bad things that happen to me) on a four-point scale (1=strongly disagree, 4=strongly agree). All responses are summated to form an 8- to a 32-point scale. Responses to the control denial statements (statements 5-8) are coded in a reverse manner. The summated score is used to represent a continuous measure of personal control.

Optimism is operationally defined as is the consistent, natural ability to see and expect the good, rather than the bad, and to expect positive outcomes across all contexts, and regardless of age (Scheir and Carver, 1985). Respondents are asked to check answers like 'personal control' with seven statements on a 4-point Likert scale. Measurement is made by summing responses to the following items (in certain times, I usually expect the best; if something can go wrong for me, it will[reverse]; I'm always optimistic about my future; I hardly ever expect things to go my way [reverse]; I don't

get upset too easily; I rarely count on good things happening to me [reverse]; overall, I expect more good things to happen to me than bad). Responses to the control denial statements (statements 2, 4, and 6) are coded in a reverse manner. The summated score is used to represent a continuous measure of optimism.

Freedom is operationally defined as a person's freedom in pursuing life's goals. Measurement is made by summing responses to the following items (I generally feel that I have had freedom of choice over the way my life has turned out; overall, I would say that throughout most of my adult life I have been free to choose what I wanted; at times, others have limited my ability to make the choices I wanted in some areas of life, like family, work, and handling money) on a four-point scale (1=strongly disagree, 4=strongly agree). Positive responses are summated to form a 1- to a 4-point scale.

Socioeconomic status (SES) can be measured using standardized scores using factor analysis of the people's level of education (number of years attended school or college after the age of 12) and their current level of income (shown in seven income brackets). The summated score is used to represent a continuous measure of socioeconomic status.

Family size was measured by asking respondents to list all people they presently lived with and their relationships and ages. The total count of people listed by them indicated their household size in terms of additional people living with them.

Other demographic variables were measured using standard questions. Firstly, *gender* (male = 0, female = 1). Secondly, *employment status* (retired and not employed = 1, retired and employed part-time=2, retired and employed full-time=3, employed part-time=4, employed full-time=5) were coded categorically. Lastly, **age** was measured by asking respondents to indicate their year of birth.

4.4.6 Control Variables

Social Desirability is measured using the short version of the Crowne-Marlowe social desirability scale (Strahan and Gerbasi, 1972). Since there is a tendency for participants to rate the questionnaire items, especially those of a sensitive nature, in such a way that makes them feel and look good according to cultural norms (Crowne and Marlowe, 1960), this response bias will affect the interpretation of the

relationship between the studied variables (King and Bruner, 2000). Hence, the social desirability scale will be applied as a control variable to improve the validity of the results because respondents who rate highly on this scale are more likely to not give a truthful response (Huang et al., 1998). They are categorized into five scored as "true" and five as "false." Measurement is made by summing responses to the following items (I'm always willing to admit it when I make a mistake; I always try to practice what I preach; I never resent being asked to return a favor; I have never been irked when people expressed ideas very different from my own; I have never deliberately said something that hurt something that hurt someone's feelings; I like to gossip at times [reverse]; There have been occasions when I took advantages of someone [reverse]; I sometimes try to get even rather than forgive and forget [reverse]; at times I have really insisted on having things my own way [reverse]; there have been occasions when I felt like smashing things [reverse]) on a four-point scale (1=strongly disagree, 4=strongly agree). Responses to the control denial statements (statements 6-10) are coded in a reverse manner. The summated score is used to represent a continuous measure of social desirability.

CHAPTER V DATA ANALYSES AND RESULTS

5.1 Descriptive Statistics

Pattharanitcha Prakitsuwan

The total 804 sets of completed questionnaires were made up of 51% female respondents (n=410) and 49% of male respondents (n=394). In terms of the age range, the sample was comprised of 25.6% of 45-54 years, 30.5% of 55-64 years, 20% of 65-74 years, and 23.9% of 75 years or more. The cross-tabulation of age and gender is as follow:

Table 5.1 Cross-tabulation of age and gender

| | 45-54 | 55-64 | 65-74 | 75 or more | Total |
|--------|-------|-------|-------|------------|-------|
| Male | 96 | 116 | 74 | 108 | 192 |
| Female | 110 | 129 | 87 | 84 | 410 |
| Total | 206 | 245 | 161 | 192 | 804 |
| | | | | | |

The number of years respondents attended school or college after the age of 12 or 6th-grade rage from 0 to 18 years. The mean number of years attended school or college is 7.72 years. From a total of 804 respondents, 504 of them indicate that they have a spouse or partner who attended school or college after the age of 12 or 6thgrade rage from 0 to 18 years. The mean number of years their spouse or partner attended school or college is 7.94 years.

Among the respondents in this sample, 36.2% were retired and not employed,17.7% were retired and employed part-time, 2.6% were retired and employed full-time, 10.7% were employed part-time, and 32.8% were employed fulltime.

In terms of their household income, 6.7% had less than 15,000 baht per month, 17.6% had 15,001-30,000 baht per month, 24.7% had 30,001-50,000 baht per month, 18.3% had 50,001-70,000 baht per month, 19.5% had 70,001-100,000 baht per month, 9.4% had 100,001-200,000 baht per month, and 3.9% had more than 200,000

baht per month. The cross-tabulation of employment and household income is as follow.

Table 5.2 Cross-tabulation of employment and household income

| | Retired and not employed | Retired and employed part-time | Retired and employed | Employed part-time | Employed full-time | Total |
|-------------------------------------|--------------------------------|--------------------------------|----------------------|--------------------|--------------------|-------|
| Less than THB 15,000 | 43 | 5 | 0 | 2 | 4 | 54 |
| THB 15,001- THB 30,000 | 76 | 21 | 1 | 9 | 34 | 141 |
| THB 30,001- THB 50,000 | 89 | 20 | 3 | 18 | 68 | 198 |
| THB 50,001- THB 70,000 | 40 | 37 | 2 | 25 | 43 | 147 |
| THB 70,001- THB 100,000 | 21 | 49 | 12 | 16 | 58 | 156 |
| THB 100,001-THB | 7 | 8 | 3 | 12 | 45 | 75 |
| 200,000 More than THB 200,000 | 14 | 2 | 0 | 4 | 11 | 31 |
| Total | 290 | 142 | 21 | 86 | 263 | 802 |

For the household size, a majority of the sample has 3-4 members living in a family. The details are presented in the following table.

Table 5.3 Number of family members

| Number of family members | Frequency | Percent |
|--------------------------|-----------|---------|
| Living alone | 85 | 10.6 |
| 2 | 174 | 21.6 |
| 3 | 198 | 24.6 |
| 4 | 217 | 27.0 |
| 5 | 86 | 10.7 |
| 6 | 33 | 4.1 |
| 7 | 11 | 1.4 |
| Total | 804 | 100 |

5.2 Reliability Test of Constructs

The reliability test of the summated scale was best assessed by Cronbach's Alpha (Hair et al., 2010). It is noted that an item (trying to make new friends and spend time with them) is dropped out of the construct of desirable social skills and habit dropped due to low factor loadings. Similarly, an item (saving only when there is money left after paying other things [reverse]) is dropped out of the construct of effectual financial skills and habits. After dropping out two items, the result of the scales is presented in the following table:

Table 5.4 Reliability Test of Constructs

| Scale | Items | Cronbach's Alpha |
|---|-------|------------------|
| Skills and Habits | | |
| Effectual financial skills and habits | 5 | 0.642* |
| Social skills and habits | 3 | 0.703 |
| Preventive healthcare skills and habits | 5 | 0.791 |
| Shopping and spending habits | 3 | 0.819 |
| Planning skills and habits | 11 | 0.877 |
| Adaptation Strategies | | |
| Normative adaptation strategies | 4 | 0.657* |
| Problem-focused adaptation strategies | 6 | 0.754 |
| Emotion-focused adaptation strategies | 8 | 0.685* |
| Human capital development adaptation strategies | 4 | 0.702 |
| Subjective Well-being | | |
| Financial satisfaction | 4 | 0.815 |
| Perceived social support | 6 | 0.776 |
| Health satisfaction | 3 | 0.711 |
| Shopping satisfaction | 3 | 0.806 |
| Objective Well-being | | |
| Enactment of social roles | 2 | 0.701 |
| Praying/meditating and altruistic activities | 3 | 0.663* |
| Shopping/leisure activities | 6 | 0.668* |

Table 5.4 Reliability Test of Constructs (cont.)

| Scale | Items | Cronbach's Alpha |
|------------------------------------|-------|------------------|
| Overall Well-being for each domain | | |
| Social domain | 8 | 0.818 |
| Spirituality/religiosity domain | 4 | 0.729 |
| Accomplishment domain | 8 | 0.804 |
| Overall life satisfaction | 5 | 0.818 |
| Optimism | 7 | 0.705 |
| Personal control | 8 | 0.632* |
| Freedom | 3 | 0.737 |
| Social desirability | 10 | 0.604* |

^{*}Scales with low Cronbach's Alpha

Among the twenty-two scales tested for their reliability, fifteen of them had acceptable levels of reliability with the Cronbach's Alpha at 0.7 or above (Hair *et al.*, 2010). Seven constructs had an Alpha score of less than 0.7, but all were still higher than 0.6. No construct has a value of less than 0.5, hence, this researcher decides to keep all constructs in this study. The construct of the social desirability has the lowest reliability at 0.604, but still, it represents acceptable internal consistency at this value (Rahimnia and Hassanadeh, 2013).

5.3 Hypothesis Testing Methods

In this study, there are six main sets of hypotheses regarding:

- 1. The effects of well-being domains on overall life satisfaction
- 2. The effects of early life experiences (skills and habits, and adaptation processes) on well-being domains
- 3. The effects of early developmental factors on well-being domains
- 4. The effects of early developmental factors on adaptation processes
- 5. The effects of timing and time:
 - a. The effects of timing and time on skills and habits

- b. Timing as potential moderators on the relationship between skills and habits, and well-being domains
- 6. The influences of contextual factors with respect to:
 - a. The effects of individual traits (optimism, personal control, SES, and freedom) on overall life satisfaction
 - b. The effects of personal control on skills and habits
 - c. The effects of personal control and SES on problemfocused and emotion-focused coping strategies
 - d. The effects of family size on overall life satisfaction

In order to explore the effects of variables in the life course model on wellbeing in later life, this research study focuses on the significance of theoretical relationships from hypotheses to test the research framework rather than the predictive power of independent variables (F-value and R-square). Thus, a partial correlation is chosen to test the following hypotheses: hypotheses in set 1, set 2, set 3, set 4, 5a, and 6a-c. The purpose of these hypotheses is to explore the effects of life course on wellbeing in later life by testing whether and to what extent there is a numerical relationship between two variables in each hypothesis, using their correlation coefficient (R-value or r), while controlling all variables related to both variables in the stated hypothesis. This method is more preferable as it provides a numerical value of a measure of the strength of the relationship between two variables of interest in each hypothesis by controlling the confounding variables, while a multiple regression gives unbiased results for the effect size and overall significance of the model. For hypothesis 5b, a moderator analysis is conducted by using a hierarchal regression model to examine potential moderators in the relationships between early experiences in skills and habits, and well-being domains. Lastly, an independent sample t-test is conducted for hypothesis 6d to test whether older people living with family significantly have a higher present level of life satisfaction.

5.4 The Effects of Well-being Domains on Overall Life Satisfaction

According to the first set of hypotheses, a partial correlation is conducted to measure the degree of association (r) between two variables (each well-being

domain and overall life satisfaction), with the effect set of controlling variables that are hypothesized to correlate with overall life satisfaction removed to avoid confounding effects.

5.4.1 Correlation results between well-being domains and overall life satisfaction

Hypotheses in set 1 propose a relationship between well-being domains (financial solvency, level of financial satisfaction, perceived social support, enactment of social roles, self-reported health, number of ailments, spirituality/religiosity, praying and altruistic activities, occupational satisfaction, occupational role enactment, material satisfaction, leisure activities, and accomplishments) and life satisfaction. These hypotheses are examined by a partial correlation, where the researcher measures the strengths and directions of linear relationships between each well-being domain and overall life satisfaction whilst controlling for the effects of social desirability, personal control, SES, freedom, and optimism. The results are shown in Table 5.5:

Table 5.5 Results of partial correlations between well-being domains and life satisfaction

| Well-being domains | Overall life satisfaction |
|-----------------------------------|---------------------------|
| Financial satisfaction | .513*** |
| Financial solvency | .235*** |
| Perceived social support | .491*** |
| Enactment of social roles | .436*** |
| Self-reported health | .472*** |
| Number of ailments | 022 |
| Spirituality/religiosity | .242*** |
| Praying and altruistic activities | .374*** |
| Occupational satisfaction | .350*** |
| Occupational role enactment | .319*** |
| Material satisfaction | .409*** |
| Leisure activities | .420*** |
| Accomplishments | .558*** |
| | |

p < 0.05, *p < 0.01, ***p < 0.001

Note: the table entries include partial correlation and significance level (1-tail), controlling for social desirability and early developmental factors.

5.4.2 Hypothesis testing for the associations of well-being domains on life satisfaction

Hypothesis 1.1 proposes that life satisfaction is positively associated with (a) level of financial satisfaction and (b) financial solvency. As shown in table 5.5, life satisfaction is significantly and positively associated with both level of financial satisfaction (r = .513, p < 0.001) and financial solvency (r = .235, p < 0.001). Thus, hypothesis 1.1 is fully supported in this study.

Hypothesis 1.2 proposes that life satisfaction is positively associated with (a) perceived social support and (b) enactment of social roles. As shown in table 5.5, life satisfaction is significantly and positively associated with both perceived social support (r = .419, p < 0.001) and enactment of social roles (r = .436, p < 0.001). Thus, hypothesis 1.2 is fully supported in this study.

Hypothesis 1.3 proposes that life satisfaction is (a) positively associated with self-reported health and (b) negatively associated with the number of ailments. As shown in table 5.5, life satisfaction is significantly and positively associated with self-reported health (r = .472, p < 0.001); whereas life satisfaction is significantly and positively associated with the number of ailments (r = -.022, p = 0.230, ns). Thus, hypothesis 1.3 is partially supported in this study.

Hypothesis 1.4 proposes that life satisfaction is positively associated with (a) spirituality/religiosity and (b) praying and altruistic activities. As shown in table 5.5, life satisfaction is significantly and positively associated with both spirituality/religiosity (r = .242, p < 0.001) and praying and altruistic activities (r = .242, p < 0.001) .374, p < 0.001). Thus, hypothesis 1.4 is fully supported in this study.

Hypothesis 1.5 proposes that life satisfaction is positively associated with (a) occupational satisfaction and (b) occupational role enactment. As shown in table 5.5, life satisfaction is significantly and positively associated with both occupational satisfaction (r = .350, p < 0.001) and occupational role enactment (r = .319, p < 0.001) 0.001). Thus, hypothesis 1.5 is fully supported in this study.

Hypothesis 1.6 proposes that life satisfaction is positively associated with (a) material satisfaction and (b) leisure activities. As shown in table 5.5, life satisfaction is significantly positively associated with both material satisfaction (r = .409, p < 0.001) and leisure activities (r = .420, p < 0.001). Thus, hypothesis 1.6 is fully supported in this study.

Hypothesis 1.7 proposes that life satisfaction is positively associated with the favorability of cognitions about one's accomplishments. As shown in table 5.5, life satisfaction is significantly and positively associated with the favorability of cognitions about one's accomplishments (r = .558, p < 0.001). Thus, hypothesis 1.7 is fully supported in this study.

5.4.3 The effect sizes of each well-being domain toward overall life satisfaction

In order to explore the relative influence of each well-being domain, a multiple regression analysis, where the researcher regress the dependent variable, overall life satisfaction, on all well-being domains (financial domain, social domain, health domain, religiosity/spirituality domain, shopping and spending domain, occupational domain, and domain of accomplishments). The results are shown below:

Table 5.6 Results of multiple regression analysis on overall life satisfaction

| | Overall Life Satisfaction | | | |
|-----------------------------------|-------------------------------|-----------------------|-----------------------------|---------|
| | Unstandardized Coefficient | Standardized Error | Standardized Coefficient | p-value |
| Constant | 1.004 | .139 | 0.74 | |
| Financial solvency | .014 | .009 | .047 | .118 |
| Financial satisfaction | .193 | .030 | .216*** | .000*** |
| Perceived social support | .102 | .039 | .113*** | .009*** |
| Enactment of social roles | .090 | .026 | .118*** | .000*** |
| Self-reported health | .174 | .029 | .202*** | .000*** |
| Number of ailments | 025 | .013 | 055* | .048* |
| Spirituality/religiosity | .023 | .017 | .042 | .178 |
| Praying and altruistic activities | .002 | .029 | .003 | .944 |
| Occupational satisfaction | .003 | .023 | .005 | .879 |
| Occupational role enactment | .002 | .021 | .003 | .927 |
| Material satisfaction | 083 | .032 | 116* | .011* |
| Leisure activities | .006 | .032 | .007 | .855 |
| Accomplishments | .227 | .053 | .251*** | .000*** |
| Social desirability | 088 | .033 | 075** | .008** |
| R2 | 0.473*** | | | |
| Adjusted R2 | 0.464*** | | | |
| F-Stat | 50.611*** | | | |
| *n < 0.05 **n < 0.01 ***n < 0.0 | | | | |

p < 0.05, *p < 0.01, **p < 0.001

This regression model is able to account for 47.30% of the variance in overall life satisfaction, F (14, 789) = 50.611, p < 0.001, with adjusted R2 of .473.

5.4.3.1 Assumption check for the regression model building of overall life satisfaction

The goal of using the multiple regression analysis is to see if overall life satisfaction, the dependent variable, can be explained or predicted by identified well-being domains. In order to ensure the result of this statistical test was valid for generalization, it was required to check and satisfy all regression assumptions.

First, the residual analysis for linearity was conducted. Using GRETL, the non-linearity test is performed with p-value (0.0782942), accepting the null hypothesis. [See Appendix C1] Hence, the relationship is linear. Similarly, no non-linear pattern is observed in the scatter plot of regression standardized predicted value and standardized residual. [See Appendix C3]

Second, the problem of independent errors which may cause autocorrelation is not expected since the data is not time-series ones. Third, the histogram of life satisfaction, dependent variable, seems normally distributed (bell shape) and the normality probability plot of the residuals is a straight line with absence signaling any non-normality problem. [See Appendix C4]

However, the test for normality for residual using GRETL is performed with p-value (4.25313e-16), rejecting the null hypothesis. Hence, an error is not normally distributed. [See appendix B1] Yet, the dependent variable non-normal residual is not a serious problem since the sample size in this study is 804 which is larger than 100. Therefore, t-test and F-test are still reliable. In addition, the casewise diagnostics show that only six cases have standardized residuals more than +/-3, which indicate outliers in this model; however, these cases do not have influential on the regression model (values of standardized DfBeta are not below -1 and above +1). [See Appendix C5]

Fourth, the white's test for heteroskedasticity using GRETL is performed with p-value (3.20367e-20), rejecting the null hypothesis [See Appendix B1]. Hence, the variance of the residuals is not constant and the selection of robust standard errors is required to correct the standard errors, t-stats, and F-statistics. Fifth, the problem of multicollinearity is not found because the Variance Inflation Factor (VIF) statistics are all less than 5. Only one construct, accomplishments, has VIF value of 5.152. [See Appendix C2] Still, it is less than 10 and the slope coefficient of accomplishments is significant. [See Table 5.5] Overall, the required assumptions of regression are satisfied.

5.4.3.2 Change in regression results on overall life satisfaction

Due to the white's test for heteroskedasticity, the variance of
the residuals is not constant and the selection of robust standard errors is required to
correct the standard errors, t-stats, and F-statistics. Therefore, HCREG macro for
SPSS is used for estimating OLS regression models but with heteroscedasticityconsistent standard errors. The change in results are shown in Table 5.7:

Table 5.7 Change in the results of multiple regression analysis on overall life satisfaction

| | | Overall Life Satis | faction | |
|-----------------------------------|--------------------|--------------------------------|---------|---------------------|
| | Standardized Error | Standardized Error (Robust) | p-value | p-value (Robust) |
| Constant | .139 | .166 | | |
| Financial solvency | .009 | .010 | .118 | .1847 |
| Financial satisfaction | .030 | .037 | .000*** | .000*** |
| Perceived social support | .039 | .042 | .009*** | .0156* |
| Enactment of social roles | .026 | .030 | .000*** | .0023* |
| Self-reported health | .029 | .040 | .000*** | .000*** |
| Number of ailments | .013 | .013 | .048* | .0567 |
| Spirituality/religiosity | .017 | .019 | .178 | .2201 |
| Praying and altruistic activities | .029 | .031 | .944 | .9479 |
| Occupational satisfaction | .023 | .025 | .879 | .8900 |
| Occupational role enactment | .021 | .023 | .927 | .9343 |
| Material possession | .032 | .035 | .011* | .0184* |
| Leisure activities | .032 | .036 | .855 | .8724 |
| Accomplishments | .053 | .058 | .000*** | .0001*** |
| Social desirability | .033 | .036 | .008** | .0144 |
| Adjusted R2 | 0.464 to .4731 | | | |
| F-Stat | 50.611 to 55.2245 | | | |
| | | | | |

p < 0.05, p < 0.01, p < 0.01

There is a slight increase in standardized error as well as p-value. Therefore, the researcher assumes the same rank of effect sizes for each well-being domain since the purpose of performing a multiple regression analysis is to

explore the effect sizes. According to the table 5.6, accomplishments ($\beta = .251$) have the strongest impact on overall life satisfaction followed by level of financial satisfaction (β = .216), self-reported health (β = .202), enactment of social roles $(\beta = .118)$, material satisfaction ($\beta = .116$) perceived social support ($\beta = .113$), number of ailments ($\beta = -.055$), financial solvency ($\beta = .047$), spiritual/religiosity ($\beta = .042$), leisure activities ($\beta = .007$), occupational satisfaction ($\beta = .005$), occupational role enactment ($\beta = .003$), and praying or meditating ($\beta = .003$) respectively.

5.5 The Effects of Well-being Domains on Overall Life Satisfaction

According to the second set of hypotheses, a partial correlation is conducted to measure the degree of association (r) between two variables (each early life experience and each well-being domain), with the effect set of controlling variables that are hypothesized to correlate with well-being domains removed to avoid confounding effects.

5.5.1 Correlation results between early life experiences and well-being domains

Hypotheses in set 2 posit a positive relationship between early life experiences (specific skills and habits, normative adaptation strategies, problemfocused coping strategies, emotion-focused coping strategies, and human capital development) and well-being domains (financial solvency, level of financial satisfaction, perceived social support, enactment of social roles, self-reported health, number of ailments, spirituality/religiosity, praying and altruistic activities, occupational satisfaction, occupational role enactment, material satisfaction, leisure activities, and accomplishments). These hypotheses are examined using partial correlation analysis, where the researcher measures the strengths and directions of linear relationships between each early life experience and each well-being domain whilst controlling for the effects of social desirability and early developmental factors (informal, formal, and commercial). The results are shown in Table 5.8:

Table 5.8 Results of partial correlations between early life experiences and wellbeing domains

| Jeing domains | | | 1 1:0 | | | |
|-----------------------------------|-------------------|------------------------|---------------------|----------------------|---------------------------|--|
| | | Early life experiences | | | | |
| Well-being domains | Skills and habits | Normative | Problem- focused | Emotion- focused | Human capital development | |
| Financial satisfaction | .380*** | .058 ^m | .071* | .081* | .039 | |
| Financial solvency | .352*** | 209 | 026 | 075* | 005 | |
| Perceived social support | .356*** | .205*** | .086** | .075* | .073* | |
| Enactment of social roles | .399*** | .164*** | $.052^{m}$ | .021 | 024 | |
| Self-reported health | .290*** | .082* | .101** | .113** | .069* | |
| Number of ailments | 108** | 150*** | 262*** | 034 | 262*** | |
| Spirituality/religiosity | .056 ^m | .070* | 044 | .200*** | 036 | |
| Praying and altruistic activities | .081* | .029 | 121*** | .188*** | .081* | |
| Occupational satisfaction | .127*** | .089** | .059* | .110** | .076* | |
| Occupational role enactment | .116*** | .140*** | .052 ^m | . <mark>0</mark> 80* | .038 | |
| Material satisfaction | .226*** | .126*** | .087** | .102** | .079* | |
| Leisure activities | .226*** | .099** | 002 | .187*** | .226*** | |
| Accomplishments | .412*** | .094** | .094** | .115** | .082* | |
| | | | | | | |

^{*}p < 0.05, **p < 0.01, ***p < 0.001

Note: the table entries include partial correlation and significance level (1-tail), controlling for social desirability and early developmental factors.

5.5.2 Hypothesis testing for the relationships between early life experiences (skills and habits) and well-being domains

Hypothesis 2.1 posits that the older person's level of engagement in effectual financial skills and habits in earlier adulthood years is positively related to one's present level of (a) financial satisfaction and (b) level of financial solvency. As shown in Table 5.8 column 2, older person's level of engagement in effectual financial skills and habits in earlier adulthood years is significantly and positively related with both level of financial satisfaction (r = .380, p < 0.001) and financial solvency (r = .352, p < 0.001). Thus, hypothesis 2.1 is fully supported in this study.

