

# Workers' Happiness: An Analysis of the Value of Family and Work among Generational Cohorts

Charamporn Holumyong<sup>1</sup> and Sureeporn Punpuing<sup>2</sup>

*This study investigates the influences of job and family satisfaction on industrial workers' happiness and observes the role of generational cohorts. The findings show the positive influence of job and family satisfaction on happiness for all generations. However, demographic diversity exists regarding how workers value their work and family lives. Applying utility theory, the level of marginal rate of substitution (MRS) of family satisfaction for job satisfaction is shown to differ by generational cohorts. Even though job and family satisfaction are abstract concepts which cannot be perfectly substituted by other things, differing MRS levels offer insights into how each generation values family and work. Compared to other generations, the value of work is relatively high for Generation X workers. On the other hand, this study suggests Generation Y workers place the highest value on family when compared to older generations.*

**Keywords:** Happiness, work and family, work-life balance, job satisfaction, family satisfaction

## 1. Introduction

Human decisions about work effort are puzzling. Some people are willing to devote most of their time towards their work. Others choose to spend most of their time with family members, not allowing stressful work routines and responsibilities to interrupt their quality time. How an individual values things relates to their incentive to put effort into them, including physical and mental effort as well as time (Becker, 1985). Some people place the highest value on their family life. For others, career achievement is highly valuable, driving them to sacrifice their private time for work time. When trying to understand the value of work, perhaps economic theory can explain this puzzle.

Recently, economists have applied economic theory to the study of happiness. Scholars essentially merged the concepts of utility and happiness (Frey & Stutzer, 2000; Frey, 2008; Easterlin, 2001; Smith, 2013). Subjective well-being as measured by psychology was used as a proxy of utility. Utility is the economists' tool to measure happiness and satisfaction in order to explain individual decision-making. Though utility is not a perfect proxy for happiness, application of utility theory provides new insights into how human beings value goods and services. It helps explain how individuals value things, including social conditions of non-material value. In this study, the concept of utility is applied to investigate how workers value work and family and if their comparative values vary by generation. Do people of different generations value work and family differently?

Perceived value of work and family reflects workers' choices to allocate their time in their office and at home. Work-life balance plays an essential role to improve workers' quality of

---

<sup>1</sup> Institute for Population and Social Research, Mahidol University, Thailand. Email: [charamporn.hol@mahidol.ac.th](mailto:charamporn.hol@mahidol.ac.th)

<sup>2</sup> Institute for Population and Social Research, Mahidol University, Thailand

life and sustain the strength of an organization. Previous research indicates that organizations benefit from human resource policies that aim to promote work-life balance. The literature also underscores the need to improve workplace environments and working conditions, thus increasing the skilled potential of the workforce. Chimote and Srivastava (2013) claim that balancing work and personal life increases employee productivity and company loyalty, while also reducing absenteeism and staff turnover. Burke and Cooper (2008) point out those workers who have work-life balance perceive work as a joy. Moreover, career and life satisfaction which they say is the root of workers' well-being can be built through work-life balance.

Business organizations and social policy researchers have reignited their interest on workers' happiness as the link to effective productivity (Ledford, 1999; Oswald, Eugenio & Daniel, 2009). To successively promote happiness in the workplace, understanding workers' happiness is increasingly recognized as essential (Fisher, 2010; Boehm & Lyubomirsky, 2008).

Happiness has long been considered the subjective experience of joy, anxiety, anger, pleasure and pain (Duncan, 2005). Subjective well-being is a broad notion described as happiness which circumscribes one's life satisfaction (Diener & Lucas, 1999) that some scholars use as a proxy for utility (Smith, 2013). Veenhoven, a pioneer of the scientific study of happiness, once placed utility and happiness in the same arena. To explain how policies were prioritized to promote social well-being, he used the increase of happiness as a yardstick of utility that could be created from a certain policy (Veenhoven, 1988).

Richard Easterlin, an economist, used the concept of utility to explain the factors contributing to happiness. In general, income is positively associated with happiness, and the rich tend to be happier than the poor. However, this relationship disappears in the long-term. His finding, later widely known as Easterlin paradox, is that over the course of an individual's lifetime, higher income is not associated with greater happiness (Easterlin, 2001; Easterlin, 2003). In his analysis, the terms happiness, well-being, life satisfaction and utility were used interchangeably. Recently, Nobel Prize scholar Daniel Kahneman proposed that happiness can be measured objectively. His construct of objective happiness – measurements of an individual's feelings and moods over a period of time – linked to the principle focus of subjective well-being (Kahneman, 1999; Kahneman, Krueger, Schkade, Schwartz, & Stone, 2004). This study also connects the concept of well-being to happiness and applies the concept of utility to observe how workers value their work and family life.

Job satisfaction alone is not sufficient to promote happiness. Fair wages and good working environments are necessary to improve workers' well-being. Wages, employment protection, job security and workplace trust have strong effects on life satisfaction (Helliwell & Huang, 2010; Thurik, Hessels, Millán, & Aguado, 2011). However, workers who spend all of their lives in the office often fail to find happiness, regardless of their work conditions. Beside employment, other factors, including time-commitment to family, significantly contribute to personal happiness. Time-sharing with family members and a successful marriage have been shown to reduce stress and result in personal happiness. Based on a general theory for behavior of the family, a person must balance the time allocation between work life and non-work life, such as family life, to ensure maximum utility (Becker, 1965).

Work and family decisions are highly personal. Time spent on paid work and housework is associated with the level of workers' well-being (Glass & Fujimoto, 1994; Roxburgh, 2004). Empirical studies show that well-being tends to rise as hours of work increase. However, too man-hours negatively impact workers' well-being (Moen, 1992; Glass & Fujimoto, 1994).

Research findings are, however, complex regarding the effect of family on workers' happiness and well-being. Even though marriage and having children can improve life satisfaction (Angeles, 2010), time commitment to housework may negatively impact well-being (Glass & Fujimoto, 1994). To date, evidence for the effect of job and family satisfaction on workers' happiness is limited in developing countries, like Thailand. While workers' happiness drives productivity and, thus, helps organizations thrive (Achor, 2012), it is important to know how job and family satisfaction determine workers' happiness to suitably design measures that improve their happiness.

A typical workplace is filled with cohorts of workers, often corresponding to age. One generation is entering the workforce while other generations are performing at the executive or management level (Meier, Austin & Crocker, 2010; Collins, 1998). Though all generations contribute to the organization, factors related to their happiness can differ. Existing research about work and generational cohorts focuses on workers' characteristics and performance (Collins, 1998; Kupperschmidt, 2000), while their preferences and happiness are rarely studied. Most of the literature on generational cohorts also examines workers in developed countries (Howe & Strauss, 1992; Cennamo & Gardner, 2008; Kim, Knight & Crutsinger, 2009). Despite the lack of research on workers' happiness and issues of cohorts in developing countries, knowledge is crucial since these countries are essential producers in the world market. This paper, therefore, separates workers into groups of generational cohorts to study the role of generation on happiness in a developing country like Thailand. Our primary objective is to estimate the influences of job and family satisfaction on workers' happiness and examine how the values of family and work vary by generation.

## **2. Background**

### **2.1 The cohort gap and the generation gap**

Changes in cultural environments and social norms overtime influence