^mp = marginally significant

Hypothesis 2.2 posits that the older person's level of employment of desirable social skills and habits in earlier adulthood years is positively related to one's present level of (a) perceived social support and (b) enactment of social roles. As shown in Table 5.8 column 2, older person's level of employment of desirable social skills and habits in earlier adulthood years is significantly and positively related with both level of perceived social support (r = .356, p < 0.001) and enactment of social roles (r = .399, p < 0.001). Thus, hypothesis 2.2 is fully supported in this study.

Hypothesis 2.3 posits that the older person's level of engagement in preventive healthcare habits in earlier adulthood years is (a) positively related to one's present level of self-reported health and (b) negatively related to the number of ailments. As shown in Table 5.8 column 2, older person's level of engagement in preventive healthcare habits in earlier adulthood years is significantly and positively related with the level of self-reported health (r = .290, p < 0.001); while older person's level of engagement in preventive healthcare habits in earlier adulthood years is significantly and negatively related with the number of ailments (r = -.108, p < 0.001). Thus, hypothesis 2.3 is fully supported in this study.

Hypothesis 2.4 posits that the older person's strength of spiritual values and habits earlier in life is positively related to one's present level of (a) spirituality/religiosity and (b) praying and altruistic activities. As shown in Table 5.8 column 2, older person's strength of spiritual values and habits in earlier adulthood years is marginally significantly and positively related with the level of spirituality/religiosity health (r = .056, p = 0.057); whereas older person's strength of spiritual values and habits in earlier adulthood years is significantly and positively related with praying and altruistic activities (r = .081, p < 0.05). Thus, hypothesis 2.4 is fully supported in this study.

Hypothesis 2.5 posits that the older person's effectual work or home-care habits earlier in life is positively related to one's present level of (a) occupational satisfaction and (b) occupational role enactment. As shown in Table 5.8 column 2, older person's effectual work or home-care habits in earlier adulthood years is significantly and positively related to both level of occupational satisfaction (r = .127, p < 0.001) and occupational role enactment (r = .116, p < 0.001). Thus, hypothesis 2.5 is fully supported in this study.

Hypothesis 2.6 posits that the older person's shopping skills and spending money habits earlier in life is positively related to one's present level of (a) material satisfaction and (b) leisure activities. As shown in Table 5.8 column 2, older person's shopping skills and spending money habits in earlier adulthood years is significantly and positively related with both level of material satisfaction (r = .226, p < 0.001) and leisure activities (r = .226, p < 0.001). Thus, hypothesis 2.6 is fully supported in this study.

Hypothesis 2.7 posits that the older person's planning skills and habits earlier in life is positively related to one's present favorability of cognitions about one's accomplishments. As shown in Table 5.8 column 2, older person's planning skills and habits in earlier adulthood years is significantly and positively related to the favorability of cognitions about one's accomplishments (r = .412, p < 0.001). Thus, hypothesis 2.7 is fully supported in this study.

5.5.3 Hypothesis testing for the relationships between early life experiences (normative adaptation strategy) and well-being domains

Hypothesis 3.1 assumes that the aging person's socialization level during his or her adulthood years is positively associated with his or her present level of (a) financial satisfaction and (b) financial solvency. As shown in Table 5.8 column 3, the aging person's socialization level during his or her adulthood years is marginally and positively significant related with the level of financial satisfaction (r = .058, p = 0.052); whereas the aging person's socialization level during his or her adulthood years is not significantly and positively related with financial solvency (r = -.209, p = 0.203, ns). Thus, hypothesis 3.1 is partially supported in this study.

Hypothesis 3.2 assumes that the aging person's socialization level during his or her adulthood years is positively associated with his or her present level of (a) perceived social support and (b) enactment of social roles. As shown in Table 5.8 column 3, the aging person's socialization level during his or her adulthood years is significantly and positively related with both level of perceived social support (r = .205, p < 0.001) and enactment of social roles (r = .164, p < 0.001). Thus, hypothesis 3.2 is fully supported in this study.

Hypothesis 3.3 assumes that the aging person's socialization level during his or her adulthood years is (a) positively associated with his or her present level of self-reported health and (b) negatively related to the number of ailments. As shown in Table 5.8 column 3, the aging person's socialization level during his or her adulthood years is significantly and positively related with the level of self-reported health (r =.082, p < 0.05); while the aging person's socialization level during his or her adulthood years is significantly and negatively related with the number of ailments (r = -.150, p < 0.001). Thus, hypothesis 3.3 is fully supported in this study.

Hypothesis 3.4 assumes that the aging person's socialization level during his or her adulthood years is positively associated with his or her present level of (a) spirituality/religiosity and (b) praying and altruistic activities. As shown in Table 5.8 column 3, the aging person's socialization level during his or her adulthood years is significantly and positively related with the level of spirituality/religiosity (r = .070, p< 0.05); whereas the aging person's socialization level during his or her adulthood years is not significantly and positively related with the praying and altruistic activities (r = .029, p = 0.205, ns). Thus, hypothesis 3.4 is partially supported in this study.

Hypothesis 3.5 assumes that the aging person's socialization level during his or her adulthood years is positively associated with his or her present level of (a) occupational satisfaction and (b) occupational role enactment. As shown in Table 5.8 column 3, the aging person's socialization level during his or her adulthood years is significantly and positively related to both level of occupational satisfaction (r = .089, p < 0.001) and occupational role enactment (r = .140, p < 0.001). Thus, hypothesis 3.5 is fully supported in this study.

Hypothesis 3.6 assumes that the aging person's socialization level during his or her adulthood years is positively associated with his or her present level of (a) material satisfaction and (b) leisure activities. As shown in Table 5.8 column 3, the aging person's socialization level during his or her adulthood years is significantly and positively related to both level of material satisfaction (r = .126, p < 0.001) and leisure activities (r = .099, p < 0.001). Thus, hypothesis 3.6 is fully supported in this study.

Hypothesis 3.7 assumes that the aging person's socialization level during his or her adulthood years is positively associated with his or her present favorability of cognitions about one's accomplishments. As shown in Table 5.8 column 3, the aging person's socialization level during his or her adulthood years is significantly and positively related to present favorability of cognitions about one's accomplishments (r = .412, p < 0.001). Thus, hypothesis 3.7 is fully supported in this study.

5.5.4 Hypothesis testing for the relationships between early life experiences (problem-focused and emotion-focused coping strategies) and well-being domains

Hypothesis 4.1 assumes that the aging person's present level of financial satisfaction is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years. As shown in Table 5.8 column 4 and 5, the aging person's present level of financial satisfaction is significantly and positively associated with the use of problem-focused coping strategies (r = .071, p < 0.05); whereas the aging person's present level of financial satisfaction is significantly but not negatively associated with the use of emotion-focused coping strategies (r = .081, p < 0.05, owning an opposite sign of the correlation) in handling major life changes during his or her earlier adult years. Thus, hypothesis 4.1 is partially supported in this study.

Hypothesis 4.2 assumes that the aging person's present financial solvency is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years. As shown in Table 5.8 column 4 and 5, the aging person's present financial solvency is not significantly and positively associated with the use of problem-focused coping strategies (r = -.026, p = 0.236, ns); whereas the aging person's present financial solvency is significantly and negatively associated with the use of emotion-focused coping strategies (r = -.075, p < 0.05) in handling major life changes during his or her earlier adult years. Thus, hypothesis 4.2 is partially supported in this study.

Hypothesis 5.1 assumes that the aging person's present level of perceived social support is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years. As

shown in Table 5.8 column 4 and 5, the aging person's present level of perceived social support is significantly and positively associated with the use of problemfocused coping strategies (r = .086, p < 0.01); whereas the aging person's present level of perceived social support is significantly but not negatively associated with the use of emotion-focused coping strategies (r = .075, p < 0.05, owning an opposite sign of the correlation) in handling major life changes during his or her earlier adult years. Thus, hypothesis 5.1 is partially supported in this study.

Hypothesis 5.2 assumes that the aging person's present enactment of social roles is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years. As shown in Table 5.8 column 4 and 5, the aging person's present enactment of social roles is marginally and positively significant associated with the use of problem-focused coping strategies (r = .052, p = 0.070); while the aging person's present level of perceived social support is not significantly and negatively associated with the use of emotion-focused coping strategies (r = .021, p = 0.281, ns) in handling major life changes during his or her earlier adult years. Thus, hypothesis 5.2 is partially supported in this study.

Hypothesis 6.1 assumes that the aging person's present level of selfreported health is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years. As shown in Table 5.8 column 4 and 5, the aging person's present level of self-reported health is significantly and positively associated with the use of problem-focused coping strategies (r = .101, p < 0.01); whereas the aging person's present level of selfreported is significantly but not negatively associated with the use of emotion-focused coping strategies (r = .113, p < 0.05, owning an opposite sign of the correlation) in handling major life changes during his or her earlier adult years. Thus, hypothesis 6.1 is partially supported in this study.

Hypothesis 6.2 assumes that the aging person's number of ailments is (a) negatively associated with the use of problem-focused coping strategies and (b) positively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years. As shown in Table 5.8 column 4 and 5, the aging person's number of ailments is significantly and negatively associated with the use of problem-focused coping strategies (r = -.262, p < 0.001); whereas the aging person's present level of self-reported is not significantly and positively associated with the use of emotion-focused coping strategies (r = -.034, p = 0.172, ns) in handling major life changes during his or her earlier adult years. Thus, hypothesis 6.2 is partially supported in this study.

Hypothesis 7.1 assumes that the aging person's present level of spirituality/religiosity is (a) negatively associated with the use of problem-focused coping strategies and (b) positively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years. As shown in Table 5.8 column 4 and 5, the aging person's present level of spirituality/religiosity is not significantly and negatively associated with the use of problem-focused coping strategies (r = -.044, p = 0.107; whereas the aging person's present level of spirituality/religiosity is significantly and positively associated with the use of emotion-focused coping strategies (r = .200, p < 0.001) in handling major life changes during his or her earlier adult years. Thus, hypothesis 7.1 is partially supported in this study.

Hypothesis 7.2 assumes that the aging person's present level of praying and altruistic activities is (a) negatively associated with the use of problem-focused coping strategies and (b) positively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years. As shown in Table 5.8 column 4 and 5, the aging person's present level of praying and altruistic activities is significantly and negatively associated with the use of problem-focused coping strategies (r = -.121, p < 0.001); whereas the aging person's present level of spirituality/religiosity is significantly and positively associated with the use of emotion-focused coping strategies (r = .188, p < 0.001) in handling major life changes during his or her earlier adult years. Thus, hypothesis 7.2 is fully supported in this study.

Hypothesis 8.1 assumes that the aging person's present level of occupational satisfaction is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years. As

shown in Table 5.8 column 4 and 5, the aging person's present level of occupational satisfaction is significantly and positively associated with the use of problem-focused coping strategies (r = .059, p < 0.01); whereas the aging person's present level of occupational satisfaction is significantly but not negatively associated with the use of emotion-focused coping strategies (r = .110, p < 0.01, owning an opposite sign of the correlation) in handling major life changes during his or her earlier adult years. Thus, hypothesis 8.1 is fully supported in this study.

Hypothesis 8.2 assumes that the aging person's present level of occupational role enactment is (a) positively associated with the use of problemfocused coping strategies and (b) negatively associated with the use of emotionfocused coping strategies in handling major life changes during his or her earlier adult years. As shown in Table 5.8 column 4 and 5, the aging person's present level of occupational role enactment is marginally and positively significant associated with the use of problem-focused coping strategies (r = .052, p = 0.71); while the aging person's present level of occupational role enactment is significantly but not negatively associated with the use of emotion-focused coping strategies (r = .080, p < .0800.05, owning an opposite sign of the correlation) in handling major life changes during his or her earlier adult years. Thus, hypothesis 8.2 is partially supported in this study.

Hypothesis 9.1 assumes that the aging person's present level of material satisfaction is (a) negatively associated with the use of problem-focused coping strategies and (b) positively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years. As shown in Table 5.8 column 4 and 5, the aging person's present level of material satisfaction is significantly but not negatively associated with the use of problemfocused coping strategies (r = .087, p < 0.01, owning an opposite sign of the correlation); whereas the aging person's present level of material satisfaction is significantly and positively associated with the use of emotion-focused coping strategies (r = .102, p < 0.01) in handling major life changes during his or her earlier adult years. Thus, hypothesis 9.1 is partially supported in this study.

Hypothesis 9.2 assumes that the aging person's present level of leisure activities is (a) negatively associated with the use of problem-focused coping strategies and (b) positively associated with the use of emotion-focused coping

strategies in handling major life changes during his or her earlier adult years. As shown in Table 5.8 column 4 and 5, the aging person's present level of leisure activities is not significantly and negatively associated with the use of problem-focused coping strategies (r = -.002, p = 0.475); whereas the aging person's present level of leisure activities is significantly and positively associated with the use of emotion-focused coping strategies (r = .187, p < 0.001) in handling major life changes during his or her earlier adult years. Thus, hypothesis 9.2 is partially supported in this study.

Hypothesis 10 assumes that the aging person's present favorability of cognitions about one's accomplishments is (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during his or her earlier adult years. As shown in Table 5.8 column 4 and 5, the aging person's present favorability of cognitions about one's accomplishments is significantly and positively associated with the use of problem-focused coping strategies (r = .094, p < 0.01); whereas the aging person's present favorability of cognitions about one's accomplishments is significantly but not negatively associated with the use of emotion-focused coping strategies (r = .115, p < 0.01, owning an opposite sign of the correlation) in handling major life changes during his or her earlier adult years. Thus, hypothesis 10 is partially supported in this study.

5.5.5 Hypothesis testing for the relationships between early life experiences (human capital development) and well-being domains

Hypothesis 11.1 suggests that the aging person's development in skills and knowledge during his or her adulthood years is positively associated with his or her present level of (a) financial satisfaction and (b) financial solvency. As shown in Table 5.8 column 6, the aging person's development in skills and knowledge during his or her adulthood years is not significantly and positively related with both level of financial satisfaction (r = .039, p = 0.136, ns) and financial solvency (r = -.005, p = 0.442, ns). Thus, hypothesis 11.1 is not supported in this study.

Hypothesis 11.2 suggests that the aging person's development in skills and knowledge during his or her adulthood years is positively associated with his or her

present level (a) perceived social support and (b) enactment of social roles. As shown in Table 5.8 column 6, the aging person's development in skills and knowledge during his or her adulthood years is significantly and positively related with the level of perceived social support (r = .073, p < 0.05); whereas the aging person's development in skills and knowledge during his or her adulthood years is not significantly and positively related with the enactment of social roles (r = -.024, p = 0.253, ns). Thus, hypothesis 11.2 is partially supported in this study.

Hypothesis 11.3 assumes that the aging person's development in skills and knowledge during his or her adulthood years is (a) positively associated with his or her present level of self-reported health and (b) negatively related to the number of ailments. As shown in Table 5.8 column 3, the aging person's development in skills and knowledge during his or her adulthood years is significantly and positively related with the level of self-reported health (r = .069, p < 0.05); while the aging person's development in skills and knowledge during his or her adulthood years is significantly and negatively related with the number of ailments (r = -.262, p < 0.001). Thus, hypothesis 11.3 is fully supported in this study.

Hypothesis 11.4 suggests that the aging person's development in skills and knowledge during his or her adulthood years is positively associated with his or her present level (a) spirituality/religiosity and (b) praying and altruistic activities. As shown in Table 5.8 column 6, the aging person's development in skills and knowledge during his or her adulthood years is not significantly and positively related with the level of spirituality/religiosity (r = -.036, p = 0.151, ns); whereas the aging person's development in skills and knowledge during his or her adulthood years is significantly and positively related with financial solvency (r = .081, p < 0.05). Thus, hypothesis 11.4 is partially supported in this study.

Hypothesis 11.5 suggests that the aging person's development in skills and knowledge during his or her adulthood years is positively associated with his or her present level (a) occupational satisfaction and (b) occupational role enactment. As shown in Table 5.8 column 6, the aging person's development in skills and knowledge during his or her adulthood years is significantly and positively related with the level of occupational satisfaction (r = .076, p < 0.05); whereas the aging person's development in skills and knowledge during his or her adulthood years is not significantly and positively related with occupational role enactment (r = .038, p = 0.140, ns). Thus, hypothesis 11.5 is partially supported in this study.

Hypothesis 11.6 suggests that the aging person's development in skills and knowledge during his or her adulthood years is positively associated with his or her present level (a) material satisfaction and (b) leisure activities. As shown in Table 5.8 column 6, the aging person's development in skills and knowledge during his or her adulthood years is significantly and positively related with both level of material satisfaction (r = .079, p < 0.05) and leisure activities (r = .226, p < 0.001). Thus, hypothesis 11.6 is fully supported in this study.

Hypothesis 11.7 suggests that the aging person's development in skills and knowledge during his or her adulthood years is positively associated with his or her present favorability of cognitions about one's accomplishments. As shown in Table 5.8 column 6, the aging person's development in skills and knowledge during his or her adulthood years is significantly and positively related to the favorability of cognitions about one's accomplishments (r = .082, p < 0.05). Thus, hypothesis 11.7 is supported in this study.

5.6 The Effects of Early Developmental Factors on Well-being Domains

According to the third set of hypotheses, a partial correlation is conducted to measure the degree of association (r) between two variables (each developmental factor and each well-being domain), with the effect set of controlling variables that are hypothesized to correlate with well-being domains removed to avoid confounding effects.

5.6.1 Correlation results between early developmental factors and well-being domains

Hypotheses in set 3 suggest a relationship between early developmental factors (informal, formal, and commercial socialization agents identified specifically for each well-being domain) and well-being domains (financial solvency, level of financial satisfaction, perceived social support, enactment of social roles, self-reported

health, number of ailments, spirituality/religiosity, praying and altruistic activities, occupational satisfaction, occupational role enactment, material satisfaction, leisure activities, and accomplishments). These hypotheses are examined by partial correlation analysis, where the researcher measures the strengths and directions of linear relationships between each early developmental factor and each well-being domain whilst controlling for the effects of social desirability and early life experiences (specific skills and habits, normative adaptation strategies, problemfocused coping strategies, emotion-focused coping strategies, and human capital development). The results are shown in Table 5.9:

Table 5.9 Results of partial correlations between early developmental factors and well-being domains

| | Early developm | Early developmental factors | | | | |
|-----------------------------------|-------------------|-----------------------------|-------------------|--|--|--|
| Well-being domains | Informal | Formal | Commercial | | | |
| Financial satisfaction | .056 ^m | .038 | .018 | | | |
| Financial solvency | .235*** | .202*** | .090** | | | |
| Perceived social support | .092** | .069* | 037 | | | |
| Enactment of social roles | 005 | .039 | 024 | | | |
| Self-reported health | .049 ^m | .020 | .055 ^m | | | |
| Number of ailments | .046 ^m | .055 ^m | .035 | | | |
| Spirituality/religiosity | .058 ^m | .019 | 010 | | | |
| Praying and altruistic activities | .128*** | .040 | .004 | | | |
| Occupational satisfaction | .085** | .019 | .044 | | | |
| Occupational role enactment | .098** | .098** | .017 | | | |
| Material satisfaction | .057 ^m | .153*** | .085** | | | |
| Leisure activities | .004 | .177*** | .038 | | | |
| Accomplishments | .161*** | $.050^{\rm m}$ | .190*** | | | |

p < 0.05, p < 0.01, p < 0.01

Note: the table entries include partial correlation and significance level (1-tail), controlling for social desirability and early life experiences.

mp = marginally significant

5.6.2 Hypothesis testing for the effects of early developmental factors on well-being domains

Hypothesis 12.1 suggests that an older person's interactions with informal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) financial satisfaction and (b) financial solvency. As shown in Table 5.9 column 2, older person's interactions with informal socialization agents during his or her developmental years have a marginally significant positive effect on his or her present level of financial satisfaction (r = .056, p = 0.056); whereas older person's interactions with informal socialization agents during his or her developmental years have a significant positive effect on his or her present financial solvency. (r = .235, p < 0.001). Thus, hypothesis 12.1 is fully supported in this study.

Hypothesis 12.2 suggests that an older person's interactions with formal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) financial satisfaction and (b) financial solvency. As shown in Table 5.9 column 3, older person's interactions with formal socialization agents during his or her developmental years have no significant positive effect on his or her present level of financial satisfaction (r = 038, p = 0.140, ns); whereas older person's interactions with formal socialization agents during his or her developmental years have a significant positive effect on his or her present financial solvency. (r = .202, p < 0.001). Thus, hypothesis 12.2 is partially supported in this study.

Hypothesis 12.3 suggests that an older person's interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her present level of (a) financial satisfaction and (b) financial solvency. As shown in Table 5.9 column 4, older person's interactions with commercial socialization agents during his or her developmental years have no significant positive effect on the level of financial satisfaction (r = .018, p = 0.304, ns); whereas older person's interactions with commercial socialization agents during his or her developmental years have a significant positive effect on financial solvency. (r = .090, p < 0.01). Thus, hypothesis 12.3 is partially supported in this study.

Hypothesis 13.1 suggests that older person's interactions with informal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) perceived social support and (b) enactment of social roles.

As shown in Table 5.9 column 2, older person's interactions with informal socialization agents during his or her developmental years have a significant positive effect on the level of perceived social support (r = .092, p < 0.01); whereas older person's interactions with informal socialization agents during his or her developmental years have no significant positive effects on the enactment of social roles (r = -.005, p = 0.446, ns). Thus, hypothesis 13.1 is partially supported in this study.

Hypothesis 13.2 suggests that older person's interactions with formal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) perceived social support and (b) enactment of social roles. As shown in Table 5.9 column 3, older person's interactions with formal socialization agents during his or her developmental years have a significant positive effect on his or her present level of perceived social support (r = .069, p < 0.05); whereas older person's interactions with formal socialization agents during his or her developmental years have no significant positive effect on his or her enactment of social roles (r =.039, p = 0.139, ns). Thus, hypothesis 13.2 is partially supported in this study.

Hypothesis 13.3 suggests that older person's interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her present level of (a) perceived social support and (b) enactment of social roles. As shown in Table 5.9 column 4, older person's interactions with commercial socialization agents during his or her developmental years have found no significant positive effect on both levels of perceived social support (r = -.037, p = 0.150, ns) and enactment of social roles. (r = -.024, p = 0.247, ns). Thus, hypothesis 13.3 is not supported in this study.

Hypothesis 14.1 suggests that an older person's interactions with informal socialization agents during his or her developmental years have (a) a positive effect on his or her present level of self-reported health and (b) a negative effect on his or her number of ailments. As shown in Table 5.9 column 2, older person's interactions with informal socialization agents during his or her developmental years have a marginally significant positive effect on his or her present level of self-reported health (r = .049, p= 0.084) and a marginally significant but not in a negative effect on his or her number

of ailments. (r = .046, p = 0.097, owning an opposite sign of the correlation). Thus, hypothesis 14.1 is partially supported in this study.

Hypothesis 14.2 suggests that an older person's interactions with formal socialization agents during his or her developmental years have (a) a positive effect on his or her present level of self-reported health and (b) a negative effect on his or her number of ailments. As shown in Table 5.9 column 3, older person's interactions with formal socialization agents during his or her developmental years have no significant positive effect on his or her present level of self-reported health (r = .020, p = 0.286, ns) and a marginally significant but not in a negative effect on his or her number of ailments (r = .055, p = 0.060, owning an opposite sign of the correlation). Thus, hypothesis 14.2 is not supported in this study.

Hypothesis 14.3 suggests that an older person's interactions with commercial socialization agents during his or her developmental years have (a) a positive effect on his or her present level of self-reported health and (b) a negative effect on his or her number of ailments. As shown in Table 5.9 column 4, older person's interactions with commercial socialization agents during his or her developmental years have a marginally significant positive effect on his or her present level of self-reported health (r = .055, p = 0.055) and no significant negative effect on his or her present number of ailments (r = .031, p > 0.161, ns). Thus, hypothesis 14.3 is partially supported in this study.

Hypothesis 15.1 suggests that older person's interactions with informal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) spirituality/religiosity and (b) praying and altruistic activities. As shown in Table 5.9 column 2, older person's interactions with informal socialization agents during his or her developmental years have a marginally significant positive effect on the level of spirituality/religiosity (r = .058, p = 0.052); whereas older person's interactions with informal socialization agents during his or her developmental years have a significant positive effect on the level of praying and altruistic activities (r = .128, p < 0.001). Thus, hypothesis 15.1 is fully supported in this study.

Hypothesis 15.2 suggests that older person's interactions with formal socialization agents during his or her developmental years have a positive effect on his

or her present level of (a) spirituality/religiosity and (b) praying and altruistic activities. As shown in Table 5.9 column 3, older person's interactions with formal socialization agents during his or her developmental years have found no significant positive effect on both level spirituality/religiosity (r = .019, p = 0.297, ns); and praying and altruistic activities (r = .040 p = 0.131, ns). Thus, hypothesis 15.2 is not supported in this study.

Hypothesis 15.3 suggests that older person's interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her present level of (a) spirituality/religiosity and (b) praying and altruistic activities. As shown in Table 5.9 column 4, older person's interactions with commercial socialization agents during his or her developmental years have no significant positive effect on both level of spirituality/religiosity (r = -.010, p = 0.385, ns); and praying and altruistic activities. (r = .004, p = 0.450, ns). Thus, hypothesis 15.3 is not supported in this study.

Hypothesis 16.1 suggests that older person's interactions with informal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) occupational satisfaction and (b) occupational role enactment. As shown in Table 5.9 column 2, older person's interactions with informal socialization agents during his or her developmental years have significant positive effects on both level of occupational satisfaction (r = .085, p < 0.01) and occupational role enactment (r = .098, p < 0.01). Thus, hypothesis 16.1 is fully supported in this study.

Hypothesis 16.2 suggests that older person's interactions with formal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) occupational satisfaction and (b) occupational role enactment. As shown in Table 5.9 column 3, older person's interactions with formal socialization agents during his or her developmental years have no significant positive effect on the level of occupational satisfaction (r = .019, p = 0.299, ns); whereas older person's interactions with formal socialization agents during his or her developmental years have a significant positive effect on occupational role enactment (r = .098, p < .0980.01). Thus, hypothesis 16.2 is partially supported in this study.

Hypothesis 16.3 suggests that older person's interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her present level of (a) occupational satisfaction and (b) occupational role enactment. As shown in Table 5.9 column 4, older person's interactions with commercial socialization agents during his or her developmental years have no a significant positive effect on both level of occupational satisfaction (r = .044, p = 0.109, ns) and occupational role enactment (r = .017, p = 0.313, ns). Thus, hypothesis 16.3 is not supported in this study.

Hypothesis 17.1 suggests that an older person's interactions with informal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) material possession and (b) leisure activities. As shown in Table 5.9 column 2, older person's interactions with informal socialization agents during his or her developmental years have a marginally significant positive effect on the level of material possession (r = .057, p = 0.055); whereas older person's interactions with informal socialization agents during his or her developmental years have no significant positive effects on leisure activities (r = .004, p = 0.457, ns). Thus, hypothesis 17.1 is partially supported in this study.

Hypothesis 17.2 suggests that an older person's interactions with formal socialization agents during his or her developmental years have a positive effect on his or her present level of (a) material satisfaction and (b) leisure activities. As shown in Table 5.9 column 3, older person's interactions with formal socialization agents during his or her developmental years have significant positive effects on both level of material satisfaction (r = .153, p < 0.001) and leisure activities (r = .177, p < 0.001). Thus, hypothesis 17.2 is fully supported in this study.

Hypothesis 17.3 suggests that an older person's interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her present level of (a) material possession and (b) leisure activities. As shown in Table 5.9 column 4, older person's interactions with commercial socialization agents during his or her developmental years have a significant positive effect on the level of material satisfaction (r = .085, p < 0.01); whereas older person's interactions with commercial socialization agents during his or her developmental

years have no significant positive effect on leisure activities (r = .038, p = 0.143, ns). Thus, hypothesis 17.3 is partially supported in this study.

Hypothesis 18.1 suggests that an older person's interactions with informal socialization agents during his or her developmental years have a positive effect on his or her present favorability of cognitions about one's accomplishments. As shown in Table 5.9 column 2, older person's interactions with informal socialization agents during his or her developmental years have a significant positive effect on his or her present favorability of cognitions about one's accomplishments (r = .161, p < 0.001). Thus, hypothesis 18.1 is supported in this study.

Hypothesis 18.2 suggests that an older person's interactions with formal socialization agents during his or her developmental years have a positive effect on his or her favorability of cognitions about one's accomplishments. As shown in Table 5.9 column 3, older person's interactions with formal socialization agents during his or her developmental years have a marginally significant positive effect on his or her present favorability of cognitions about one's accomplishments (r = .050, p = 0.081). Thus, hypothesis 18.2 is supported in this study.

Hypothesis 18.3 suggests that an older person's interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her present favorability of cognitions about one's accomplishments. As shown in Table 5.9 column 4, older person's interactions with commercial socialization agents during his or her developmental years have a significant positive effect on his or her present favorability of cognitions about one's accomplishments (r = .190, p < 0.001). Thus, hypothesis 18.3 is supported in this study.

5.7 The Effects of Early Developmental Factors on Early Life **Experiences**

According to the fourth set of hypotheses, a partial correlation is conducted to measure the degree of association (r) between two variables (each developmental factor and each early life experience), with the effect set of controlling variables that are hypothesized to correlate with early life experiences removed to avoid confounding effects.

5.7.1 Correlations between early developmental factors and early life experiences (skills and habits)

Hypotheses in set 4 assume a relationship between each early developmental factor (informal, formal, and commercial socialization identified specifically for each type of skills and habits) and each early life experience (specific skills and habits). These hypotheses are examined by partial correlations, where the researcher measures the strengths and directions of linear relationships between early developmental factors and early life experiences whilst controlling for the effects of social desirability, timing, and personal control. The results are shown in Table 5.10:

Table 5.10 Results of partial correlations between early developmental factors and skills and habits

| | Early developmental factors | | | |
|---|-----------------------------|---------|------------|--|
| Skills and Habits | Informal | Formal | Commercial | |
| Effectual financial skills and habits | .103** | .162*** | .173*** | |
| Desirable social skills and habits | .075** | 023 | .120*** | |
| Preventive healthcare habits | .112** | .099** | .146*** | |
| Spiritual values and habits | .069* | .022 | .177*** | |
| Effectual work and homecare habits | .086** | .032 | .000 | |
| Shopping skills and spending money habits | .062* | .059* | .035 | |
| Planning skills and habits | .110** | .167*** | .115** | |

^{*}p < 0.05, **p < 0.01, ***p < 0.001

Note: the table entries include partial correlation and significance level (1-tail), controlling for social desirability, timing, and personal control.

5.7.2 Hypothesis testing for the effects of early developmental factors on early life experiences in skills and habits

Hypothesis 19.1 suggests that older person's frequency of interactions with informal socialization agents during his or her developmental years have a positive effect on his or her (a) engagement in effectual financial skills and habits, (b) employment of desirable skills and habits, (c) engagement in preventive healthcare habits, (d) strength of spiritual values and habits, (e) engagement in effectual work or homecare habits, (f) engagement in shopping skills spending habits, and (g) employment of planning skills and habits during adulthood years. As shown in Table

5.10 column 2, older person's interactions with informal socialization agents during his or her developmental years have significant positive effects on skills and habits including engagement in effectual financial skills and habits (r = .103, p < 0.01); employment of desirable social skills and habits (r = .075, p < 0.01); engagement in preventive healthcare habits (r = .112, p < 0.01); strength of spiritual values and habits (r = .069, p < 0.05); engagement in effectual work or homecare habits (r = .086, p < .086)0.01); engagement in shopping skills and spending money habits (r = .062, p < 0.05); and employment of planning skills and habits (r = .110, p < 0.01). Thus, hypothesis 19.1 is fully supported in this study.

Hypothesis 19.2 suggests that older person's frequency of interactions with formal socialization agents during his or her developmental years have a positive effect on his or her (a) engagement in effectual financial skills and habits, (b) employment of desirable skills and habits, (c) engagement in preventive healthcare habits, (d) strength of spiritual values and habits, (e) engagement in effectual work or homecare habits, (f) engagement in shopping skills spending habits, and (g) employment of planning skills and habits during adulthood years. As shown in Table 5.10 column 3, older person's interactions with formal socialization agents during his or her developmental years have significant positive effects on skills and habits including engagement in effectual financial skills and habits (r = .162, p < 0.001); engagement in preventive healthcare habits (r = .099, p < 0.01); engagement in shopping skills and spending money habits (r = .059, p < 0.05); and employment of planning skills and habits (r = .167, p < 0.001). Yet, older person's interactions with formal socialization agents during his or her developmental years have no significant positive effect on skills and habits including employment of desirable social skills and habits (r = -.023, p = 0.259, ns); strength of spiritual values and habits (r = .022, p = .025, p = .00.271, ns); and engagement in effectual work or homecare habits (r = .032, p = 0.185, ns). Thus, hypothesis 19.2 is partially supported in this study.

Hypothesis 19.3 suggests that older person's frequency of interactions with commercial socialization agents during his or her developmental years have a positive effect on his or her (a) engagement in effectual financial skills and habits, (b) employment of desirable skills and habits, (c) engagement in preventive healthcare habits, (d) strength of spiritual values and habits, (e) engagement in effectual work or

homecare habits, (f) engagement in shopping skills spending habits, and (g) employment of planning skills and habits during adulthood years. As shown in Table 5.10 column 4, older person's interactions with commercial socialization agents during his or her developmental years have significant positive effects on skills and habits including engagement in effectual financial skills and habits (r = .173, p < 0.001); employment of desirable social skills and habits (r = .120, p < 0.001); engagement in preventive healthcare habits (r = .146, p < 0.001); strength of spiritual values and habits (r = .177, p < 0.001); and employment of planning skills and habits (r = .115, p < 0.01). Yet, older person's interactions with commercial socialization agents during his or her developmental years have no significant positive effect on skills and habits including engagement in effectual work or homecare habits (r = .000, p = 0.497, ns) and engagement in shopping skills and spending money habits (r = .035, p = 0.159, ns). Thus, hypothesis 19.3 is partially supported in this study.

5.7.3 Correlations between early developmental factors and coping strategies

Hypotheses in set 4 assume a relationship between early developmental factors (informal, formal, and commercial socialization) and early life experiences (problem-focused and emotion-focused coping strategies). These hypotheses are examined by a partial correlation, where the researcher measures the strengths and directions of linear relationships between each early developmental factor and each early life experience whilst controlling for the effects of normative adaptation strategy, human capital development, personal control, SES, and social desirability. The results are shown in the next page:

Table 5.11 Results of partial correlations between early developmental factors and coning strategies

| | Early developmental factors | | | |
|-----------------------------------|-----------------------------|--------|------------|--|
| Coping strategies | Informal | Formal | Commercial | |
| Problem-focused coping strategies | .081* | .002 | .206*** | |
| Emotion-focused coping strategies | 085* | 045 | 106** | |

p < 0.05, p < 0.01, p < 0.01

Note: the table entries include partial correlation and significance level (1-tail), controlling for normative adaptation strategy, human capital development, personal control, SES, and social desirability.

5.7.4 Hypothesis testing for the effects of early developmental factors on early life experiences in coping strategies

Hypothesis 20.1 suggests that an older person's frequency of interactions with informal socialization agents during his or her developmental years are (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during adulthood years. As shown in Table 5.11 column 2, older person's interactions with informal socialization agents during his or her developmental years are significantly and positively associated with the use of problem-focused coping strategies (r = .081, p < 0.05); while older person's interactions with informal socialization agents during his or her developmental years are significantly and negatively associated with the use of emotion-focused coping strategies in handling major life changes during adulthood years (r = -.085, p < 0.05). Thus, hypothesis 20.1 is fully supported in this study.

Hypothesis 20.2 suggests that older person's frequency of interactions with formal socialization agents during his or her developmental years are (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during adulthood years. As shown in Table 5.11 column 3, older person's interactions with formal socialization agents during his or her developmental years are not significantly and positively associated with the use of problem-focused coping strategies (r = .002, p = 0.447, ns); while older person's interactions with formal socialization agents during his or her developmental years are not significantly and negatively associated with the use of emotion-focused coping strategies in handling major life changes during adulthood years (r = -.045, p = 0.146). Thus, hypothesis 20.1 is not supported in this study.

Hypothesis 20.3 suggests that older person's frequency of interactions with commercial socialization agents during his or her developmental years are (a) positively associated with the use of problem-focused coping strategies and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during adulthood years. As shown in Table 5.11 column 4, older person's interactions with commercial socialization agents during his or her developmental years are significantly and positively associated with the use of problem-focused coping strategies (r = .206, p < 0.001); while older person's interactions with commercial socialization agents during his or her developmental years are significantly and negatively associated with the use of emotion-focused coping strategies in handling major life changes during adulthood years (r = .106, p < 0.01). Thus, hypothesis 20.3 is fully supported in this study.

5.8 The Effects of Timing and Time

According to the fifth set of hypotheses, a partial correlation is conducted to measure the degree of association (r) between two variables (timing and time and skills and habits), with the effect set of controlling variables that are hypothesized to correlate with skills and habits removed to avoid confounding effects. Then, a moderator analysis is conducted to test durations in each type of skills and habits moderate the relationship between each type of skills and habits and each well-being domain.

5.8.1 Correlations between timing and time and early life experiences (skills and habits)

Hypotheses in set 5a assume a negative relationship between ages and skills and habits as well as a positive relationship between durations and skills and habits. These hypotheses are examined by partial correlations, where the researcher measures the strengths and directions of linear relationships between each specific

type of skills and habits and each age and duration in the specific type of skills and habits whilst controlling for the effects of social desirability, early developmental factors, and personal control. The results are shown below:

Table 5.12 Results of partial correlations between timing and time and skills and habits

| Skills and Habits | Ages (timing) | Duration (time) |
|---|-------------------|-----------------|
| Effectual financial skills and habits | 467*** | .500*** |
| Desirable social skills and habits | 419*** | .399*** |
| Preventive healthcare habits | 515*** | .618*** |
| Spiritual values and habits | 109** | .101** |
| Effectual work and homecare habits | .056 ^m | .108** |
| Shopping skills and spending money habits | 546*** | .608*** |
| Planning skills and habits | -581*** | .602*** |

^{*}p < 0.05, **p < 0.01, ***p < 0.001

Note: the table entries include partial correlation and significance level (1-tail), controlling for social desirability, early developmental factors, and personal control.

5.8.2 Hypothesis testing for the effects of timing and time on early life experiences (skills and habits)

Hypothesis 21.1 purposes that an aging person's level of engagement in effectual financial skills and habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits. Hypothesis 21.1, which expected (a) a negative relationship between timing (younger age start) and engagement in effectual financial skills and habits as well as (b) a positive relationship between time (longer duration) and engagement in effectual financial skills and habits. As shown in table 5.12, aging person's level of engagement in effectual financial skills and habits during his or her adult life is significantly and positively associated with both (a) the earlier than later timing of the onset (r = -.467, p < 0.001) and (b) longer than shorter duration of these habits (r =.500, p < 0.001). Thus, hypothesis 21.1 is fully supported in this study.

Hypothesis 21.2 purposes that an aging person's level of employment of desirable social skills and habits during his or her adult life is positively associated

^mp = marginally significant

with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits. Hypothesis 21.2, which expected (a) a negative relationship between timing (younger age start) and employment of desirable social skills and habits as well as (b) a positive relationship between time (longer duration) and employment of desirable social skills and habits. As shown in table 5.12, aging person's level of employment of desirable social skills and habits during his or her adult life is significantly and positively associated with both (a) the earlier than later timing of the onset (r = -.419, p < 0.001) and (b) longer than shorter duration of these habits (r = .399, p < 0.001). Thus, hypothesis 21.2 is fully supported in this study.

Hypothesis 21.3 purposes that an aging person's level of engagement in preventive healthcare habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits. Hypothesis 21.3, which expected (a) a negative relationship between timing (younger age start) and engagement in preventive healthcare habits as well as (b) a positive relationship between time (longer duration) and engagement in preventive healthcare habits. As shown in table 5.12, aging person's level of engagement in preventive healthcare habits during his or her adult life is significantly and positively associated with both (a) the earlier than later timing of the onset (r = .515, p < 0.001) and (b) longer than shorter duration of these habits (r = .618, p < 0.001). Thus, hypothesis 21.3 is fully supported in this study.

Hypothesis 21.4 purposes that an aging person's strength of spiritual values and habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits. Hypothesis 21.4, which expected (a) a negative relationship between timing (younger age start) and strength of spiritual values and habits as well as (b) a positive relationship between time (longer duration) and strength of spiritual values and habits. As shown in table 5.12, aging person's level of strength of spiritual values and habits during his or her adult life is significantly and positively associated with both (a) the earlier than later timing of the onset (r = -.109, p < 0.01) and (b) longer than shorter duration of these habits (r = .101, p < 0.01). Thus, hypothesis 21.4 is fully supported in this study.

Hypothesis 21.5 purposes that an aging person's level of engagement in effectual work or home-care habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits. Hypothesis 21.5, which expected (a) a negative relationship between timing (younger age start) and engagement in effectual work or home-care habits as well as (b) a positive relationship between time (longer duration) and engagement in effectual work or home-care habits. As shown in table 5.12, aging person's level of engagement in effectual work or home-care habits during his or her adult life is positively and marginally significant associated with (a) the earlier than later timing of the onset (r = .056, p = 0.056); whereas aging person's level of engagement in effectual work or home-care habits during his or her adult life is significantly and positively associated with (b) longer than shorter duration of these habits (r = .108, p < ...0.01). Thus, hypothesis 21.5 is fully supported in this study.

Hypothesis 21.6 purposes that an aging person's level of engagement in shopping skills and spending money habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits. Hypothesis 21.6, which expected (a) a negative relationship between timing (younger age start) and engagement in shopping skills and spending money habits as well as (b) a positive relationship between time (longer duration) and engagement in shopping skills and spending money habits. As shown in table 5.12, aging person's level of engagement in shopping skills and spending money habits during his or her adult life is significantly and positively associated with both (a) the earlier than later timing of the onset (r = -.546, p < 0.001) and (b) longer than shorter duration of these habits (r = .608, p < 0.001). Thus, hypothesis 21.6 is fully supported in this study.

Hypothesis 21.7 purposes that an aging person's level of employment of planning skills and habits during his or her adult life is positively associated with the (a) earlier than later timing of the onset and (b) longer than shorter duration of these habits. Hypothesis 21.7, which expected (a) a negative relationship between timing (younger age start) and employment of planning skills and habits as well as (b) a positive relationship between time (longer duration) and employment of planning skills and habits. As shown in table 5.12, aging person's level of employment of planning skills and habits during his or her adult life is significantly and positively associated with both (a) the earlier than later timing of the onset (r = -.581, p < 0.001) and (b) longer than shorter duration of these habits (r = .602, p < 0.001). Thus, hypothesis 21.7 is fully supported in this study.

5.8.3 The moderation effects of timing on the relationship between skills and habits and well-being domains

Hypotheses in set 5b assume that timing in a specific type of skills and habits moderates the relationship between each type of skills and habits and each well-being domain. These hypotheses are examined by hierarchical multiple regression analysis, where the researcher test whether timing as potential moderators affect the strength of the relationship between skills and habits and well-being domains by enhancing the influence of the skills and habits. In the first step, Model 1 is built by adding each type of skills and habits to check whether it can predict each well-being domain. In the second step, two variables (each type of skills and habits, and timing) are included in the regression Model 2 to check whether the models are significant and whether the amount of variance accounted for in Model 2 (with timing variable) is significantly more than Model 1 (without timing variable).

To avoid potentially problematic high multicollinearity with the interaction term, the variables were centered and an interaction term between each type of skills and habits, and timing is created (Aiken and West, 1991).

Next, the interaction term is added to the regression model to check whether the models are significant and whether the amount of variance accounted for in Model 3 (with the interaction) is significantly more than Model 2 (without the interaction). The results are shown in the next page:

Table 5.13 Results of the moderating effects of timing on the relationship between skills and habits and well-being domains

| Well-being | Step | Variable | Unstandardized | Standardized | R2 | R2 |
|---------------|---------|-----------------------|----------------|------------------------|---------|---------|
| domains | - | | coefficients | coefficients | | Change |
| Financial | 1 | Financial Skills (FS) | .358 | .454*** | .206*** | .206*** |
| satisfaction | | | | | | |
| | 2 | Financial Skills (FS) | .306 | .388*** | 216*** | .0.10** |
| | | Financial Age (FA) | 005 | 121** | | |
| | 3 | Financial Skills (FS) | .275 | .349** | 216*** | .000 |
| | | Financial Age (FA) | 007 | 123** | | |
| | | FS x FA | .001 | .010 | | |
| Financial | 1 | Financial Skills (FS) | 1.119 | .465*** | .216*** | .216*** |
| solvency | | | | | | |
| | 2 | Financial Skills (FS) | .823 | 342*** | .253*** | .037*** |
| | | Financial Age (FA) | 29 | 229*** | | |
| | 3 | Financial Skills (FS) | .799 | .332*** | 279*** | .026*** |
| | | Financial Age (FA) | 025 | 2 <mark>02*</mark> ** | | |
| | | FS x FA | -269 | 16 <mark>4**</mark> * | | |
| Perceived | 1 | Social Skills (SS) | .327 | .400 <mark>**</mark> * | .160*** | .160*** |
| social | 2 | Social Skills (SS) | .268 | .32 <mark>7**</mark> * | .179*** | .020*** |
| support | | Social Age (SA) | 006 | 158*** | | |
| | 3 | Social Skills (SS) | .233 | .285*** | .192*** | .013*** |
| | | Social Age (SA) | 005 | 127** | | |
| | | SS x SA | .059 | .130*** | | |
| Enactment | 1 | Social Skills (SS) | .402 | .422*** | .178*** | .178*** |
| of social | 2 | Social Skills (SS) | .332 | .348*** | .197*** | .020*** |
| roles | | | | | | |
| | | Social Age (SA) | 007 | 161*** | | |
| | 3 | Social Skills (SS) | 298 | .313*** | .205*** | .009** |
| | | Social Age (SA) | 006 | 134*** | | |
| | | SS x SA | .059 | .111** | | |
| Self- | 1 | Healthcare Habits | .240 | .357*** | .128*** | .128*** |
| reported | | (HH) | | | | |
| health | | | | | | |
| | 2 | Healthcare Habits | .193 | .286*** | .135*** | .008** |
| | | (HH) | | | | |
| | | Healthcare Age (HA) | -004 | 114** | .154*** | .019*** |
| *p < 0.05, ** | p < 0.0 | 1, ***p < 0.001 | | | | |

Table 5.13 Results of the moderating effects of timing on the relationship between skills and habits and well-being domains (cont.)

| Well-being | Step | Variable | Unstandardized | Standardized | R2 | R2 |
|-----------------------------------|-------|-----------------------|----------------|-------------------|---------|---------|
| domains | | | coefficients | coefficients | | Change |
| Self- | 3 | Healthcare Habits | .209 | .311*** | | |
| reported | | (HH) | | | | |
| health | | | | | | |
| | | Healthcare Age (HA) | 004 | 130* | | |
| | | НН х НА | 076 | 138*** | | |
| Number of | 1 | Healthcare Habits | 101 | 080* | .006* | .006* |
| ailments | | (HH) | | | | |
| | 2 | Healthcare Habits | .043 | .034 | .027*** | .021*** |
| | | (HH) | | | | |
| | | Healthcare Age (HA) | .013 | .184*** | | |
| | 3 | Healthcare Habits | .101 | .080 ^m | .094*** | .067*** |
| | | (HH) | | | | |
| | | Healthcare Age (HA) | .015 | .204*** | 11 | |
| | | НН х НА | 270 | 262*** | | |
| Spirituality /religiosity | 1 | Spiritual Values (SV) | 010 | 010 | .000 | .000 |
| | 2 | Spiritual Values (SV) | 092 | 086* | .144*** | .146*** |
| | 1// 3 | Spiritual Age (SVA) | 020 | 390*** | | |
| | 3 | Spiritual Values (SV) | -069 | 065 ^m | .147*** | .004* |
| | | Spiritual Age (SVA) | 019 | 382*** | | |
| | | SV x SVA | 057 | 070* | | |
| Praying and altruistic activities | 1 | Spiritual Values (SV) | .082 | .110** | .012** | .012** |
| acti vities | 2 | Spiritual Values (SV) | .029 | .038 | .140*** | .128*** |
| | | Spiritual Age (SVA) | 013 | 364*** | .141*** | .001 |
| | 3 | Spiritual Values (SV) | .038 | .051 | | |
| | | Spiritual Age (SVA) | 013 | 360*** | | |
| | | SV x SVA | 023 | 0.040 | | |

p < 0.05, p < 0.01, p < 0.00

Table 5.13 Results of the moderating effects of timing on the relationship between skills and habits and well-being domains (cont.)

| Well-being | Step | Variable | Unstandardized | Standardized | R2 | R2 |
|----------------------------|----------|----------------------|----------------|--------------|---------|---------|
| domains | | | coefficients | coefficients | | Change |
| Occupation al satisfaction | 1 | Work Skills (WS) | .105 | .149*** | .022*** | .022*** |
| | 2 | Work Skills (WS) | .104 | .149*** | .039*** | .016*** |
| | | Work Age (WA) | 006 | 128*** | | |
| | 3 | Work Skills (WS) | .103 | .147*** | .039*** | .000 |
| | | Work Age (WA) | 006 | 128*** | | |
| | | WS x WA | 011 | 015 | | |
| Occupation | 1 | Work Skills (WS) | .104 | .147*** | .022*** | .022*** |
| al role enactment | | | | | | |
| | 2 | Work Skills (WS) | .104 | .147*** | .030*** | .010** |
| | 3 | Shopping Habits (SH) | .096 | .096* | .081*** | .006* |
| | | Shopping Age (SHA) | 008 | 186*** | | |
| | | SH x SHA | 051 | 083* | // | |
| Leisure activities | 1 | Shopping Habits (SH) | .195 | .226*** | .050*** | .051*** |
| | 2 | Shopping Habits (SH) | .105 | .122** | .074*** | .026*** |
| | | Shopping Age (SHA) | 007 | 191*** | | |
| | 3 | Shopping Habits (SH) | .092 | .107** | .082*** | .009** |
| | | Shopping Age (SHA) | 006 | 167*** | | |
| | | SH x SHA | 053 | 100** | | |
| Accomplis hments | 1 | Planning Skills (PS) | .344 | .447*** | .199*** | .199*** |
| | 2 | Planning Skills (PS) | .234 | .304*** | .232*** | .034*** |
| | | Planning Age (PA) | 008 | 234*** | | |
| | 3 | Planning Skills (PS) | .249 | .324*** | .236*** | .005* |
| | | Planning Age (PA) | 008 | 229*** | | |
| | | PS x PA | 042 | 073* | | |
| *p < 0.05, ** | *p < 0.0 | 1, ***p < 0.001 | | | | |

5.8.4 Hypothesis testing for the moderating effects of timing on the relationship between skills and habits and well-being domains

Hypothesis 22.1 purposes that timing moderates the relationships between the aging person's level of engagement in financial skills and habits during adulthood years and one's present level of (a) financial satisfaction and (b) level of financial solvency, so that an earlier timing of onset of such skills and habits leads to stronger positive relationships.

To test the hypothesis 22.1a, an effectual financial skills and habits variable is included to build Model 1 as shown in table 5.13, which accounts for a significant amount of variance in the level of financial satisfaction ($R^2 = .206$, F (1, 802) = 207.689, p < 0.001). Since the first model is significant, effectual financial skills and habits, and timing of onset of financial skills and habits are included in Model 2. These variables account for a significant amount of more variance in level of financial satisfaction ($\Delta R^2 = .010$, ΔF (1, 801) = 10.713, p < 0.01). Next, the interaction term between effectual financial skills and habits, and timing of onset of financial skills and habits is added to the regression Model 3, which does not account significant more variance than just effectual financial skills and habits, and timing of onset of financial skills and habits by themselves ($\Delta R^2 = 0.000$, ΔF (1, 800) = .103, p = 0.749, ns). Thus, there is no potentially significant moderation between effectual financial skills and habits, and timing of onset of financial skills and habits on the level of financial satisfaction.

To test the hypothesis 22.1b, an effectual financial skills and habits variable is included to build Model 1 as shown in table 5.13, which accounts for a significant amount of variance in the level of financial solvency ($R^2 = .216$, F(1, 802) = 221.108, p < 0.001). Since the first model is significant, effectual financial skills and habits, and timing of onset of financial skills and habits are included in Model 2. These variables account for a significant amount of more variance in level of financial solvency ($\Delta R^2 = .037$, $\Delta F(1, 801) = 39.843$, p < 0.001). Next, the interaction term between effectual financial skills and habits, and timing of onset of financial skills and habits is added to the regression Model 3, which account significant more variance than just effectual financial skills and habits, and timing of onset of financial skills and habits by themselves ($\Delta R^2 = 0.026$, $\Delta R^2(1, 800) = 39.843$, p < 0.001), indicating that

there is a potentially significant moderation between effectual financial skills and habits, and timing of onset of financial skills and habits on level of financial solvency. Since there is a potentially significant effect, the researcher further runs the regression on the centered terms to examine the effect by using PROCESS, by Andrew F. Hayes. Examination of the interaction plot shows an enhancing effect (b = -.269, t (800) = -.269)5.338, p < .001) that as a person's level of effectual financial skills and habits increase and age start of engagement in effectual financial skills and habits is younger during adulthood years, a person's present level of financial solvency increase. At low level effectual financial effectual skills and habits, a person's level of financial solvency is similar for younger, average, or older age of start of effectual financial skills and habits. A person with a high level of effectual financial skills and habits with a younger age of onset of such skills and habits has the highest level of financial solvency [See Appendix D1].

In conclusion, hypothesis 22.1 is partially supported since timing only moderates the relationships between the aging person's level of engagement in financial skills and habits during adulthood years and one's present level of financial solvency, so that an earlier timing of onset of such skills and habits leads to stronger positive relationships.

Hypothesis 22.2 purposes that timing moderates the relationships between the aging person's level of employment if desirable social skills and habits during adulthood years and one's present level of (a) perceived social skills and habits and (b) enactment of social roles, so that an earlier timing of onset of such skills and habits leads to stronger positive relationships.

To test the hypothesis 22.2a, a desirable social skills and habits variable is included to build Model 1 as shown in table 5.13, which accounts for a significant amount of variance in the level of perceived social support $(R^2 = .160, F(1, 802) =$ 152.500, p < 0.001). Since the first model is significant, desirable social skills and habits, and timing of onset of social skills and habits are included in Model 2. These variables account for a significant amount of more variance in perceived social support $(\Delta R^2 = .020, \Delta F (1, 801) = 19.229, p < 0.001)$. Next, the interaction term between desirable social skills and habits, and timing of onset of social skills and habits is added to the regression Model 3, which account significant more variance than just

desirable social skills and habits, and timing of onset of social skills and habits by themselves ($\Delta R^2 = 0.013$, ΔF (1, 801) = 12.899, p < .001), indicating that there is a potentially significant moderation between desirable social skills and habits, and timing of onset of social skills and habits on perceived social support. Since there is a potentially significant effect, the researcher further runs the regression on the centered terms to examine the effect by using PROCESS, by Andrew F. Hayes. Examination of the interaction plot shows buffering interactions (b = .059, t (800) = 3.592, p < .001), in which timing weakens the effect of desirable social skills and habits on a person's present level of perceived social support. Therefore, hypothesis 22.2a is not supported in this study [See Appendix D2].

To test the hypothesis 22.2b, a desirable social skills and habits variable is included to build Model 1 as shown in table 5.13, which accounts for a significant amount of variance in the level of enactment of social roles $(R^2 = .178, F(1, 802) =$ 173.824, p < 0.001). Since the first model is significant, desirable social skills and habits, and timing of onset of social skills and habits are included in Model 2. These variables as Model 2 account for a significant amount of more variance in level of enactment of social roles ($\Delta R^2 = .020, \Delta F$ (1, 801) = 20.455, p < 0.001). Next, the interaction term between desirable social skills and habits, and timing of onset of social skills and habits is added to the regression Model 3, which account significant more variance than just desirable social skills and habits, and timing of onset of social skills and habits by themselves ($\Delta R^2 = 0.009$, ΔF (1, 800) = 9.538, p < 0.01), indicating that there is a potentially significant moderation between desirable social skills and habits, and timing of onset of social skills and habits on the level of enactment of social roles. Since there is a potentially significant effect, the researcher further runs the regression on the centered terms to examine the effect by using PROCESS, by Andrew F. Hayes. Examination of the interaction plot shows buffering interactions (b) = .059, t(800) = 3.088, p < .01), in which timing weakens the effect of desirable social skills and habits on a person's present level of enactment of social roles [See Appendix D3]. Therefore, hypothesis 22.2b is not supported in this study.

In conclusion, hypothesis 22.2 is not supported since timing moderates the relationships between the aging person's level of employment of desirable social skills

and habits during adulthood years and one's present level of (a) perceived social support and (b) enactment of social roles, but an earlier timing of onset of such skills and habits does not lead to stronger positive relationships in this study.

Hypothesis 22.3 purposes that timing moderates the relationships between the aging person's level of engagement in preventive healthcare habits during adulthood years and one's (a) present level of self-reported health, so that an earlier timing of onset of such skills and habits leads to stronger positive relationship; and (b) the number of ailments, so that an earlier timing of onset of such skills and habits leads to stronger negative relationship.

To test the hypothesis 22.3a, an engagement in preventive healthcare habits variable is included to build Model 1 as shown in table 5.13, which accounts for a significant amount of variance in the level of self-reported health ($R^2 = .128$, F (1, 802) = 117.199, p < 0.001). Since the first model is significant, engagement in preventive healthcare habits and timing of onset of preventive habits are included in Model 2. These variables account for a significant amount of more variance in level of self-reported health ($\Delta R^2 = .008$, ΔF (1, 801) = 7.381, p < 0.01). Next, the interaction term between preventive healthcare habits and timing of onset of preventive healthcare habits is added to the regression Model 3, which account significant more variance than just preventive healthcare habits, and timing of onset of preventive healthcare habits by themselves ($\Delta R^2 = 0.019$, ΔF (1, 800) = 17.644, p < 0.001), indicating that there is a potentially significant moderation between preventive healthcare habits and timing of onset of preventive healthcare habits on level of self-reported health. Since there is a potentially significant effect, the researcher further runs the regression on the centered terms to examine the effect by using PROCESS, by Andrew F. Hayes. Examination of the interaction plot shows an enhancing effect (b = -.076, t (800) = -4.201, p < .001) that as a person's level of employment in preventive healthcare habits increase and age start of employment in preventive healthcare habits is younger during adulthood years, a person's present level of self-reported health increase. At low-level preventive healthcare habits, a person's level of self-reported health is almost similar for younger, average, or older age of start of preventive healthcare habits. A person with a high level of employment in preventive healthcare habits with younger age of onset of such skills and habits has the highest level of self-reported health [See Appendix D4].

To test the hypothesis 22.3b, an engagement in preventive healthcare habits variable is included to build Model 1 as shown in table 5.13, which accounts for a significant amount of variance in the number of ailments ($R^2 = .006$, F(1, 802) =5.178, p < 0.05). Since the first model is significant, engagement in preventive healthcare habits and timing of onset of preventive habits are included in Model 2. These variables account for a significant amount of more variance in number of ailments ($\Delta R^2 = .021$, ΔF (1, 801) = 17.044, p < 0.001). However, engagement in preventive healthcare habits variable becomes insignificant to predict a person's number of ailments (p > 0.05). Next, the interaction term between preventive healthcare habits and timing of onset of preventive healthcare habits is added to the regression Model 3, which account significant more variance than just preventive healthcare habits, and timing of onset of preventive healthcare habits by themselves $(\Delta R^2 = 0.067, \Delta F (1, 800) = 59.512, p < 0.001)$. But, an engagement in preventive healthcare habits variable is marginally significant to predict a person's number of ailments (p = 0.064). Since there is a potentially significant effect, the researcher further runs the regression on the centered terms to examine the effect by using PROCESS, by Andrew F. Hayes. Examination of the interaction plot shows buffering interactions (b = -.270, t(800) = -7.714, p < .001), in which timing weakens the effect of employment in preventive healthcare habits on a person's present number of ailments [See Appendix D5]. Therefore, hypothesis 22.3b is not supported in this study.

In conclusion, hypothesis 22.3 is partially supported since timing only moderates the relationships between the aging person's level of engagement in preventive healthcare habits during adulthood years and one's present level of self-reported health so that an earlier timing of onset of such skills and habits leads to stronger positive relationships.

Hypothesis 22.4 purposes that timing moderates the relationships between the aging strength of spiritual values and habits during adulthood years and one's present level of (a) spirituality/religiosity and (b) praying and altruistic activities,

so that an earlier timing of onset of such skills and habits leads to stronger positive relationships.

To test the hypothesis 22.4a, the strength of spiritual values and habits variable is included to build Model 1 as shown in table 5.13, which accounts for an insignificant amount of variance in the level of spirituality/religiosity ($R^2 = .000$, F(1,802) = .076, p > 0.05). Although the first model is not significant, the strength of spiritual values and habits, and timing of strength of spiritual values and habits are included in Model 2. A strength of spiritual values and habits variable becomes significant in this model (p < 0.05) and timing of strength of spiritual values and habits are significant as well (p < 0.001). These variables account for a significant amount of more variance in level of spirituality/religiosity ($\Delta R^2 = .146$, ΔF (1, 801) = 137.030, p < 0.001). Next, the interaction term between the strength of spiritual values and habits, and timing of onset of the strength of spiritual values and habits is added to the regression Model 3, which account significant more variance than just strength of spiritual values and habits, and timing of spiritual values and habits by themselves $(\Delta R^2 = 0.004, \Delta F (1, 800) = 4.237, p < 0.05)$. In addition, a strength of spiritual values variable becomes insignificant to predict a person's level of spirituality/religiosity (p =0.064), indicating that there is a marginally significant moderation between the strength of spiritual values and habits and timing of onset of spiritual values and habits on level of spirituality/religiosity. Since there is a marginally significant effect, the researcher further runs the regression on the centered terms to examine the effect by using PROCESS, by Andrew F. Hayes. Examination of the interaction plot shows an enhancing effect (b = -.070, t(800) = -2.058, p < .05) that as a person's strength of spiritual values and habits increase and age start of spiritual values and habits is younger during adulthood years, a person's present level of spiritual/religiosity increase. At low strength of spiritual values and habits, a person's level of spirituality/religiosity is less different for younger, average, or older age of start of preventive healthcare habits than at the high level of strength of spiritual values and habits. A person with high strength of spiritual values and habits with a younger age of onset of such skills and habits has the highest level of spirituality/religiosity [See Appendix D6].

To test the hypothesis 22.4b, a strength of spiritual values and habits variable is included to build Model 1 as shown in table 5.13, which accounts for a significant amount of variance in the level of praying and altruistic activities (R^2 = .012, F(1, 802) = 9.817, p < 0.01). Since the first model is significant, the strength of spiritual values and habits, and the timing of strength of spiritual values and habits are included in Model 2. These variables account for a significant amount of more variance in level of spirituality/religiosity ($\Delta R^2 = .128$, F (1, 801) = 118.941, p < 0.001). But, the strength of spiritual values becomes insignificant to predict a person's level of spirituality/religiosity (p = 0.250, ns). Next, the interaction term between the strength of spiritual values and habits, and timing of onset of the strength of spiritual values and habits is added to the regression Model 3, which account insignificant more variance than just strength of spiritual values and habits, and timing of strength of spiritual values and habits by themselves $(\Delta R^2 = 0.001, F(1, 800) = 1.356, p = 0.245,$ ns). Thus, there is no potentially significant moderation between the strength of spiritual values and habits and timing of onset of the strength of spiritual values and habits on the level of praying and altruistic activities.

In conclusion, hypothesis 22.4 is not supported since timing does not significantly moderate the relationships between the aging strength of spiritual values and habits during adulthood years and one's present level of (a) spirituality/religiosity and (b) praying and altruistic activities in this study.

Hypothesis 22.5 purposes that timing moderates the relationships between the aging person's level of engagement in effectual work or home-care habits during adulthood years and one's present level of (a) occupational satisfaction and (b) occupational role enactment, so that a longer duration of such skills and habits leads to stronger positive relationships.

To test the hypothesis 22.5a, an engagement of effectual work or home-care habits variable is included to build Model 1 as shown in table 5.13, which accounts for a significant amount of variance in the level of occupational satisfaction $(R^2 = .022, F(1, 802) = 18.167, p < 0.001)$. Since the first model is significant, engagement of effectual work or home-care habits and timing of engagement of effectual work or home-care habits are included in Model 2. These variables account for a significant amount of more variance in level of occupational satisfaction $(\Delta R^2 =$

.016, ΔF (1, 801) = 13.681, p < 0.001). Next, the interaction term between the engagement of effectual work or home-care habits, and timing of onset of the strength of engagement of effectual work or home-care habits is added to the regression Model 3, which account insignificant more variance than just engagement of effectual work or home-care habits, and timing of strength of engagement of effectual work or homecare habits by themselves ($\Delta R^2 = 0.000$, ΔF (1, 800) = .186, p = 0.380, ns). Thus, there is no potentially significant moderation between the engagement of effectual work or home-care habits and timing of onset of engagement of effectual work or home-care habits on the level of occupational satisfaction.

To test the hypothesis 22.5b, an engagement of effectual work or homecare habits variable is included to build Model 1 as shown in table 5.13, which accounts for a significant amount of variance in the level of occupational enactment $(R^2 = .022, F(1, 802) = 17.724, p < 0.001)$. Since the first model is significant, engagement of effectual work or home-care habits and timing of engagement of effectual work or home-care habits are included in Model 2. These variables account for a significant amount of more variance in level of occupational enactment (ΔR^2 = .010, ΔF (1, 801) = 8.599, p < 0.01). Next, the interaction term between the engagement of effectual work or home-care habits, and timing of onset of the strength of engagement of effectual work or home-care habits is added to the regression Model 3, which account insignificant more variance than just engagement of effectual work or home-care habits, and timing of strength of engagement of effectual work or homecare habits by themselves ($\Delta R^2 = 0.000$, ΔF (1, 800) = 0.004, p = 0.520, ns). Thus, there is no potentially significant moderation between the engagement of effectual work or home-care habits and timing of onset of engagement of effectual work or home-care habits on the level of occupational enactment.

In conclusion, hypothesis 22.5 is not supported since timing does not significantly moderate the relationships between the aging person's level of engagement in effectual work or home-care habits during adulthood years and one's present level of (a) occupational satisfaction and (b) occupational role enactment in this study.

Hypothesis 22.6 purposes that timing moderates the relationships between the aging person's level of engagement in shopping skills and spending habits during adulthood years and one's present level of (a) material satisfaction and (b) leisure activities, so that an earlier timing of onset of such skills and habits leads to stronger positive relationships.

To test the hypothesis 22.6a, an engagement in shopping skills and spending habits variable is included to build Model 1 as shown in table 5.13, which accounts for a significant amount of variance in the level of material satisfaction (R^2 = .049, F(1, 802) = 41.112, p < 0.001). Since the first model is significant, engagement in shopping skills and spending habits, and timing of onset of engagement in shopping skills and spending habits are included in Model 2. These variables account for a significant amount of more variance in level of material satisfaction ($\Delta R^2 = .030$, ΔF (1, 801) = 25.992, p < 0.001). Next, the interaction term between engagement in shopping skills and spending habits, and timing of onset of engagement in shopping skills and spending habits is added to the regression Model 3, which account significant more variance than just engagement in shopping skills and spending habits, and timing of onset of engagement in shopping skills and spending habits by themselves $(\Delta R^2 = 0.006, \Delta F (1, 800) = 5.285, p < 0.05)$, indicating that there is a potentially significant moderation between engagement in shopping skills and spending habits and timing of onset of engagement in shopping skills and spending habits on level of material satisfaction. Since there is a potentially significant effect, the researcher further runs the regression on the centered terms to examine the effect by using PROCESS, by Andrew F. Hayes. Examination of the interaction plot shows an enhancing effect (b = -.051, t (800) = -.083, p < .05) that as a person's level of engagement in shopping skills and spending habits increase and age start of engagement in shopping skills and spending habits is younger during adulthood years, a person's present level of material satisfaction increase. At low-level engagement in shopping skills and spending habits, a person's level of material satisfaction is less different for younger, average, or older age of start of engagement in shopping skills and spending habits than at high-level engagement in shopping skills and spending habits. A person with a high level of engagement in shopping skills and spending

habits with a younger age of onset of such skills and habits has the highest level of material satisfaction [See Appendix D7].

To test the hypothesis 22.6b, an engagement in shopping skills and spending habits variable is included to build Model 1 as shown in table 5.13, which accounts for a significant amount of variance in the level of leisure activities (R^2 = .051, F(1, 802) = 43.049, p < 0.001). Since the first model is significant, engagement in shopping skills and spending habits, and timing of onset of engagement in shopping skills and spending habits are included in Model 2. These variables account for a significant amount of more variance in level of leisure activities ($\Delta R^2 = .026$, ΔF (1, 801) = 22.236, p < 0.001). Next, the interaction term between engagement in shopping skills and spending habits, and timing of onset of engagement in shopping skills and spending habits is added to the regression Model 3, which account significant more variance than just engagement in shopping skills and spending habits, and timing of onset of engagement in shopping skills and spending habits by themselves (ΔR^2 = 0.009, ΔF (1, 800) = 7.661, p < 0.01), indicating that there is a potentially significant moderation between engagement in shopping skills and spending habits and timing of onset of engagement in shopping skills and spending habits on level of leisure activities. Since there is a potentially significant effect, the researcher further runs the regression on the centered terms to examine the effect by using PROCESS, by Andrew F. Hayes. Examination of the interaction plot shows an enhancing effect (b = -.053, t (800) = -.100, p < .01) that as a person's level of engagement in shopping skills and spending habits increase and age start of engagement in shopping skills and spending habits is younger during adulthood years, a person's present level of leisure activities increases. At low-level engagement in shopping skills and spending habits, a person's level of leisure activities is less different for younger, average, or older age of start of engagement in shopping skills and spending habits than at high-level engagement in shopping skills and spending habits. A person with a high level of engagement in shopping skills and spending habits with younger age of onset of such skills and habits has the highest level of leisure activities [See Appendix D8].

In conclusion, hypothesis 22.6 is fully supported since timing significantly moderates the relationships between the aging person's level of engagement in shopping skills and spending habits during adulthood years and one's present level of (a) material satisfaction and (b) leisure activities, so that an earlier timing of onset of such skills and habits leads to stronger positive relationships in this study.

Hypothesis 22.7 purposes that timing moderates the relationships between the aging person's level of employment of planning skills and habits during adulthood years and one's present favorability of cognitions about one's accomplishments, a longer duration of such skills and habits leads to stronger positive relationships.

To test the hypothesis 22.7, employment of planning skills and habits variable is included to build Model 1 as shown in table 5.13, which accounts for a significant amount of variance in the level of leisure activities ($R^2 = .199$, F(1, 802) =199.780, p < 0.001). Since the first model is significant, the employment of planning skills and habits, and timing of onset of employment of planning skills and habits are included in Model 2. These variables account for a significant amount of more variance in favorability of cognitions about one's accomplishments ($\Delta R^2 = .034$, ΔF (1, 801) = 35.933, p < 0.001). Next, the interaction term between the employment of planning skills and habits, and timing of onset of employment of planning skills and habits is added to the regression Model 3, which account significant more variance than just employment of planning skills and habits, and timing of onset of employment of planning skills and habits by themselves $(\Delta R^2 = 0.005, \Delta F (1, 800) = 5.360, p < 0.005)$ 0.05), indicating that there is a potentially significant moderation between the employment of planning skills and habits, and timing of onset of employment of planning skills and habits on the favorability of cognitions about one's accomplishments. Since there is a potentially significant effect, the researcher further runs the regression on the centered terms to examine the effect by using PROCESS, by Andrew F. Hayes. Examination of the interaction plot shows an enhancing effect (b = -.042, t(800) = -.073, p < .05) that as a person's level of employment of planning skills and habits increase and age start of employment of planning skills and habits is younger during adulthood years, a person's present favorability of cognitions about one's accomplishments increases. At low-level employment of planning skills and habits, a person's favorability of cognitions about one's accomplishments is less different for younger, average, or older age of start of employment of planning skills and habits than at high-level employment of planning skills and habits. A person with

a high level of employment of planning skills and habits with younger age of onset of such skills and habits has the highest favorability of cognitions about one's accomplishments [See Appendix D9]. Therefore, hypothesis 22.7 is fully supported in this study.

5.9 The Effects of Contextual Factors

According to the sixth set of hypotheses, a partial correlation is conducted to measure the degree of association (r) between two variables, with the effect set of controlling variables that are hypothesized to correlate with the dependent variable removed to avoid confounding effects. Then, an independent sample t-test is conducted to test the effects of family size on overall life satisfaction.

5.9.1 Correlations between individual traits (optimism, SES, personal control, freedom) and overall life satisfaction

Hypotheses in set 6a assume a positive relationship between individual traits (optimism, SES, personal control, freedom) and overall life satisfaction. These hypotheses are examined by a partial correlation, where the researcher measures the strengths and directions of linear relationships individual trait and overall life satisfaction whilst controlling for the effects of social desirability. The results are shown below:

Table 5.14 Results of partial correlations between individual traits and overall life satisfaction

| Skills and Habits | Overall life satisfaction |
|-------------------|---------------------------|
| Optimism | .490*** |
| Personal control | .372*** |
| SES | .149*** |
| Freedom | .332*** |

p < 0.05, p < 0.01, p < 0.001

Note: the table entries include partial correlation and significance level (1-tail), controlling for social desirability.

5.9.2 Hypothesis testing for the relationships between individual traits and overall life satisfaction

Hypothesis 23 proposes that optimism is positively associated with an aging person's present life satisfaction. As shown in table 5.14, optimism is significantly and positively associated with people's present level of life satisfaction (r = .490, p < 0.001), while controlling for social desirability. Thus, hypothesis 23 is supported in this study.

Hypothesis 24 proposes that freedom is positively associated with an aging person's present life satisfaction. As shown in table 5.14, freedom is significantly and positively associated with people's present level of life satisfaction (r = .332, p < 0.001), while controlling for social desirability. Thus, hypothesis 24 is supported in this study.

Hypothesis 25 proposes that personal control is positively associated with an aging person's present life satisfaction. As shown in table 5.14, personal control is significantly and positively associated with people's present level of life satisfaction (r = .372, p < 0.001), while controlling for social desirability. Thus, hypothesis 25 is supported in this study.

5.9.3 Correlations between personal control and skills and habits

Hypotheses in set 6b assume a positive relationship between personal control and skills and habits. These hypotheses are examined by a partial correlation, where the researcher measures the strengths and directions of linear relationships personal control and each type of skills and habits whilst controlling for the effects of social desirability, early developmental factors, timing and time. The results are shown below:

Table 5.15 Results of partial correlations between personal control and skills and habits

| Skills and Habits | Personal control |
|---------------------------------------|------------------|
| Effectual financial skills and habits | .133*** |
| Desirable social skills and habits | .070* |
| Preventive healthcare habits | .061* |

| Table 5.15 Results of par | tial correlations | between persona | l control and skills and |
|---------------------------|-------------------|-----------------|--------------------------|
| habits (cont.) | | | |

| Skills and Habits | Personal control |
|---|------------------|
| Spiritual values and habits | .130** |
| Effectual work and homecare habits | .087** |
| Shopping skills and spending money habits | 041 |
| Planning skills and habits | .140*** |

p < 0.05, p < 0.01, p < 0.01

Note: the table entries include partial correlation and significance level (1-tail), controlling for social desirability, early developmental factors, time and timing.

5.9.4 Hypothesis testing for the relationships between personal control and skills and habits

Hypothesis 26.1 suggests that personal control is positively associated with engagement in (a) financial skills and habits, (b) social skills and habits, (c) preventive healthcare habits, (d) spiritual values and habits, (e) daily work or home care habits, and (f) planning skills and habits. Hypothesis 26.1, which expected positive relationships between personal control and early life experiences in six types of skills and habits.

As shown in table 5.15, personal control is significantly and positively associated with all engagement in (a) financial skills and habits (r = .133, p < 0.001), (b) social skills and habits (r = .070, p < 0.05) and (c) preventive healthcare habits (r = .070, p < 0.05).061, p < 0.05), (d) spiritual values and habits (r = .130, p < 0.01), (e) daily work or home care habits (r = .087, p < 0.01), and (f) planning skills and habits (r = .140, p < 0.01)0.001). Thus, hypothesis 26.1 is fully supported in this study.

Hypothesis 26.2 suggests that personal control is negatively associated with engagement in shopping skills and spending habits. As shown in table 5.15, personal control is not significantly and negatively associated with engagement in shopping skills and spending habits (r = -.41, p = 0.122, ns). Thus, hypothesis 26.2 is not supported in this study.

5.9.5 Correlations between individual traits (personal control and SES) and coping strategies

Hypotheses in set 6c assume a positive relationship between contextual factors (personal control and SES) and early life experiences (problem-focused and emotion-focused coping strategies). These hypotheses are examined by a partial correlation, where the researcher measures the strengths and directions of linear relationships each contextual factor and each coping strategy whilst controlling for the effects of social desirability and early developmental factors. The results are shown below:

Table 5.16 Results of partial correlations between contextual factors (personal control and SES) and coping strategies

| //6 | Problem-focused | Emotion-focused | |
|------------------|-----------------|-----------------|--|
| Personal control | .166*** | .015 | |
| SES | .159*** | .040 | |

p < 0.05, p < 0.01, p < 0.001

Note: the table entries include partial correlation and significance level (1-tail), controlling for social desirability and early developmental factors.

5.9.6 Hypothesis testing for the relationships between individual traits (personal control and SES) and coping strategies

Hypothesis 27 suggests that personal control is (a) positively associated with the use of problem-focused coping strategies, and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during most of their adult life challenges. As shown in table 5.16, personal control is significantly and positively correlated with the use of problem-focused coping strategies (r = .166, p < 0.001); whereas personal is not significantly and negatively correlates with the use of emotion-focused coping strategies (r = .015, p = 0.366, ns). Thus, hypothesis 27 is partially supported.

Hypothesis 28 suggests that SES is (a) positively associated with the use of problem-focused coping strategies, and (b) negatively associated with the use of emotion-focused coping strategies in handling major life changes during most of their adult lives challenges, and (c) positively associated with people 's present of life satisfaction. As shown in table 5.9.3, SES is significantly and positively correlated

with the use of problem-focused coping strategies (r = .159, p < 0.001); whereas personal is not significantly and negatively correlates with the use of emotion-focused coping strategies (r = .040, p = 0.172, ns). As shown in table 5.16, SES is significantly and positively associated with people's present level of life satisfaction (r = .149, p < .149) 0.001), while controlling for social desirability. Thus, hypothesis 28 is partially supported in this study.

5.9.7 The effects of family size and overall life satisfaction

Hypothesis 29 suggests that older people living with family are more likely to report higher levels of well-being compared to older people living alone. An independent sample t-test is conducted to compare people's present level of life satisfaction for older people living alone and older people living with family. The 719 participants living with family have an average level of life satisfaction of 3.0209 (SD = .44529) and the 85 participants living alone have an average level of life satisfaction of 2.8612 (SD = .54074). The result from the Levene's test for equality of variances shows that the variances are not equal (F = 4.299, p < 0.05). As expected from unequal variances t-test output, older people living with family significantly report higher present level life satisfaction, t [97.934] = 2.620, p = .005 (one-tailed). Thus, hypothesis 29 is supported in this study.

CHAPTER VI DISCUSSION AND CONCLUSION

6.1 Discussion of Findings

Despite several decades of research of well-being in later life (e.g., Chehregosha *et al.*, 2016; George, 2010), evidence on the factors that promote "successful aging" and well-being among the elderly remains inconclusive (Pettigrew and Moschis, 2012; Rowe and Kahn, 2015). Moschis (2019a and b) suggested that studies of older consumers' well-being necessitate attention to the trajectories and processes of development in terms of onset and modification of behavior and lifestyle in early life and over the entire life course by employing the life course paradigm (LCP) as a viable framework. Therefore, this research's main objective of this study is to enhance the successful aging model and illuminate life histories as a whole process of aging, along with the impact that early-life experiences and actions have on well-being domains and late-life satisfaction by employing LCP as the research framework. Additionally, an important outcome of this research relates to its exploration of the effects of time and timing, and individual attributes including freedom optimism, SES, personal control, and family size as a moderator to late-life well-being with means of several adaptation mechanisms.

Based on this study, several theoretical and empirical questions have been addressed by using the principles and perspectives of the life course paradigm to help fill gaps in existing knowledge. The results for life-course effects on well-being in later life are presented in seven parts: domains of well-being, early-in-life experiences, adaptation mechanisms, early socialization experiences, time and timing, individual traits, and structural factors.

6.1.1 Domains promoting well-being

The first set of hypotheses (Hypothesis 1.1 to Hypothesis 1.7) of this research explored the effects of each well-being domain on overall-well-being by

using the domain-of-life approach. Exploratory results show every well-being domain is statistically significant toward the overall life satisfaction of older respondents in Thailand except the number of ailments. Although the statistically insignificant result in this study, there is still support in finding that the correlation is in a negative number indicating that the higher number of ailments, the lower level of overall life satisfaction. A possible explanation is that respondents' characteristics might be associated with false-negative reporting for health problems especially diabetes and high blood pressure (Onur and Velamuri, 2018).

Additionally, the present favorability of cognitions about one's accomplishments has the largest impact on overall life satisfaction in later life followed by financial satisfaction, self-reported health, enactment of social roles, material satisfaction, perceived social support, financial solvency, spiritual/religiosity, leisure activities, occupational satisfaction, occupational role enactment, and praying or mediating respectively. The findings of this study align with speculations since accomplishments include those in later life tend to be focused on the past or legacy, (as opposed to the young, who tend to be future-oriented) and possessions that assist in remembering the past, and the ways in which we develop as people over a lifetime – possessions such as trophies, photographs, and souvenirs – are often cited by older people as being among their most treasured possessions (Csikszentmihalyi and Rochberg-Halton, 1981). Indeed, Sherman and Newman (1977) also found that retired people who have such treasured possessions tend to be happier than those who do not, while Ryff (1982) identified legacy as an important domain for building overall life satisfaction. This finding further supports a stronger effect of subjective well-being than of objective well-being.

6.1.2 Roles of early life experiences (skills and habits) in promoting well-being in later life

Several researchers suggest that one must examine a person's earlier-inlife experiences that have helped shape behavior in general and consumer behavior in particular in order to understand behavior at a given point in time (Moen *et al.*, 1992; George, 2010; Pettigrew and Moschis, 2012). The research supports the perspective of the life course paradigm that consumers can participate actively in their transformation is the implicit assumption that late-life well-being-promoting patterns of behavior should be fostered throughout the lifespan. The study findings provide significant shreds of evidence on the second set of hypotheses (Hypothesis 2.1 to Hypothesis 2.7) that explored the effects of early life experiences on well-being domains. As found in this study, decisions to engage in skills and habits as early life experiences have statistically significant influences on the level of well-being in later life across domains of life satisfaction.

In particular, the findings support the following: Firstly, an engagement in effectual financial skills and habits during adulthood such as saving money and planning for retirement enhances the financial well-being domain in both levels of financial satisfaction and level of financial solvency in later life. Secondly, the employment of desirable social skills and habits during adulthood such as being a good parent and spending time with family enhances both levels of perceived social support and level of enactment of social roles in later life. Thirdly, an engagement in preventive healthcare habits during adulthood such as doing and having good nutrition enhances both level self-reported health and number of ailments in later life. Fourthly, the strength of spiritual values and habits during adulthood such as praying and attending religious services enhances the level of spirituality/religiosity and praying and altruistic activities in later life. Fifthly, an engagement in effectual work or homecare habits during adulthood such as working with passion enhances the level of occupational satisfaction and occupational role enactment in later life. Sixthly, an engagement in shopping skills and spending money habits during adulthood such as buying a lot of expensive things enhances the level of material satisfaction and leisure activities in later life. Finally, the employment of planning skills and habits during adulthood such as planning ahead to deal with the worst thing that could happen and finding ways to overcome or adapt to major life adversities and challenges enhances favorability of cognitions about one's accomplishments in later life. Therefore, there is significant support on applying the life course paradigm in this study regarding the influences of early-life experiences and lifestyles on the level of well-being in late life.

6.1.3 Effects of adaptation processes in promoting well-being in later life

Based on the life course paradigm, contexts of life are embedded within the early-life adaptation processes including normative, problem-focused, emotion-focused, and human capital development which lead to a present level of life satisfaction and well-being. The third set of hypotheses explored the early-life adaptation mechanisms on the well-bring domains.

For normative effects, this study largely supports Hypothesis 3.1 to Hypothesis 3.7 that explored the normative adaptation perspective in the life course paradigm of engagement in socially accepted behaviors during adulthood on well-being domains. Exploratory results from this study show that socialization level during adulthood enhances the level of financial satisfaction, perceived social support, enactment of social roles, self-reported health, spirituality/religiosity, occupational satisfaction, occupational role enactment, material satisfaction, leisure activities, and accomplishments. Additionally, the socialization level during adulthood also reduces the number of ailments. The effects of socialization level during adulthood are insignificant in two domains including financial solvency and praying and altruistic activities.

For coping effects, two coping strategies in the life course paradigm are testes to explore their effects on well-being domains (Hypothesis 4.1 to Hypothesis 10). The use of problem-focused coping strategies during adulthood significantly enhances most of the well-being domains including financial satisfaction, perceived social support, enactment of social roles, self-reported health, occupational satisfaction, occupational role enactment, material satisfaction, leisure activities, and accomplishments. Additionally, the use of problem-focused coping strategies significantly reduces the number of ailments and praying and altruistic activities. The effects of problem-focused coping strategies during adulthood are insignificant in two domains including financial solvency, and leisure activities. As expected, the use of emotion-focused coping strategies significantly and negatively effects on financial solvency as well as positively affects spirituality/religiosity and praying and altruistic activities.

However, the interesting finding in this study is that the use of emotionfocused coping strategies not negatively but rather positively affect these following well-being domains: financial satisfaction, perceived social support, self-reported health, occupational satisfaction, occupational role enactment, and accomplishments. This inverse relationship is probably due to several reasons. Firstly, research on stress and coping has shown an inconclusive evidence to support that neither problemfocused nor emotion-focused coping strategies per se are better for dealing with stress (Park et al., 2001). For instance, the literature suggests that apart from the problemfocused coping responses, the employment of emotion-focused coping responses reduces risks and promotes health well-being (Worthington and Scherer, 2007). Secondly, Lazarus (1999) stated that problem-focused coping strategies are found to be superior when direct action is possible, whereas emotion-focused coping strategies are often found to be superior when direct action for dealing with stress is hampered. Therefore, the emotion-coping responses are also important to self-improvement by supporting emotional well-being (Brougham et al., 2009). Lastly, this study results might be different due to cultural contexts such as the role of religion (Rakrachakarn, Moschis, Ong, and Shannon, 2015).

For human capital development effects, this study partially supports Hypothesis 11.1 to Hypothesis 11.7 that explored the human capital development perspective in the life course paradigm of the development in skills and knowledge during adulthood on well-being domains. The results from this study support that the development in skills and habits significantly enhances perceived social support, self-reported health, praying and altruistic, occupational satisfaction, material satisfaction, leisure activities, and accomplishments. Additionally, the development of skills and knowledge during adulthood also reduces the number of ailments. The effects of human capital development during adulthood are insignificant on financial satisfaction, financial solvency, enactment of social roles, spirituality/religiosity, and occupational role enactment.

The insignificant results from the effects of the adaptation mechanism may due to broad question items for each adaptation variable rather than specific question items based on each specific well-being domain. For instance, adaptation processes according to the financial well-being domain should include items about role enactment saving motivations, stress/financial insecurity-coping motivations, and financial literacy.

6.1.4 Effects of socialization agents in promoting well-being in later life

The paradigmatic principle of human agency in the life course paradigm suggests one's socialization interactions as early developmental factors explain how people develop patterns of behaviors and well-being domains. For the direct effect of socialization agents (Hypothesis 12.1 to Hypothesis 18.3), interactions with informal socialization agents including parents, friends, co-workers, and acquaintances have significantly and positively direct effects on most of the well-being domains including financial satisfaction, financial solvency, perceived social support, self-reported health, occupational satisfaction, occupational role enactment, material satisfaction, and accomplishments. Next, interactions with formal socialization agents including schools and professionals have significantly and positively direct effects on six wellbeing domains including financial solvency, perceived social support, occupational role enactment, material satisfaction, leisure activities, and accomplishments. Last, interactions with commercial socialization agents such as mass media have significantly and positively direct effects on four well-being domains including financial solvency, self-reported health, material satisfaction, and accomplishments. In sum, interactions with informal socialization agents are more significant in well-being domains than formal and commercial socialization agents.

6.1.5 Effects of socialization agents on early life experiences

The life course paradigm suggests that early life experiences in the form of skills and habits and adaptation strategies can be acquired from different socialization agents. In this study, the results support that a person's socialization experiences with these three types of socialization agents in early life are key factors in the development of various skills and habits, as well as on adaptation mechanisms throughout one's remaining life.

In particular, respondents apparently acquire knowledge about effectual financial skills and habits, preventive healthcare habits, and planning skills and habits

from interactions with all three types of socialization agents. In the absence of viable formal socialization agents, people acquired knowledge about spiritual values and habits, and desirable social skills and habits from both informal and commercial socialization agents. People acquire knowledge about shopping skills and spending money habits from both informal and formal socialization agents. According to effectual work and homecare habits, people apparently acquired this knowledge from only informal socialization agents such as family and peers. Regarding coping strategies, people acquired knowledge and skills about the use of problem-focused and reduce the use of emotion-focused coping strategies from interactions with both informal and commercial socialization agents. However, interactions with schools and professionals are not perceived as helpful in the development of coping strategies.

From the results in 6.1.4 and 6.15, there are significant supports on the emerged relationships between early-life socialization experiences and the adaptation mechanisms that promote people's well-being in later life.

6.1.6 Important contextual factors in promoting well-being in later life

According to the life course paradigm, a younger age as earlier timing also implies a longer duration, both timing and duration are expected to promote the onset and stability of skills and habits. In this study, the results provide full support on the effects of time and timing on early in life skills and habits. Specifically, all types of skills and habits in early life support the assumption that the early timing of onset of skills and habits affects the higher level of engagement of skills and habits. Similarly, all types of skills and habits in early life also support the assumption that a longer duration of skills and habits affects the higher level of engagement of skills and habits. These skills and habits include effectual financial skills and habits, desirable social skills and habits, preventive healthcare habits, spiritual values and habits, effectual work and homecare habits, shopping skills and spending habits, and planning skills and habits.

For the effects of individual traits, optimism, personal control, SES, and freedom have significantly strong positive associations with overall life satisfaction as expected. Aging people living with family report significantly higher levels of life

satisfaction in later life than aging people living alone. Additionally, personal control significantly affects the level of all types of skills and habits except shopping skills and spending money habits in this study. However, the correlation between personal control and shopping skills and spending habits is negative as expected. Moreover, SES and personal control are significantly positive with the use of problem-focused coping strategies so the higher the level of personal control or SES people are, the higher the use of problem-focused strategies in dealing with major life challenges. But, the use of emotion-focused strategies is not significant with personal control and SES. The correlations are also positive which is similar to the effects of the use of emotion-focused strategies on well-being domains.

6.1.7 Moderating effects of contextual factors on relationships between early life experiences and domains of well-being in later life

Finally, this study also explores the moderating effects of duration on the relationship between skills and habits, and well-being domains. The results reveal significant moderating effects of duration on the relationships between the aging person's level of engagement in financial skills and habits during adulthood years and one's present level of financial solvency; aging person's level of engagement in preventive healthcare habits during adulthood years and one's present level self-reported health; aging person's level of engagement in shopping skills and spending habits during adulthood years and one's present level material satisfaction and leisure activities, and aging person's level of employment of planning skills and habits during adulthood years and one's present favorability of cognitions about one's accomplishments, a longer duration of such skills and habits leads to stronger positive relationships. A possible explanation for other insignificant in moderating effects is the absence of questions on the age of discontinuity.

In conclusion, a range of positive outcomes is achieved from this research findings due to the utilization of the life course paradigm in proving the effects of early-in-life experiences, adaptation mechanisms, and early socialization experiences on older financial well-being as well as the effects of time and timing, individual traits (personal control, optimism, and freedom), and structural factors (SES and family

size) as a moderator to older consumer well-being with means of several adaptation mechanisms. Especially, the emerged relationships between early socialization experiences and early life experiences in terms of skills and habits, and adaptation mechanisms that lead to the establishment of consumer behavioral patterns such as savings behavior, affecting older financial well-being and overall well-being. Hence, the LCP offers a robust theoretical framework that researchers can use to produce longitudinal and contextualized studies of consumers. According to this study findings, the utilization of this overarching paradigm as a viable framework appears to be an effective way to illuminate the nature, type, and duration of various activities that promote successful aging and the elderly's well-being.

6.2 Implications

The findings from this study have illustrated how the LCP can be employed to study older consumer well-being in an innovative way. By providing examples of select consumer behaviors, such as financial and preventive healthcare skills and habits, the study demonstrates how researchers could apply the LCP to other aspects of consumer behaviors. Therefore, the contribution of this research extends beyond the study of older consumer well-being by illustrating the application of the LCP to the study of consumer behaviors at any stage in life. An obvious limitation of this research study is the sparse research findings justifying some of the specified hypotheses, as well as the lack of research supporting additional relationships for variables related to older consumer well-being and behaviors. However, it is hoped that the reader can see the value of adopting the LCP as a basis for developing propositions similar to those offered as examples here to develop specific hypotheses that could be tested in future studies. Therefore, this section provides implications for research and practice as well as directions for future research to help develop theory.

6.2.1 Implications for theory

The core tenets of this study findings have drawn attention to the existence of many opportunities for enhancing the successful aging model by employing the LCP to identify factors associated with the effects on the capacity of people to age

successfully. Similarly, the implications of the present study depend on the verification of the proposed relationships in the hypotheses of this study within the LCP.

According to this study findings, there are strong pieces of evidence to support the application of LCP to study well-being in later life. This study has taken the long view of aging; acknowledged the interconnected nature of human beings (interactions with socialization agents), as well as the effect of context on an individual's life course (e.g., culture, structural influences, timing and time, and individual traits); the heterogeneous nature of lives and the complexity of developmental pathways (early life experiences in both skills and habits, adaptation processes); and finally, afforded a robust theoretical framework that researchers can use to produce longitudinal, contextualized studies of consumers and their behavior toward well-being in later life.

6.2.2 Implications for practice

Specifically, from this study it appears that the significant factors in promoting well-being in later life can be found in the LCP. Hence, this study's findings have the potential to be useful in a range of practical settings, including marketing, consumer education, and public policy. However, since it is not feasible for the researcher to discuss all the ways in which this is true, select cases are be discussed.

6.2.2.1 Marketing

By better understanding issues of successful aging and well-being in later stages of life, marketers can draw a connection between early-life experiences and lifestyles and late-life demand for products and services associated with successful aging. Schau *et al.*'s (2009) research reflect this, since it shows how marketers can interact with the part played by consumption activities in driving the elderly's efforts to revive or establish meaningful, purpose-promoting identities. With this in mind, marketers would benefit from gaining concrete insights into the roles played by certain products and services in the areas of identity formation and identity maintenance. In particular, this is because they would have an in-depth knowledge of the optimal way in which to position their products and services so as to advantage

elderly consumers, thus promoting adoption. For example, planning skills and habits are the key toward one's accomplishments, which is the most important well-being domain found in this study, so the marketers in financial services can attract customers with this kind of message.

In addition, knowledge about the factors that explain a person's use of products and services at a given stage in life that promote well-being in later life can help marketers can position their products and services to customers at different stages of life. For example, marketers of financial and healthcare services should emphasize the importance of the early-life onset of effectual financial and preventive healthcare habits in achieving financial and physical well-being in later life. In a similar vein, Plaud and Guillemot's (2015) research shows how marketers could benefit from gaining concrete insights into the roles played by certain service providers in the areas of identity adjustment that affect a person's sense of well-being in later life.

6.2.2.2 Consumer education

Additionally, this study is significantly relevant to consumer educational services, since it shows how successful aging that promotes well-being in later life can be achieved. Given that almost all well-being domains affecting life satisfaction are significant from the findings, each well-being domain can be manipulated and affected through timely change initiatives. Many scholars have also drawn attention to the importance of promoting behaviors and attitudes towards life that heighten the probability of successful aging and well-being in later life (Rowe and Kahn, 2015; WHO, 2018). This study emphasizes that consumers should make decisions that will promote an active lifestyle, financial independence, and physical health in their later years, and therefore it should be of value to intervention and educational program designers. In particular, the findings of future studies guided by the propositions herein could be used to inform educational initiatives for young consumers and help reduce their late-life vulnerability. Given that the life course approach to enhancing consumer well-being highlights the importance of factors that promote positive behaviors in early life and the effects of time and timing, this study's findings encourage consumer education practitioners to pay close attention to young consumers and their development.

6.2.2.3 Public policy

This study can aid in developing public services, including public policies and interventions, that promote well-being in later life based on significant determinants of life satisfaction found in this study. Due to the large size of the Baby Boom generation, many public policy researchers are naturally preoccupied with the question of successful aging. Much of the literature acknowledges the importance of developing science that can maximize late-life well-being, and many scholars recognize that environmental and contextual factors can promote successful aging which is consistent with this study's findings. For example, policymakers could implement policies that encourage individuals to make decisions earlier in life that contribute to late-life well-being. Such policies could target macro-level factors, including efficient and equitable healthcare systems, economic security, and civic participation (Brown and Lowis, 2003; Venne, 2005); and they could discourage age discrimination (WHO, 2018), encourage technology use (Heinish, 2004; Millennium Ecosystem Assessment, 2005; Schroll, 2005), and help accelerate the development of social and environmental settings that allow the elderly to live meaningful lives (WHO, 2018). For example, in the domain of public policy, these findings could be used to guide the design of well-being-promoting interventions for late-life, as well as interventions that focus specifically on the antecedents of life satisfaction in old age. Finally, a range of approaches for creating persuasive messages can be informed, given the findings' emphasis on the lifelong nature of aging. In particular, such approaches could increase the motivation among young people to participate in selftransformative behaviors, thus generating life satisfaction and promoting successful aging.

6.3 Limitations and Future Research

The principal limitation of this study is that the findings are based on the Thai sample, and the results may not hold in other countries. The researcher recommends that this research design should also be applied in other countries because late-life satisfaction and well-being domains may have different connotations in different countries and context settings.

According to the nature of the cross-sectional research design, this study can only dictate the correlations between variables identified in the study rather than making casual conclusions. A more rigorous research design should be used to clearly measure the effects of specific early life experiences on the establishment of behavioral patterns and the behavioral modifications at different life stages, affecting the level of well-being in later life. This approach should also allow researchers to separate the effects of mechanisms that bring about changes in a specific type of behavioral patterns.

Since this study combines several well-being domains within one conceptual framework, there is a limitation in the selection of data analysis methods because the number of parameters is too high. An alternative approach of the future study can separate well-being domains and develop a new conceptual model based on this study to study insights for each well-being domain. For instance, a structural modeling equation (SEM) can be applied to test the whole model of financial well-being in later life. A mixed-method should also be considered because it can provide in-depth analysis and findings from both quantitative and qualitative data about reasons on the behavioral establishment, modification, and discontinuation.

Because the life course paradigm assumes that people's behaviors are the product of early life experiences, present circumstances, and future expectations (Moschis, 2019a), this study has included early life experiences in terms of skills and habit, and adaptation processes, the present level of well-being, and age remaining expectations. Apart from measures in this study, important life events and changes that are not likely to be affected by his or her age (Herbert and Cohen, 1996; Rodgers and Hertzog, 1987) can be employed when studying older consumers because these could also affect the development and changes in consumer behaviors that later affect well-being in later life. Therefore, future research should also consider a list of life events including moved to a different location, started work for the first time or after not working for a long time, marriage, birth or adoption of the first child, divorce or separation, significant change in financial status, became the main caregiver to aged/disable person, death of a father, death of a mother, life-threatening illness, injury/accident or surgery, last (only) child left home, birth of the first grandchild,

retirement (at own will), death of spouse or partner, and chronic condition diagnosed; and use such measures as covariates in event history analysis (EHA) models.

As mentioned earlier in the discussion section, further research should include specific adaptation processes to examine the specific well-being domain. For instance, future research on financial well-being should include items about role enactment saving motivations, stress/financial insecurity-coping motivations, and financial literacy. For the health well-being domain, items in the questionnaire should include items about motivations on role enactment preventive healthcare behaviors, stress/psychological and physical insecurity-coping motivations, and health knowledge.

Other contextual factors such as macro-level factors like collectivistic vs individualistic cultures, healthcare infrastructure, and the availability of social support system and state, could be inserted as potential moderators the relationships between adaptation processes and changes in consumer behaviors that later affect well-being in later life. For instance, the availability of caregivers and norms about the provision of care to older people vary across groups. Such differences may affect the level of well-being in later life. With a strong set of added variables, the results could be more significant and useful contributions.

To generate theories to better understand and foster elderly well-being, the impact of particular events in life as well as hanges to consumer behaviours (onset, continuity, and discontinuity) should be investigated. Additionally, the body of information on elderly consumer behaviours and well-bring in later life would benefit from research into the process of change due to specific life events. Furthermore, examining the impact of related factors or contextual variables that regulate the correlations between life events, adaptation processes of change, and well-being in later life would also be advantageous in terms of opening avenues of opportunity for successful aging. This paper should provide a strong basis for future research. It is important that the research objectives should be consistent with the conceptual life course models' variables, such as the following:

- 1. Developmental factors that promote well-being in later life.
- 2. Relevant life events or changes that increase the likelihood of the onset of specific skills and habits as well as adaptation processes

- 3. Life events or changes that cause the discontinuation of specific skills and habits
- 4. The role of earlier-in-life experiences in promoting well-being in later life
- 5. Mechanisms of behavioral modification at different stages in life.
- 6. The level of effectiveness for each mechanism that leads to the establishment of behavioral patterns.
- 7. The effective mechanisms that bring about changes in behavioral patterns.
- 8. The important contextual factors that promote well-being in later life.
- 9. The moderating effects of contextual factors on relationships between earlier-in-life experiences and domains of well-being in later life.

In accordance with these guidelines, and in order to fill the research gaps, the LCP principles and perspectives could be utilized to answer some of the theoretical and empirical questions that arise from the existing research. The core tenets and implications of LCP draw attention to the existence of many opportunities for enhancing the successful aging model, as this paradigm takes a long view of aging. It acknowledges the interconnected nature of human beings, as well as the effect of context on an individual's life course (e.g., culture, structural influences, institutional influences, and time), and recognizes the heterogeneous nature of lives and the complexity of developmental pathways. Finally, the LCP offers a robust theoretical framework that researchers can use to produce longitudinal and contextualized studies of consumers.

In conclusion, the utilization of this overarching paradigm as a viable framework appears to be an effective way to illuminate the nature, type, and duration of various activities that may promote successful aging and the elderly's well-being. This research study is a blueprint and roadmap of how to build propositions from the LCP regarding well-being in late life. It also has potential to be useful in a range of practical settings, including consumer education, public policy, and marketing. This study should help researchers and practitioners view well-being in later life in the context of SAP, which can be studied by employing the increasingly popular LCP.

The researcher also encourages future life course researchers to employ these different methods and approaches in other fields.



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APPENDIX A ETHICAL APPROVAL DOCUMENT

APPENDIX A: Ethical Approval Document

COLLABORATIVE INSTITUTIONAL TRAINING INITIATIVE (CITI PROGRAM)

COMPLETION REPORT - PART 1 OF 2 COURSEWORK REQUIREMENTS*

* NOTE: Scores on this <u>Requirements Report</u> reflect quiz completions at the time all requirements for the course were met. See list below for details. See separate Transcript Report for more recent quiz scores, including those on optional (supplemental) course elements.

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 Curriculum Group: Human Subjects Research

Course Learner Group: Student Social, Behavioral & Humanity Research
 Stage: Stage 1 - Basic Stage

· Record ID: 33641306 · Completion Date: 04-Oct-2019 • Expiration Date: 03-Oct-2023 Minimum Passing: · Reported Score*: 100

| REQUIRED AND ELECTIVE MODULES ONLY | DATE COMPLETED | SCORE |
|---|----------------|------------|
| History and Ethical Principles - SBE (ID: 490) | 04-Oct-2019 | 5/5 (100%) |
| Informed Consent - SBE (ID: 504) | 04-Oct-2019 | 5/5 (100%) |
| Privacy and Confidentiality - SBE (ID: 505) | 04-Oct-2019 | 5/5 (100%) |
| Unanticipated Problems and Reporting Requirements in Social and Behavioral Research (ID: 14928) | 04-Oct-2019 | 5/5 (100%) |
| Assessing Risk - SBE (ID: 503) | 04-Oct-2019 | 5/5 (100%) |

For this Report to be valid, the learner identified above must have had a valid affiliation with the CITI Program subscribing institution identified above or have been a paid Independent Learner.

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APPENDIX B1: Questionnaire-English Version

Questionnaire

Thank you for agreeing to participate in this important survey, which is for a purely academic study. We will be asking you to respond to questions about your feelings, experiences, and consumption habits. There are no right or wrong answers to questions, and we will not know the names of people who answer them. Your responses will be grouped with those of other participants. Your participation is voluntary. However, we cannot afford to ask many people to help us; it is important that you read everything carefully and answer all the questions the best way you can in order for the study to succeed.

Thank you in advance,

Sincerely,
Pattharanitcha Prakitsuwan
Ph.D Candidate
College of Management Mahidol University

I. First, we would like to ask a few questions about your habits and lifestyles during your adult life

1. Following are statements that describe many people's habits and lifestyles during their adult life. For each, please indicate how much the statement describes your habits and lifestyle—whether it does not describe, somewhat describes, describes a lot, or describes completely your habits and lifestyles during most of your adult life.

And if a statement describes your habits during most of your adult life, please indicate the approximate age you started doing it (Age start)

| Statements about habits and lifestyles: | Does not describe my habits | Describes my habits somewhat | Describes my habits a lot | Describes my habits completely | Age started |
|---|-----------------------------|------------------------------------|---------------------------------|--------------------------------------|----------------|
| Keeping track of the money spent on a daily basis | 0 | 0 | | 0 | |
| Trying to make new friends and spend time with them | 0 | 0 | 0 | 0 | |
| Making lists of things that have to be done | 0 | 0 | 0 | 0 | |
| Engaging in some type of physical fitness regularly | 0 | 0 | 0 | 0 | |
| Planning the time to do things during the day | 0 | 0 | 0 | 0 | |
| Planning ahead to deal with the worst that could happen | 0 | 0 | 0 | 0 | |
| Ensuring that bad things don't happen | 0 | 0 | 0 | 0 | |

| Statements about habits and lifestyles: | Does not describe my habits | Describes my habits somewhat | Describes my habits a lot | Describes my habits completely | Age started |
|--|-----------------------------|------------------------------------|---------------------------|--------------------------------------|----------------|
| Paying the full balance of credit cards | 0 | 0 | 0 | 0 | |
| Keeping detailed records of important events or activities | 0 | 0 | 0 | 0 | |
| Saving only when there is money left after paying for other things | 0 | 0 | 0 | 0 | |
| Having annual physical exams | 0 | 0 | 0 | 0 | |
| Working with passion on every task or assignment | | 0 | | 0 | |
| Sticking to scheduled plans, rather than changing them constantly | 0 | 0 | 0 | 0 | |
| Sacrificing good taste for good nutrition | | | | 0 | |
| Automatically setting aside money out of each paycheck | 0 | | | 0 | |
| Contributing to a retirement plan through an employer or other types that you set up yourself | 0 | | | 0 | |
| Spending time with family at the expense of other activities of personal interests | 0 | | 0 | 0 | |
| Saving money for a rainy day rather than spending it | 0 | | | 0 | |
| Setting goals and timelines for reaching them | 0 | 0 | | 0 | |
| Taking care of things that had to be done, before doing non-pressing or pleasurable things | 0 | 0 | 0 | 0 | |
| Trying to be a good parent or spouse (or partner) | 0 | 0 | 0 | 0 | |
| Taking vitamins and minerals daily | 0 | 0 | 0 | 0 | |
| Prioritizing things to be done during the day | 0 | 0 | 0 | 0 | |
| Having the need to do something during the day | 0 | 0 | 0 | 0 | |

| Statements about habits and lifestyles: | Does not describe my habits | Describes my habits somewhat | Describes my habits a lot | Describes my habits completely | Age started |
|--|-----------------------------|------------------------------------|---------------------------------|--------------------------------------|----------------|
| Praying or attending religious services | 0 | 0 | 0 | 0 | |
| Having flu shots annually | 0 | 0 | 0 | 0 | |
| Putting my family's needs ahead of mine | 0 | 0 | 0 | 0 | |
| Finding ways to overcome or adapt to major life adversities and challenges | 0 | 0 | 0 | 0 | |
| Trying to buy expensive things | | 0 | | 0 | |
| Buying things to impress people | 0 | 0 | 0 | 0 | |
| Trying to enjoy luxury in my life | | | | 0 | |

II. Next, we would like to ask you a few questions about your present life

2. People get a lot of their pleasures in life from different things they do. For each possible source of satisfaction listed below, please tick a circle to show how much satisfaction you frequently get from doing each.

| Satisfaction you frequently get from: | None | <u>Some</u> | Quite a bit | Very much |
|--|---------|-------------|----------------|--------------|
| Spending time with close family members | 0 | | 0 | \circ |
| Socializing with friends or "significant others" | 0 | | 0 | 0 |
| Using social media, like Facebook and Instagram | 0 | | 0 | 0 |
| Doing your regular job or chores, at work or home | | | 0 | 0 |
| Praying or meditating | \circ | 0 | 0 | 0 |
| Exercising or fitness activities | 0 | 0 | 0 | 0 |
| Watching TV, or reading books, magazines or newspapers | 0 | 0 | 0 | 0 |
| Spending time with close family members | 0 | 0 | 0 | 0 |
| Gambling or playing games of a chance | 0 | 0 | 0 | 0 |
| Giving time or money to non-profit organizations | 0 | 0 | 0 | 0 |
| Helping needy people or animals | 0 | 0 | 0 | 0 |
| Spending time on special leisure activities or hobbies | 0 | 0 | 0 | 0 |
| Shopping and buying things | \circ | 0 | 0 | 0 |

3. People also get a lot of their pleasures in life from different things they have or value. For each possible source of satisfaction listed below, please tick a circle to show how much satisfaction you frequently get from thinking about each, whether you get no satisfaction, some, quite a bit, or a lot of satisfaction when thinking about each.

| Satisfaction you get from thinking about your: | No satisfaction | Some satisfaction | Quite a bit of satisfaction | A lot of satisfaction |
|--|-----------------|-------------------|-----------------------------|-----------------------|
| Relationship with your spouse/partner or close family members | 0 | 0 | 0 | 0 |
| Loved ones' achievements or potentials | 0 | 0 | 0 | 0 |
| Relationships with friends or "significant others" | 0 | 0 | | 0 |
| Knowing that your close relatives or friends understand the way you feel about things | 0 | 0 | | 0 |
| Knowing how much your close relatives or friends really care about you | | | | 0 |
| Knowing how much you can rely on your close relatives or friends for help if you have a serious problem | 0 | | 0 | 0 |
| Present or future financial situation | 0 | | | 0 |
| The state of your present health compared to 10 years ago | | 0 | 0 | 0 |
| The state of your present health compared with others your age | 0 | | | 0 |
| Experiencing less physical pain or discomfort than others your age | 0 | 0 | 0 | 0 |
| Religiosity or spirituality | 0 | 0 | 0 | 0 |
| Present or previous job(s) or career choice(s) | 0 | 0 | 0 | 0 |
| Plans for the future | 0 | 0 | 0 | 0 |
| Previous life's experiences | 0 | 0 | 0 | 0 |
| Life's accomplishments, in comparison to the accomplishments of others at similar stages in life | 0 | 0 | 0 | 0 |

| Satisfaction you get from thinking about your: | No satisfaction | Some satisfaction | Quite a bit of satisfaction | A lot of satisfaction |
|--|-----------------|-------------------|-----------------------------|-----------------------|
| Life's accomplishments, in comparison to what you or others expected of you | 0 | 0 | 0 | 0 |
| Things that show your legacy, life, or your family's history, like photos and mementos | 0 | 0 | 0 | 0 |
| Cherish or irreplaceable things that you own | 0 | 0 | 0 | 0 |
| Material possessions, like your car, home, clothes, and jewellery | 0 | 0 | | 0 |

4. Following is a list of ways people handle major life changes and challenges. For each, please indicate the extent to which it describes the way you handled important changes and challenges during most of your adult life in order to overcome or adapt to new situations, whether each way describes you a lot, a little, or not at all.

| Ways of handling life's changes and challenges: | Does not describe me at all | Describes me a little | Describes me a lot |
|--|-----------------------------|--------------------------|-----------------------|
| Doing what others expect me to do | 0 | 0 | 0 |
| Doing what most people would do when facing the same kind of problems | 0 | 0 | 0 |
| Seeking advice from others in similar situations on how to handle new situations | 0 | 0 | 0 |
| Seeking advice from professional on how to handle the new situation or problem | 0 | 0 | 0 |
| Analyzing the situation or problem before taking action | | 0 | 0 |
| Try to understand the new situation or problem before taking action | 0 | 0 | 0 |
| Taking time to think of available options to handle the problem or new situation | 0 | 0 | 0 |
| Doing what it takes to put an end to the problem myself | \circ | 0 | 0 |
| Keeping feelings about the problem to yourself | \circ | 0 | 0 |
| Avoid thinking about the problems or new situation | \circ | 0 | \circ |
| Seeking and accepting sympathy and understanding | \circ | 0 | \circ |
| Avoiding being with people | \circ | 0 | 0 |
| Daydreaming or imagining better times | 0 | 0 | 0 |

| Ways of handling life's changes and challenges: | Does not describe me at all | Describes me a little | Describes me a lot |
|---|-----------------------------|--------------------------|-----------------------|
| Keeping others from knowing | 0 | 0 | 0 |
| Looking at things from different point of view | 0 | 0 | 0 |
| Trying not to act too hastily | 0 | 0 | 0 |
| Praying (or meditating) hoping things will change | 0 | 0 | 0 |
| Waiting and hoping the problem or situation will change by its own | 0 | 0 | 0 |
| Learning as much as you could about the new problem or situation you were facing | | 0 | 0 |
| Trying to understand your options before deciding | 0 | 0 | 0 |
| Relying on the advice of those more knowledgeable than you | 0 | 0 | 0 |
| Relying on your gut feeling or intuition rather than on facts or others' opinions | 0 | 0 | 0 |

5. For each of the following statements, please mark the circle that best shows how much you disagree or agree that the statement applies to you.

| | Strongly disagree | Somewhat disagree | Somewhat agree | Strongly agree |
|---|-------------------|----------------------|-------------------|----------------|
| I am becoming financially secure | 0 | | | 0 |
| I will achieve the financial goals that I have set for myself | | 0 | | 0 |
| I have saved (or will be able to save) enough money to last me to the end of my life | 0 | 0 | 0 | 0 |
| I will be financially secure until the end of my life | 0 | 0 | 0 | 0 |
| I generally feel that I have had freedom of choice over the way my life has turned out | 0 | 0 | 0 | 0 |
| Overall, I would say that throughout most of my adult life I have been free to choose what I wanted | 0 | 0 | 0 | 0 |

| | Strongly disagree | Somewhat disagree | Somewhat agree | Strongly agree |
|---|-------------------|----------------------|----------------|----------------|
| At times, others have limited my ability to make the choices I wanted in some areas of life, like family, work, and handling money | 0 | 0 | 0 | 0 |
| In certain times, I usually expect the best | 0 | 0 | 0 | 0 |
| If something can go wrong for me, it will | 0 | 0 | 0 | 0 |
| I'm always optimistic about my future | 0 | 0 | | 0 |
| I hardly ever expect things to go my way | 0 | | | 0 |
| I don't get upset too easily | | 0 | | 0 |
| I rarely count on good things happening to me | | | 0 | 0 |
| Overall, I expect more good things to happen to me than bad | 0 | | 0 | 0 |

III. Next we would like to ask you a few questions about your earlier-in-life experiences.

6. Considering the many sources listed below from which a person can learn about how to do things in six areas shown on the top, please check to show if each was helpful to you in learning the things you presently may know about those areas of life. (For each source you may check more than one place)

| I learned from: | Financial skills and habits | Social skills and habits | Preventive healthcare habits | Spiritual values and habits | Daily work or home care habits | Shopping skills and spending habits |
|---|-----------------------------|-----------------------------------|------------------------------------|-----------------------------|---|--|
| My parents, other family members or relatives | 0 | 0 | 0 | 0 | 0 | 0 |
| School | \circ | 0 | 0 | 0 | 0 | 0 |
| Friends, co- workers, or acquaintances | 0 | 0 | 0 | 0 | 0 | 0 |
| Advisors or professionals | 0 | 0 | 0 | 0 | 0 | 0 |

| I learned from: | Financial skills and habits | Social skills and habits | Preventive healthcare habits | Spiritual values and habits | Daily work or home care habits | Shopping skills and spending habits |
|--|-----------------------------------|-----------------------------------|------------------------------------|-----------------------------------|---|--|
| Media (newspapers, magazines, TV, Internet, etc.) | 0 | 0 | 0 | 0 | 0 | 0 |

7. The following is a list of statements regarding how people feel about things that they often experience in their lives. For each, please check one circle to **show your level of disagreement or agreement.**

| | Strongly disagree | Somewhat disagree | Somewhat agree | Strongly agree |
|--|-------------------|-------------------|-------------------|----------------|
| In most ways my life is close to ideal | 0 | | | 0 |
| The conditions of my life are excellent | | 0 | | 0 |
| I am satisfied with my life | 0 | 0 | 0 | 0 |
| So far, I have gotten most important things I want in life | 0 | | 0 | 0 |
| If I could live my life over, I would change almost nothing | 0 | | 0 | 0 |
| I am responsible for my own successes | 0 | | 0 | 0 |
| I can do just about anything I really set my mind to | 0 | 0 | | 0 |
| My misfortunes are the result of mistakes I have made | 0 | 0 | | 0 |
| I am responsible for my failures | 0 | 0 | | 0 |
| The really good things that happen to me are mostly luck | 0 | 0 | 0 | 0 |
| There is no sense planning a lot—If something good is going to happen, it will | 0 | 0 | 0 | 0 |
| Most of my problems are due to bad breaks | 0 | 0 | 0 | 0 |
| I have little control over the bad things that happen to me | 0 | 0 | 0 | 0 |
| I'm always willing to admit it when I make a mistake | 0 | 0 | 0 | 0 |
| I always try to practice what I preach | 0 | 0 | 0 | 0 |

| | Strongly disagree | Somewhat disagree | Somewhat agree | Strongly agree |
|---|----------------------|----------------------|----------------|----------------|
| I never resent being asked to return a favor | 0 | 0 | 0 | 0 |
| I have never been irked when people express ideas very different from my own | 0 | 0 | 0 | 0 |
| I have never deliberately said something that hurt something that hurt someone's feelings | 0 | 0 | 0 | 0 |
| I like to gossip at times | 0 | | | \circ |
| There have been occasions when I took advantages of someone | 0 | 0 | | 0 |
| I sometimes try to get even rather than forgive and forget | | | | 0 |
| At times I have really insisted on having things my own way | 0 | 0 | | 0 |
| There have been occasions when I felt like smashing things | | | 0 | 0 |

8. If you or your spouse (or partner) are presently employed, please count the approximate value of all your present savings for retirement (including your spouse's or partner's) and other retirement benefits, money that you plan to use ONLY during your retirement years, including Social Security, pensions and savings in other accounts (CDs, stocks, bonds, and mutual funds), and check the APPROXIMATE MONTHLY amount that you would receive from all these sources combined, if you, or both you and your spouse (or partner), were to retire today.

- O Less than THB 15,000
- O THB 15,001 THB 30,000
- O THB 30,0001 THB 50,000
- O THB 50,001 THB 70,000
- O THB 70,001 THB 100,000
- O THB 100,001 THB 150,000
- O THB 150,001 THB 200,000
- More than THB 200,000
- 9. If you or your spouse (or partner) are already retired, what is the APPROXIMATE MONTHLY combined amount you and your spouse (or partner) receive from the same sources?
 - O THB 15,001 THB 30,000
 - O THB 30,0001 THB 50,000
 - O THB 50,001 THB 70,000
 - O THB 70,001 THB 100,000
 - O THB 100,001 THB 150,000
 - O THB 150,001 THB 200,000
 - O More than THB 200,000

| IV. Nex | t, we would like to ask you a few questions about your health |
|----------------|--|
| 10. Hov | v would you describe your health? |
| \circ | Excellent |
| 0 | Good |
| 0 | Average |
| 0 | Poor |
| 0 | Terrible |
| the app | ow are some health problems that people may experience at different stages in life. Please check ropriate box for each that you have experienced or have been treated in the past 12. Check as many boxes as applicable. |
| 0 | Stroke |
| 0 | Chronic orthopedic, back or spine problem |
| 0 | High blood pressure |
| 0 | Ulcers |
| 0 | Heart attack or heart problems |
| 0 | Kidney or bladder disease |
| 0 | Cancer |
| 0 | Nervous or mental disorder |
| 0 | Diabetes |
| 0 | Asthma or respiratory disorders |
| 0 | Arthritis or rheumatism |
| 0 | Migraine headaches |
| 0 | None of these |
| 12. How (numbe | w many prescription drugs for chronic conditions are you presently taking on a regular basis |
| 13. To v | what age do you hope to live at the very least? |
| 0 | I hope to live to age/years at the very least |
| put the a | ally, we would like to ask you a few questions for statistical purposes only that would help us answers you have given us into categories and group them with those others have given us. For rite-in the answer or check the box that corresponds to the response category which most applies to you. |
| 14 A. Y | OUR BIRTHDAY |
| 0 | Day |
| 0 | Month |
| \circ | Year |

Employed full-time

| College of Management, Mahidol Univ. | | Ph.D.(Management) / 18 |
|--|------------------------------|------------------------------------|
| 14 B. YOUR GENDER | | |
| FemaleMale | | |
| 14 C. For each person who presently l son, mother, etc.) and his or her approxi go to the next page. | | |
| | | Age |
| 1. | | |
| 2. | | |
| 3. | | |
| 4. | 011178 | |
| 5. | 300 | |
| 3. | | |
| 14 D. What is the approximate total mo combined before taxes? | nthly income of all the pers | sons who live in your household |
| ○ Under THB 15,000 | | |
| O THB 15,001 - THB 30,000 | | |
| O THB 30,001 - THB 50,000 | | |
| O THB 50,001 – THB 70,000 | | |
| O THB 100,001 THB 100,000 | | |
| THB 100,001 – THB 200,000 More than THB 200,000 | | |
| Wiole than 111B 200,000 | | |
| 14 E. Please write-in the number of year grade. | ars you attended school or | college after the age of 12 or 6th |
| If you have a spouse or partner, please v school or college after the age of 12 or 6 | | your spouse (or partner) attended |
| 14 F. Please check ONE box to show your spartner, check ONE box to show your spartner. | | |
| | Yourself | Spouse/Partner |
| Retired or not employed | 0 | 0 |
| Retired and employed part-time | 0 | 0 |
| Retired and employed full-time | 0 | 0 |
| Employed part-time | 0 | 0 |

| 14 G. Please write-in the postcode | of your main residen | ce |
|------------------------------------|----------------------|------|
| 14 H. Today's date: Day | Month | Year |
| | | |

THANK YOU!



APPENDIX B2: Questionnaire-Thai Version

| | ., | | | |
|-----|------|----|---|---|
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| | | | | |

ชุดคำถาม

ผู้จัดทำขอขอบคุณที่ท่านสละเวลาเข้าร่วมการตอบแบบสอบถามทางวิชาการนี้ ชุดกำถามนี้เกี่ยวข้องกับความรู้สึก ประสบการณ์และนิสัยการบริโภคของท่าน ไม่ มีคำตอบใดถูกหรือผิด เราจะไม่ทราบและระบุชื่อผู้ตอบแบบสอบถาม โดยจะรวมคะแนนเข้ากับผู้ตอบแบบสอบถามท่านอื่น การเข้าร่วมการตอบแบบสอบถาม ของท่านเป็นไปด้วยความสมัครใจ แต่อย่างไรก็ตามเราไม่อาจขอให้หลายคนช่วยตอบแบบสอบถามนี้ได้ กรุณาอ่านแบบสอบถามอย่างละเอียดและตอบกำถาม อย่างดีที่สุดเพื่อให้การศึกษาประสบความสำเร็จ ขอขอบคุณมา ณ ที่นี้

ภัทรณิชชา ประกิตสุวรรณ นักสึกษาปริญญาเอก วิทยาลัยการจัดการ มหาวิทยาลัยมหิดล

- I. ก่อนอื่นเราขอสอบ<mark>ถาม</mark>นิสัยและรูปแบ<mark>บการใช้</mark>ชีวิตวัยผู้ใหญ่ของท่าน
- ข้อความต่อไปนี้บรรยายฉิสัยและรูปแบบการใช้ชีวิตวัยผู้ใหญ่ของหลายๆคน โปรดระบุว่าข้อความต่อไปนี้บรรยายฉึงตัวท่านอย่างเต็มที่ อย่างมาก บางส่วน หรือไม่ตรงกับตัวท่านเลยในช่วงวัยผู้ใหญ่ส่วนใหญ่ และหากข้อความเหล่านี้บรรยายฉึงนิสัยในช่วงวัยผู้ใหญ่ส่วนใหญ่ โปรดระบุอายุโดยประมาณที่ท่านเริ่มทำการกระทำนั้น (เริ่มที่อายุ)

| นิสัยและรูปแบบการใช้ชีวิต | ไม่ตรงกับนิสัย ของฉันเลย | ตรงกับนิสัย ของฉัน บางส่วน | ตรงกับนิสัยของ ฉันอย่างมาก | ตรงกับนิสัย ของฉันอย่าง เต็มที่ | เริ่มที่ อายุ |
|---|-----------------------------|----------------------------------|-------------------------------|---------------------------------------|------------------|
| จดบันทึกเงินที่ใช้ไปเป็นประจำทุกวัน | | | 0 | 0 | |
| พยายามหาเพื่อนใหม่และใช้เวลากับพวกเขา | 0 | 0 | 0 | 0 | |
| ทำรายการสิ่งที่ต้องทำ | 0 | | | 0 | |
| ออกกำลังกายเป็นประจำ | 0 | 0 | | 0 | |
| วางแผนเวลาเพื่อทำสิ่งค่างๆในแต่ละวัน | 0 | 0 | 0 | 0 | |
| วางแผนล่วงหน้าเพื่อรับมือกับสิ่งเลวร้ายที่สุดที่ อาจเกิดขึ้น | 0 | 0 | 0 | 0 | |
| เตรียมการให้แน่ใจว่าจะไม่มีเรื่องร้ายๆเกิดขึ้น | 0 | 0 | 0 | 0 | |
| ชำระค่าบัตรเครดิตเต็มจำนวน | 0 | 0 | 0 | 0 | |
| บันทึกเหตุการณ์หรือกิจกรรมสำคัญอย่างละเอียด | 0 | 0 | 0 | 0 | |
| เก็บออมต่อเมื่อมีเงินเหลือจากการใช้จ่ายทั้งหมด | 0 | 0 | 0 | 0 | |

| นิสัยและรูปแบบการใช้ชีวิต | ไม่ตรงกับนิสัย ของฉันเลย | ตรงกับนิสัย ของฉัน บางส่วน | ตรงกับนิสัยของ ฉันอย่างมาก | ตรงกับนิสัย ของฉันอย่าง เต็มที่ | เริ่มที่ อายุ |
|---|-----------------------------|----------------------------------|-------------------------------|---------------------------------------|------------------|
| ตรวจร่างกายประจำปี | 0 | 0 | 0 | 0 | |
| ทำงานที่ได้รับมอบหมายทุกอช่างเต็ม ความสามารถและกระตือรือร้น | 0 | 0 | 0 | 0 | |
| ชึดแผนที่วางไว้แทนที่จะเปลี่ยนแผนอยู่เรื่อยๆ | 0 | 0 | 0 | 0 | |
| สละความอร่อยเพื่อสารอาหารที่มีประโยชน์ | 0 | 0 | 0 | 0 | |
| แบ่งเงินจำนวนหนึ่งออกจากเงินเคือน โดย อัตโนมัติ | | 0 | | 0 | |
| มีส่วนร่วมในแผนหลังเกษียณผ่านนายจ้างหรือใน รูปแบบอื่นที่ตั้งไว้ | 0 | 0 | 0 | 0 | |
| ใช้เวลากับครอบครัวโดยสละเวลาจากกิจกรรม ส่วนตัวอื่น | 0 | | | 0 | |
| เก็บเงินไว้ใช้ยามจำเป็นแทนที่จะใช้ไป | 0 | | | 0 | |
| ตั้งเป้าหมายและตารา <mark>งเวลา</mark> เพื่อให้สำเร็จลุล่วง | 0 | | 0 | 0 | |
| ทำสิ่งที่ต้องทำก่ <mark>อ</mark> นจะทำสิ่งที่รอ <mark>ได้ห</mark> รือสิ่งที่ชอบ | 0 | | | 0 | |
| พยาขามเป็นพ่อแม่หรือคู่ครอง (คู่รัก) ที่ดี | 0 | | 0 | 0 | |
| กินวิตามินและเกลือแร่ทุกวัน | 0 | 0 | 0 | 0 | |
| จัดลำคับความสำคัญของสิ่งที่ต้องทำในแต่ละวัน | 0 | 0 | 0 | 0 | |
| มีความจำเป็นต้องทำอะไรบางอย่างในแต่ละวัน | 0 | 0 | | 0 | |
| สวคมนต์หรือเข้าร่วมพิธีกรรมทางศาสนา | 0 | 0 | 0 | 0 | |
| ฉีควักซีนป้องกันใช้หวัดประจำปี | 0 | 0 | 0 | 0 | |
| ทำตามความต้องการของครอบครัวไว้ก่อนของ ตัวเอง | 0 | 0 | 0 | 0 | |
| หาวิธีเอาชนะหรือปรับตัวเข้ากับความขัดแย้งและ ความท้าทายในชีวิต | 0 | 0 | 0 | 0 | |
| พยายามชื้อของรากาแพง | 0 | 0 | 0 | 0 | |
| ซื้อของเพื่อทำให้ผู้อื่นประทับใจ | 0 | 0 | 0 | 0 | |
| พยายามมีความสุขกับความหรูหราในชีวิต | 0 | 0 | 0 | 0 | |

II. ต่อไปเราขอถามคำถามเกี่ยวกับชีวิตของท่านในปัจจุบัน

2. คนเรามีความสุขจากสิ่งที่ทำต่างกันไป จากแหล่งความสุขทั้งหมดที่ระบุไว้ด้านล่าง โปรดทำเครื่องหมายถูกในวงกลมว่าท่านมักมีความพึงพอใจจากการทำสิ่ง เหล่านี้แก่ไหน

| ความพึงพอใจที่มักได้รับ | ไม่มี | มีบางครั้ง | มี พอสมควร | มีมาก |
|---|-------|------------|---------------|-------|
| ใช้เวลากับสมาชิกครอบครัวที่สนิท | 0 | 0 | 0 | 0 |
| มีปฏิสัมพันธ์กับเพื่อนหรือ "คนสำคัญ" | 0 | 0 | 0 | 0 |
| ใช้โซเชียลมีเดีย เช่น ไลน์ เฟซบุ๊ก และอินสตาแกรม | 0 | 0 | 0 | 0 |
| ทำงานประจำที่ทำงานหรือที่บ้าน | 0 | 0 | 0 | 0 |
| สวคมนต์หรือนั่งสมาชิ | | | 0 | 0 |
| ออกกำลังกาย | 0 | | 0 | 0 |
| ดูโทรทัศน์หรื ออ่านห <mark>นังสื</mark> อ เช่น นิตยสารห <mark>รือหนังสือพิมพ์</mark> | 0 | | 0 | 0 |
| วางแผนหรือออกไปท่องเที่ยว | 0 | 0 | 0 | 0 |
| เล่นการพนันหร <mark>ือ</mark> เกมที่ต้องใช้คว <mark>ง</mark> | 0 | 0 | 0 | 0 |
| ให้เวลาหรือเงินแก่อง <mark>ค์กรที่</mark> ไม่ <mark>แส</mark> วงหาผลกำไร เช่น มูลนิ <mark>ธิ</mark> | 0 | 0 | 0 | 0 |
| ช่วยคนหรือสัตว์ที่ต้องการความช่วยเหลือ | 0 | 0 | 0 | 0 |
| ใช้เวลาทำงานอดิเรกหรือกิจกรรมขามว่าง | 0 | 0 | 0 | 0 |
| ช้อปปังหรือซื้อของ | 0 | | \circ | 0 |

3. คนเรามีความสุขจากสิ่งที่ให้ค่าต่างกันไป จากแหล่งความสุขทั้งหมดที่ระบุไว้ด้านล่าง โปรดทำเครื่องหมายถูกในวงกลมว่าท่าน มักมีความพึงพอใจจากการคิดถึงสิ่งเหล่านี้เพียงใด ไม่พึงพอใจ พึงพอใจบางครั้ง พึงพอใจพอสมควรหรือพึงพอใจมากเมื่อคิดถึงสิ่งเหล่านี้

| ความพึงพอใจที่ได้เมื่อกิดถึง | ไม่พึงพอใจ | พึ่งพอใจ บางครั้ง | พึ่งพอใจ พอสมควร | พึ่งพอใจมาก |
|---|------------|----------------------|---------------------|-------------|
| ความสัมพันธ์ต่อคู่ครอง/คู่รัก หรือสมาชิกในครอบครัวที่สนิท | 0 | 0 | 0 | 0 |
| ความสำเร็จหรือศักยภาพของคนที่เรารัก | 0 | 0 | 0 | 0 |
| ความสัมพันธ์ต่อเพื่อนหรือ "คนสำคัญ" | 0 | 0 | 0 | 0 |
| รู้ว่าญาติสนิทหรือเพื่อนสนิทเข้าใจว่าฉันรู้สึกต่อสิ่งต่างๆอย่างไร | 0 | 0 | 0 | 0 |
| รู้ว่าญาติสนิทหรือเพื่อนสนิทห่วงใชฉันมากเพียงใด | 0 | 0 | 0 | 0 |

| ความพึงพอใจที่ได้เมื่อคิดถึง | ไม่พึ่งพอใจ | พึงพอใจ บางครั้ง | พึ่งพอใจ พอสมควร | พึ่งพอใจมาก |
|--|-------------|---------------------|---------------------|-------------|
| รู้ว่าฉันสามารถพึ่งพาญาติสนิทหรือเพื่อนสนิทเมื่อมีปัญหาหนักได้แค่ ใหน | 0 | 0 | 0 | 0 |
| สถานการณ์ทางการเงินปัจจุบันหรืออนากต | 0 | 0 | 0 | 0 |
| สุขภาพปัจจุบันเมื่อเทียบกับเมื่อ 10 ปีที่แล้ว | 0 | 0 | 0 | 0 |
| สุขภาพปัจจุบันเมื่อเทียบกับคนในวัยเคียวกัน | 0 | 0 | 0 | 0 |
| มีความเจ็บปว ดหรือไม่สบายตัวน้อยกว่าคนในวัยเคียวกัน | 0 | | 0 | 0 |
| ความเลื่อมใสในศาสนาหรือความเชื่อเรื่องจิตและวิญญาณ | 0 | 0 | 0 | 0 |
| งานหรืออาชีพปัจจุบันหรือก่อนหน้า | | 0 | 0 | 0 |
| แผนการในอนาคต | | 0 | 0 | 0 |
| ประสบการณ์ชีวิตที่ผ่านมา | | 0 | 0 | 0 |
| ความสำเร็จในชีวิตเมื่อเทียบกับ <mark>คว</mark> ามสำเร็จของผู้อื่นใน <mark>ช่วงเดียวกัน</mark> ของชีวิต | | 0 | 0 | 0 |
| ความสำเร็จในชีวิตเมื่อเทียบกับสิ่งที่ฉันหรือคนอื่นคาดหวังต่อตัว <mark>ฉั</mark> น | | | 0 | 0 |
| สิ่งที่แสดงถึงมรดก ชีวิตหรือประวัติครอบครัว เช่น รูปถ่ายหรือของที่ ระลึก | 0 | 0 | 0 | 0 |
| ของรักของฉันหรือของที่ไม่มีอะไรมาแทนได้ | 0 | | 0 | 0 |
| วัตถุที่ฉันครอบครอง เช่น รถขนต์ บ้าน เสื้อผ้าและเครื่องประดับ | 0 | 0 | 0 | 0 |
| 4. ราชการด้านล่างคือวิธีการที่คนเราใช้รับมือกับความเปลี่ยนแปลงและความท้า ความเปลี่ยนแปลงและความท้าทายครั้งใหญ่ในชีวิตส่วนใหญ่ของช่วงวัยผู้ใหญ่เ หรือไม่เลย | - | • | | |
| วิธีการรับมือกับความเปลี่ยนแปลงและความท้าทายในชีวิต | | ไม่เลย | เล็กน้อย | มาก |
| ทำสิ่งที่กนอื่นกาดหวังให้ทำ | | 0 | 0 | 0 |
| ทำสิ่งที่คนส่วนมากทำเมื่อเจอปัญหาเดียวกัน | | \circ | 0 | 0 |

| วิธีการรับมือกับความเปลี่ยนแปลงและความท้าทายในชีวิต | ไม่เลย | เล็กน้อย | มาก |
|---|--------|----------|-----|
| ขอคำแนะนำจากผู้ที่ตกอยู่ในสถานการณ์เดียวกันว่าควรจะรับมือสถานการณ์ใหม่ อย่างไร | 0 | 0 | 0 |
| ขอคำแนะนำจากผู้เชี่ยวชาญว่าควรจะรับมือสถานการณ์ใหม่หรือปัญหาอย่างไร | 0 | 0 | 0 |
| วิเคราะห์สถานการณ์หรือปัญหาก่อนลงมือทำ | 0 | 0 | 0 |
| พยายามทำความเข้าใจสถานการณ์ใหม่หรือปัญหาก่อนลงมือทำ | 0 | 0 | 0 |
| ใช้เวลาคิดถึงทางออกที่มีในการจัดการปัญหาหรือสถานการณ์ใหม่ | 0 | 0 | 0 |
| ทำทุกอย่างเพื่อจบปัญหาด้วยตัวเอง | | 0 | 0 |
| เก็บความรู้สึกเกี่ยวกับปัญหาไว้กับตัวเอง | 0 | 0 | 0 |
| พยายามไม่คิดถึงปัญหาหรือสถานการณ์ใหม่ | 0 | 0 | 0 |
| มองหาคนที่จะยอมรับ เห็นใจ และเข้าใจท่าน | 0 | 0 | 0 |
| หลีกเลี่ยงการอยู่กับผู้คน | 0 | 0 | 0 |
| ฝันกลางวันหรือ จินตนาการถึงช่ <mark>วง</mark> เวลาที่ดีกว่า | 0 | 0 | 0 |
| ปกปิดเรื่องราว <mark>ไ</mark> ม่ให้ <mark>คนอื่น</mark> รู้ | 0 | 0 | 0 |
| มองสถานการณ์จากมุมมองที่แตกต่าง | 0 | 0 | 0 |
| พยายามไม่ทำอะไรอย่างรีบร้อน | 0 | 0 | 0 |
| สวคมนต์ (หรือทำสมาธิ) โดยหวังว่าสถานการณ์จะเปลี่ยนไป | 0 | 0 | 0 |
| รอและหวังว่าปัญหาหรือสถานการณ์จะเปลี่ยนไปเอง | | 0 | 0 |
| เรียนรู้เกี่ยวกับปัญหาใหม่หรือสถานการณ์ที่เจอให้มากที่สุด | | 0 | 0 |
| พยายามเข้าใจทางเลือกก่อนตัดสินใจ | 0 | 0 | 0 |
| พึ่งพาคำแนะนำจากคนที่มีความรู้มากกว่าฉัน | 0 | 0 | 0 |
| ทำตามความรู้สึกลึกๆหรือสัญชาตญาณของตนมากกว่าความจริงหรือความเห็นของ ผู้อื่น | 0 | 0 | 0 |

จากข้อความค้านล่าง โปรดทำเครื่องหมายในข้อที่ตรงกับความคิดเห็นเห็นด้วยหรือไม่เห็นด้วยของท่านมากที่สุด

| | ไม่เห็นด้วยอย่าง ยิ่ง | ไม่เห็นด้วย บางส่วน | เห็นด้วยบางส่วน | เห็นด้วยอย่าง ยิ่ง |
|---|--------------------------|------------------------|-----------------|-----------------------|
| ฉันเริ่มมีความมั่นคงทางการเงิน | 0 | 0 | 0 | 0 |
| ฉันจะบรรลุเป้าหมายทางการเงินที่ตั้งไว้ให้ตัวเอง | 0 | 0 | 0 | 0 |
| ฉันได้เก็บ (หรือจะเก็บ) เงินมากพอสำหรับใช้จนวาระ สุดท้ายของชีวิต | 0 | 0 | 0 | 0 |
| ฉันจะมีความม ั่นคงทางการเงินจนว <mark>าระ</mark> ฮุดท้ายของชีวิต | 0 | 0 | | 0 |
| โดยปกติฉันรู้สึกว่ามีอิสระในการเลือกในชีวิตที่ผ่านมา | 0 | 0 | | 0 |
| โดยรวม ฉันพูดได้ <mark>ว่า</mark> ฉันมีอิสระในการเลือกตามความ ต้องการของฉันในช่วงวัยผู้ใหญ่ส่ <mark>วนใ</mark> หญ่ | | 0 | | 0 |
| มีหลายครั้งที่ค <mark>นอื่</mark> นจำกัดความ <mark>สา</mark> มารถในการเลือกสิ่งต่าง <mark>ๆ</mark> ในชีวิตฉัน เช่น ครอบครัว งานและเงิน | 0 | | 0 | 0 |
| ในบางเวลาฉันมั <mark>ก</mark> ลาดหวังสิ่งที่ดีที่ <mark>สุด</mark> | | 0 | 0 | 0 |
| ถ้าจะมีอะไรผิดพลาดเกิดขึ้นกับฉัน มันก็จะเกิดขึ้น | 0 | 0 | | 0 |
| ฉันมองอนาคตของฉันในแง่ดี | 0 | 0 | | 0 |
| ฉันไม่ค่อยกาดหวังให้สิ่งต่างๆเป็นไปอย่างที่ฉันกิด | | 0 | | 0 |
| ฉันไม่ค่อขอารมณ์เสียง่าย | 0 | 0 | 0 | 0 |
| ฉันไม่ค่อยไว้ใจสิ่งดีๆที่เกิดขึ้นกับฉัน | 0 | 0 | 0 | 0 |
| โดยรวมฉันกาดหวังให้มีสิ่งดีๆเกิดขึ้นกับฉันมากกว่าสิ่ง ร้ายๆ | 0 | 0 | 0 | 0 |

III. ต่อไปเราขอถามคำถามเกี่ยวกับประสบการณ์ชีวิตช่วงแรกของท่าน

6. รายการด้านล่างคือแหล่งที่มาที่คนเราใช้เรียนรู้การทำสิ่งต่างๆในขอบเขต 6 ขอบเขตที่ระบุไว้ โปรดทำเครื่องหมายถูกในช่องขอบเขตที่แหล่งที่มานั้นช่วยให้ ท่านได้เรียนรู้ในปัจจุบัน (แต่ละข้อตอบได้มากกว่า 1 ข้อ)

| ฉันเรียนรู้จาก | ทักษะและนิสัย ทางการเงิน | ทักษะและ นิสัยทาง สังคม | นิสัยในการ รักษา สุขภาพ | ค่านิยมและ นิสัยทาง จิตใจ | นิสัยในการ ทำงาน ประจำวันหรือ ดูแลบ้าน | ทักษะในการ ชื่อของและ นิสัยการใช้เงิน |
|--|-----------------------------|-------------------------------|-------------------------------|---------------------------------|---|---|
| พ่อแม่ สมาชิกในครอบครัวและ ญาติ | 0 | 0 | 0 | 0 | 0 | 0 |
| โรงเรียน | 0 | 0 | 0 | | 0 | 0 |
| เพื่อน เพื่อนร่วมงาน คนรู้จัก | 0 | 0 | 0 | 0 | 0 | 0 |
| ที่ปรึกษาหรือมืออาชีพ | | 0 | | 0 | 0 | 0 |
| สื่อต่างๆ (หนังสื <mark>อ</mark> พิมพ์ นิตยสาร โทรทัศน์ อินเต <mark>อ</mark> ร์เน็ต และอื่นๆ) | | 0 | | 0 | 0 | 0 |

7. ข้อความด้านล่<mark>างคื</mark>อสิ่งที่คนเราร<mark>ู้สึกเกี่</mark>ยวกับสิ่งที่มักพบเจ<mark>อในชีวิต โปรดทำ</mark>เครื่<mark>องหมายถูกเพื่อแสดงว่าท่านเห็</mark>นด้วยหรือไม่เห็<mark>นด้วยกับข้อความดังกล่าว</mark>

| | ไม่เห็นด้วยอย่าง ยิ่ง | ไม่เห็นด้ว <mark>ย</mark> บาง <mark>ส่วน</mark> | เห็นด้วยบางส่วน | เห็นด้วยอย่างยิ่ง |
|--|--------------------------|--|-----------------|-------------------|
| ชีวิตฉันในหลายด้านใกล้เกียงกับอุดมคติ | | | | 0 |
| ชีวิตความเป็นอยู่ของฉันดีเยี่ยม | 0 | 0 | | 0 |
| ฉันพึงพอใจกับชีวิตของฉัน | | | | 0 |
| ในชีวิตที่ผ่านมาฉันได้สิ่งที่สำลัญที่สุดที่ต้องการในชีวิตเป็น ส่วนมาก | 0 | 0 | 0 | 0 |
| ถ้าฉันได้ใช้ชีวิตอีกครั้ง ฉันแทบจะไม่เปลี่ยนอะไรเลย | 0 | 0 | 0 | 0 |
| ฉันประสบความสำเร็จด้วยตัวเอง | 0 | 0 | 0 | 0 |
| ฉันทำทุกอย่างที่ตั้งใจไว้ใด้ | 0 | 0 | 0 | 0 |
| ความโชคร้ายของฉันเป็นผลมาจากความผิดพลาดที่ฉันทำ | 0 | 0 | 0 | 0 |
| ฉันรับผิดชอบความผิดพลาดของฉันเอง | 0 | 0 | 0 | 0 |
| ส่วนมากสิ่งดีๆที่เกิดขึ้นกับฉันมาจากโชค | 0 | 0 | 0 | 0 |

| | ไม่เห็นด้วยอย่าง ยิ่ง | ไม่เห็นด้วย บางส่วน | เห็นด้วยบางส่วน | เห็นด้วยอย่างยิ่ง |
|--|---|---|----------------------|---|
| ฉันไม่ค่อขวางแผน ถ้าจะมีอะไรดีๆเกิดขึ้น มันก็จะมาเอง | 0 | \circ | 0 | 0 |
| ปั๊ญหาส่วนใหญ่ของฉันเกิดจากโชคร้าย | 0 | 0 | 0 | 0 |
| ฉันควบคุมสิ่งร้ายๆที่เกิดกับฉันไม่ค่อยได้ | 0 | 0 | 0 | 0 |
| ฉันขอมรับเสมอเมื่อทำผิด | 0 | 0 | 0 | 0 |
| ฉันพยายามทำในสิ่งที่สวดภาวนาเสมอ | 0 | 0 | 0 | 0 |
| ฉันไม่เคยไม่พ อใจเมื่อถูกขอให้ตอบแทนสิ่งที่ผู้อื่นทำให้ | 0 | | | 0 |
| ฉันไม่เคยรำคา ญเมื่อมีคนเสนอความคิดที่แตกต่างจากฉัน | 0 | 0 | | 0 |
| ฉันไม่เคยตั้งใจพูดอะไรที่ทำร้ายจิตใจใคร | 0 | | | 0 |
| ฉันชอบซุบซิบ นินทา <mark>บ้า</mark> งชั่วครั้งชั่วคราว | | 0 | | 0 |
| บางโอกาสที่ฉันเอาเปรียบบางคน | | 0 | 0 | 0 |
| บางครั้งฉันพย <mark>ายา</mark> มเอาคืนแทน <mark>ที่จ</mark> ะให้อภัยหรือลืมไปเสีย | 0 | | 0 | 0 |
| บางครั้งฉันดึงค <mark>ันจะทำตามแบบข</mark> องฉัน | 0 | | 0 | 0 |
| บางครั้งฉันอยากทุบหรือขว้างปา <mark>สิ่ง</mark> ของ | 0 | | 0 | 0 |
| 8. ถ้าท่านหรือคู่ครอง (หรือคู่รัก) มีงานทำอยู่ โปรดนับมูลค่าการออง ด้วย) และสิทธิประโยชน์หท่านหลังเกษียลอื่นๆ เงินที่เก็บไว้ใช้หลัง หุ้น ตราสารหนี้ และกองทุนรวม) และตรวจสอบยอดเงินโดยประ (หรือคู่รัก) จะต้องเกษียลเอายุในวันนี้ | มเ <mark>กษียณเท่านั้น</mark> รวมจึงบ รมาณที่ท่านจะได้รับจาก | ไระกันสังคม เงิน แหล่งเงินเหล่านี้ร <i>า</i> | บำนาญและเงินเก็บในบั | ูชีอื่น (ต [ิ] ราสารอนุพันธ์ ท่านหรือท่านและคู่ครอง |

| 0 | ของท่านเป็นอย่างไร ดีมาก | |
|---------------------|---|--|
| 0 | ที | |
| 0 | มาตรฐาน | |
| | | |
| 0 | ແຍ່ | |
| 0 | แย่มาก | |
| เ1. ต่อไปนี้ | , เป็นปัญหาสุขภาพที่คนอาจประสบได้ในช่วงต่างๆของชีวิต โปรดทำเครื่องหมายถูกในช่องโรคหรื ้ | ออาการที่ท่านเคยเป็นหรือได้รับการรักษาในช่วง |
| 12 เดือนที่เ | านมา สามารถเลือกได้มากกว่า 1 ข้อ | |
| 0 | โรกหลอดเลือดสมอง | |
| 0 | ป ั ญหาเรื่อรังเกี่ยวกับกระดูก หลัง <mark>หรือกระดูกสั</mark> นหลัง | |
| 0 | ความดันโลหิตสูง | |
| 0 | เป็นแผล | |
| 0 | หัวใจวายหรือโรคหัวใจ | |
| 0 | โรคไต หรือ <mark>ก</mark> ระเพาะป ั สสาวะ | |
| 0 | มะเร็ง | |
| 0 | ความ <mark>ผิดป</mark> กติของระบบ <mark>ประสาทหรือ</mark> จิต | |
| 0 | เบาหวาน | |
| 0 | โร <mark>กหอ</mark> บหืดหรือ โร <mark>กทาง</mark> เดินหายใจ | |
| 0 | ข้ออักเสบ หรือ โรค <mark>ไข</mark> ข้ออักเสบ | |
| 0 | ปวดสีรษะไมเกรน | |
| 0 | ไม่ <mark>มีปัญหาสุ</mark> ขภาพดั <mark>งก</mark> ถ่าวข้างต้น | |
| 12 . To 22 % | เ ท่านรับประทานยาสำหรับอาการเรื้อรังเป็นจำนวนกี่เม็ด (หากท่านใช้ยารูปแบบอื่นๆ ร่วมด้วย เช่า | 4 2 2 2 2 1 2 1 2 2 2 2 2 2 2 2 2 2 2 2 |
| | . กานวบบระกานอาสากรบย เการเรียรงเบนจาน เนกเมศ (คาเกาน เซอารูบแบบยน-) รามตาอเซา เวนชาเม็ดที่ท่านรับประทาน) | ร จเหม จเพศ เทศการการเทา เกษณยนค. |
| | (งว่าท่านจะมีชีวิตอยู่ถึงอายุเท่าใดเป็นอย่างน้อยที่สุด <i>(อายุ/ป</i> ี) | |
| | ง ภาพ เนขะมรางคอยู่เพย เดูเท เพเบนออาจนออกกุพ | San |
| | บดุพทเอ เราขอ เหท เฉษาอพอบค เถาม เพอเราขะ เคน เค เพอบาอองท เฉม เงคหม เคหมูรามกบค เพ เค <i>็ทวงสถิติเท่านั้น</i> ในแต่ละข้อ ขอให้ท่านเขียนคำตอบหรือทำเครื่องหมาย (√) ในช่องคำตอบที่ไก | |
| • | | าลเคยงกบตวทานมาก ทสุด |
| | นเกิด (ในกรฉีที่ท่านไม่สะควกระบุวันที่และเดือน ขอให้ระบุ ปี พ.ศ. เกิด) | |
| \circ | วันที่ | |
| \circ | เคือน | |
| \circ | ปี พ.ศ | |
| ข. เร | ที | |
| 0 | หญิง | |
| | | |
| | ชาย | |
| | เุคคลที่อาศัยอยู่กับท่านในปัจจุบัน กรุณาเขียนความสัมพันธ์ของท่านกับบุคคลดังกล่าว (เช่น ภรรย | า บุตรชาย มารดา ฯลฯ) และอายุของพวกเขา |
| โคยประมา | ณ ถ้าท่านอาศัยอยู่ตามลำพัง โปรคข้ามข้อนี้และทำข้อต่อไป | |
| ควา | มสัมพันธ์ | อายุ (ปี) |
| 1. | | |
| 2. | | |
| ۷. | | |

ความสัมพันธ์

3.

อายุ (ปี)

| 4. | | |
|--|--|--|
| 5. | | |
| ง. รายใด้ต่อเดือนก่อนหักภาษี <i>โดยประมาณ</i> ของครอา | บครัว (รวมทุกคนที่อาศัยอยู่กับท่า | านตามข้อ ค.) |
| น้อยกว่า 15,000 (บาท) | , , | |
| 🔾 15,001 - 30,000 (บาท) | | |
| 🔾 30,001 - 50,000 (บาท) | | |
| ◯ 50,001 – 70,000 (บาท) | | |
| ◯ 70,001 – 100,000 (บาท) | | |
| 🔾 100,001 – 200,000 (บาท) | | |
| O มากกว่า 200,0 <mark>00 (บาท</mark>) | | |
| จ. กรุณาระบุระยะเวลาที่ศึกษาในโรงเรียน, วิทยาลัยเ | หรือมหาวิทยาลัยหลั <mark>ง</mark> จากอายุครบ | บ 12 ปี |
| 1) ของตัวท่า <mark>นเอง(</mark> จำน | วนปีทั้งหมด) | |
| 2) ของคู่ส<mark>มรส</mark> หรือคู่รักขอ<mark>งท่าน</mark>ที่อาศัยอยู่ด้ ว | ยกัน (ถ้ามี)(| (จำนวนปีทั้งหมด) |
| ฉ. โปรดทำเครื่อ <mark>งห</mark> มายทุกช่องที่ <mark>ตรง</mark> กับสถานการณ์เ | การจ้างงานปัจจุบันของท่านและคุ่ | คู่สมรสของท่าน หรือคู่ <mark>รักข</mark> องท่านที่อาศั <mark>ยอยู่ด้วยกัน (ถ้ามี)</mark> |
| | ตัวท่าน | <mark>คู่สมรส หรือคู่</mark> รักของท่านที่อาศัยอยู่ด้วยกัน |
| เกษีย <mark>นอายุ ห</mark> รือไม่ได้ทำงาน | 0 | |
| เกษียนอายุ <mark>และทำงาน ไม่เต็มเว<mark>ลา</mark></mark> | 0 | |
| เกษียณอายุ และ <mark>ทำ</mark> งานเติ่มเวลา | 0 | 0 |
| ทำงานไ ม่เต็มเวลา | 0 | 0 |
| ทำงานเต็มเวลา | 0 | |
| | | |
| ช. กรุณาเขียนเขต และรหัสไปรษณีย์ของที่อยู่ | หลักของท่าน | |
| ซ. วันที่ตอบแบบสอบถาม | | |
| (วัน / เดือน | 1/웹) | |

ขอบคุณค่ะ

APPENDIX C DETAILS OF STATISTICAL ANALYSIS

APPENDIX C1: Results From Gretl

Model 1: OLS, using observations 1-804
Dependent variable: Life_Sat
Heteroskedasticity-robust standard errors, variant HC1

```
coefficient std. error t-ratio
                                                                                                          n-value
    const
                                                                                                          1.12e-09 ***
                                         1.00394
                                                                 0.162823
                                                                                         6.166
   Const 1.00394 0.102623 SWB_Financial 0.193277 0.0364161 SWB_Social 0.101561 0.0411048 SWB_Health 0.174156 0.0383478 SWB_Spiritual 0.0226479 0.0181384 SWB_Work -0.00346410 0.0245483 SWB_Spending -0.0828621 0.0344965 SWB_Accomplishme~ 0.227332 0.0572065 OWB Financial 0.0137337 0.0101594
                                                                                          5.307
                                                                                                          1.45e-07 ***
                                                                                          2.471
                                                                                                          0.0137
                                                                                     4.541
                                                                                                         6.46e-06 ***
                                                                                        1.249
                                                                                                          0.2122
                                        -0.00346410 0.0245483
                                                                                      -0.1411 0.8878
                                                                                       -2.402
                                                                                                          0.0165
                                                                                                                           **

      SWB_ACCOMPLISHME~
      0.227332
      0.0572065
      3.974
      7.72e-6

      OWB_Financial
      0.0137337
      0.0101594
      1.352
      0.1768

      OWB_Social
      0.0903098
      0.0289225
      3.122
      0.0019

      OWB_health
      0.0252765
      0.0130083
      1.943
      0.0524

      OWB_Spiritual
      0.00202237
      0.0300705
      0.06725
      0.9464

      OWB_Work
      0.00190324
      0.0227011
      0.08384
      0.9332

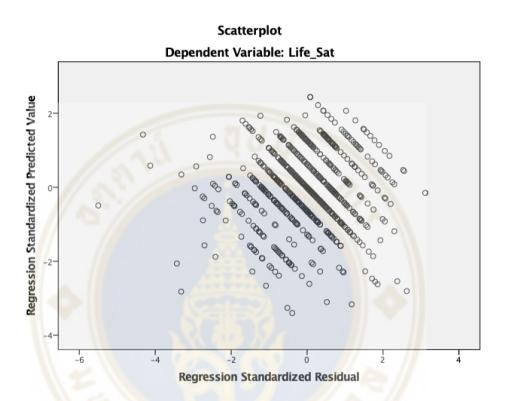
      OWB_Spending
      0.00588748
      0.0359512
      0.1638
      0.8700

                                                                                       3.974
                                                                                                          7.72e-05 ***
                                                                                                                           ***
    SocialDesirabili~ -0.0875354
                                                                 0.0349896
                                                                                       -2.502
                                                                                                          0.0126
                                                                                                                           **
Mean dependent var 3.003980 S.D. dependent var 0.458580 Sum squared resid 88.96961 S.E. of regression 0.335801 R-squared 0.473139 Adjusted R-squared 0.463790 F(14, 789) 56.75789 P-value(F) 3.9e-109
F(14, 789)
Log-likelihood -255.9022 Akaike criterion Schwarz criterion 612.1484 Hannan-Quinn
                                                            Akaike criterion
                                                                                                  541.8044
                                                                                                  568.8210
Excluding the constant, p-value was highest for variable 327 (OWB_Spiritual)
Non-linearity test (squares) -
   Null hypothesis: relationship is linear
    Test statistic: LM = 22.0156
   with p-value = P(Chi-square(14) > 22.0156) = 0.0782942
Test for normality of residual -
   Null hypothesis: error is normally distributed
    Test statistic: Chi-square(2) = 70.7874
   with p-value = 4.25313e-16
White's test for heteroskedasticity -
    Null hypothesis: heteroskedasticity not present
    Test statistic: LM = 319.19
    with p-value = P(Chi-square(119) > 319.19) = 3.20367e-20
```

APPENDIX C2: Variance Inflation Factor (Vif) Statistics Using Gretl

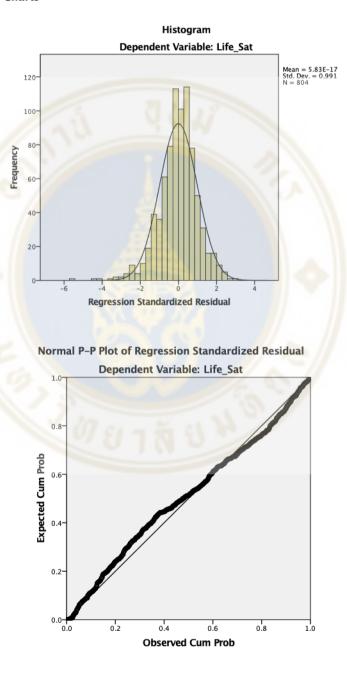
```
Variance Inflation Factors
Minimum possible value = 1.0
Values > 10.0 may indicate a collinearity problem
      SWB_Financial
                       1.728
         SWB_Social
                       2.792
         SWB Health
                     1.655
                       1.454
      SWB_Spiritual
           SWB Work
                       1.935
       SWB Spending
                       3.094
SWB_Accomplishments
                       5.152
      OWB_Financial
                       1.338
        OWB Social
                      1.685
         OWB health
                       1.162
      OWB Spiritual
                      2.048
           OWB Work
                      1.646
      OWB_Spending
                       2.276
 SocialDesirability
                       1.213
```

APPENDIX C3: Scatter Plot Of Regression Standardized Predicted Value And Standardized Residuals



APPENDIX C4: Histogram And Normal Probability Plot Of Standardized Residuals

Charts



Scatterplot

APPENDIX C5: Casewise Diagnostics For Standardized Residuals

Casewise Diagnostics^a

| Case Number | Std. Residual | Life_Sat | Predicted Value | Residual |
|-------------|---------------|----------|--------------------|----------|
| 1 | -5.502 | 1.00 | 2.8476 | -1.84763 |
| 2 | -4.324 | 2.00 | 3.4521 | -1.45215 |
| 3 | -4.131 | 1.80 | 3.1873 | -1.38734 |
| 4 | -3.433 | 1.20 | 2.3528 | -1.15285 |
| 5 | -3.317 | 1.00 | 2.1138 | -1.11380 |
| 6 | -3.312 | 2.00 | 3.1122 | -1.11218 |
| 804 | 3.111 | 4.00 | 2.9553 | 1.04468 |

a. Dependent Variable: Life_Sat

Residuals Statisticsa

| | Minimum | Maximum | Mean | Std. Deviation | N |
|-------------------------|----------|---------|--------|-------------------|-----|
| Predicted Value | 1.9312 | 3.7722 | 3.0040 | .31543 | 804 |
| Residual | -1.84763 | 1.04468 | .00000 | .33286 | 804 |
| Std. Predicted Value | -3.401 | 2.435 | .000 | 1.000 | 804 |
| Std. Residual | -5.502 | 3.111 | .000 | .991 | 804 |

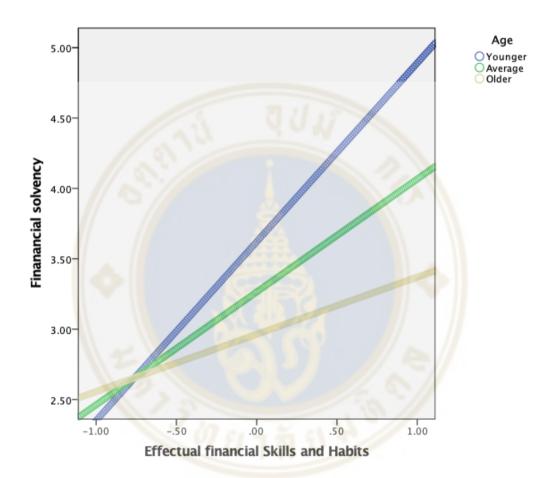
a. Dependent Variable: Life_Sat

Descriptive Statistics

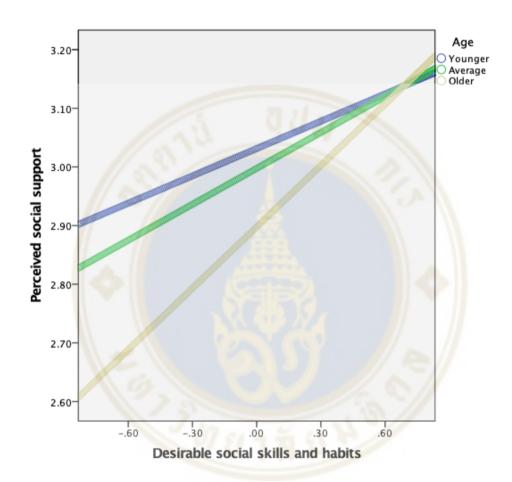
| N | Minimum | Maximum | Mean | Std. Deviation |
|-----|--|--|---|---|
| 804 | 43585 | .26616 | 0000306 | .04253902 |
| 804 | 15294 | .48000 | .0000439 | .03828451 |
| 804 | 30249 | .22917 | 0000596 | .04320004 |
| 804 | 31106 | .16945 | 0000192 | .03838993 |
| 804 | 33034 | .80878 | .0000637 | .04914476 |
| 804 | 14263 | .31006 | .0000458 | .03887472 |
| 804 | 36048 | .23553 | 0000195 | .03911951 |
| 804 | 32240 | .19958 | .0000134 | .03837036 |
| 804 | 32998 | .35290 | .0000295 | .03877941 |
| 804 | 30621 | .31905 | .0000223 | .04176415 |
| 804 | 21968 | .30907 | 0000078 | .04047119 |
| 804 | 31273 | .23523 | 0000070 | .03672072 |
| 804 | 18464 | .41566 | .0000227 | .03793324 |
| 804 | 26169 | .23586 | 0000116 | .03959530 |
| 804 | 38505 | .34034 | 0000558 | .04034336 |
| 804 | | | | |
| | 804 804 804 804 804 804 804 804 804 804 | 80443585 80415294 80430249 80431106 80433034 80414263 80436048 80432240 80432240 80432998 80430621 80421968 80431273 80418464 80426169 80438505 | 804 43585 .26616 804 15294 .48000 804 30249 .22917 804 31106 .16945 804 33034 .80878 804 14263 .31006 804 36048 .23553 804 32240 .19958 804 32998 .35290 804 30621 .31905 804 21968 .30907 804 31273 .23523 804 26169 .23586 804 38505 .34034 | 804 43585 .26616 0000306 804 15294 .48000 .0000439 804 30249 .22917 0000596 804 31106 .16945 0000192 804 33034 .80878 .0000637 804 14263 .31006 .0000458 804 36048 .23553 0000195 804 32240 .19958 .0000134 804 32998 .35290 .0000295 804 30621 .31905 .0000223 804 31273 .23523 0000070 804 18464 .41566 .0000227 804 26169 .23586 0000116 804 38505 .34034 0000558 |

APPENDIX D DETAILS OF MODERATING ANALYSIS USING PROCESS, BY ANDREW F. HAYES

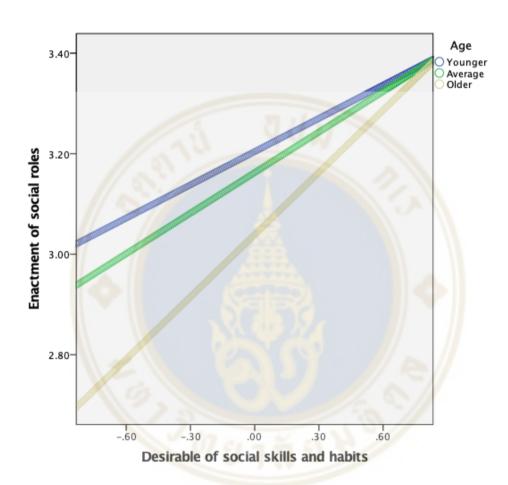
APPENDIX D1: The Interaction Plot Between Effectual Financial Skills And Habits, And Timing Of Onset Of Financial Skills And Habits On Level Of Financial Solvency



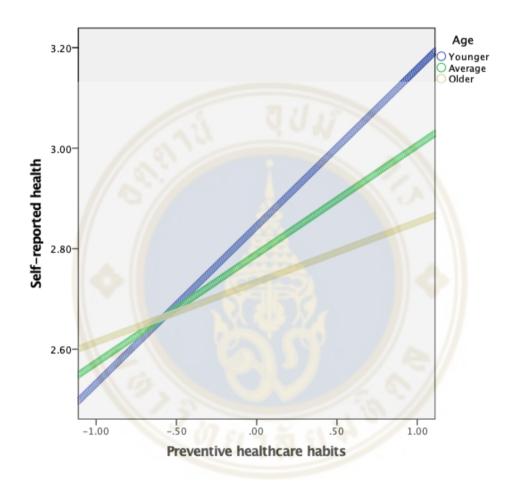
APPENDIX D2: The Interaction Plot Between Desirable Social Skills And Habits, And Timing Of Onset Of Social Skills And Habits On Perceived Social Support



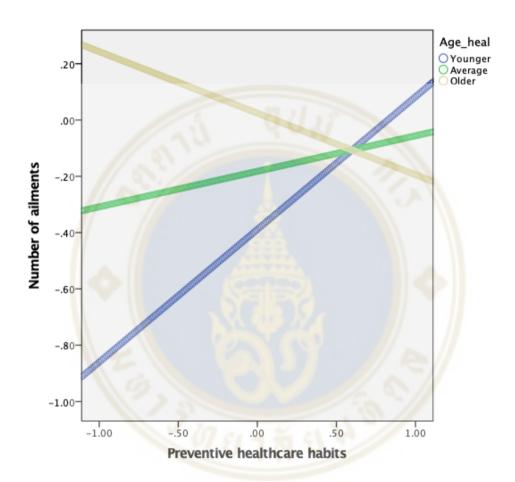
Appendix D3: The Interaction Plot Between Desirable Social Skills And Habits, And Timing Of Onset Of Social Skills And Habits On The Level Of Enactment Of Social Roles



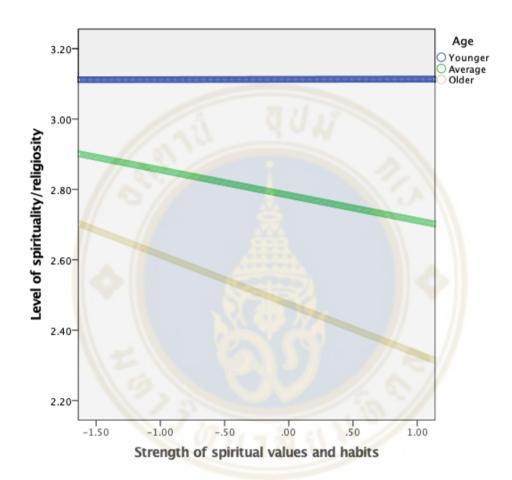
APPENDIX D4: The Interaction Plot Between Preventive Healthcare Habits And Timing Of Onset Of Preventive Healthcare Habits On Level Of Self-Reported Health



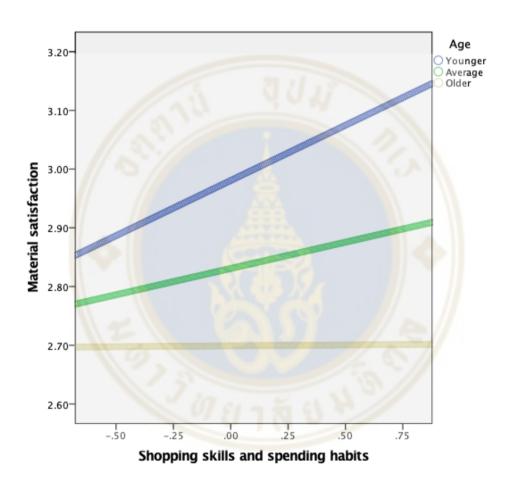
APPENDIX D5: The Interaction Plot Between Preventive Healthcare Habits And Timing Of Onset Of Preventive Healthcare Habits On The Number Of Ailments



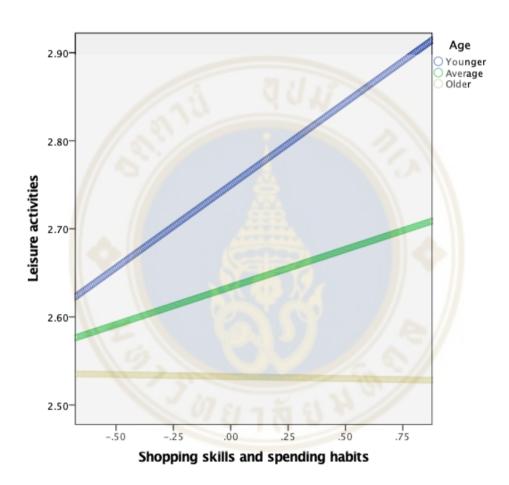
APPENDIX D6: The Interaction Plot Between The Strength Of Spiritual Values And Habits And Timing Of Onset Of Spiritual Values And Habits On Level Of Spirituality/Religiosity



APPENDIX D7: The Interaction Plot Between Engagement In Shopping Skills And Spending Habits And Timing Of Onset Of Engagement In Shopping Skills And Spending Habits On Level Of Material Satisfaction



APPENDIX D8: The Interaction Plot Between Engagement In Shopping Skills And Spending Habits And Timing Of Onset Of Engagement In Shopping Skills And Spending Habits On Level Of Leisure Activities



APPENDIX D9: The Interaction Plot Between The Employment Of Planning Skills And Habits, And Timing Of Onset Of Employment Of Planning Skills And Habits On The Favorability Of Cognitions About One's Accomplishments

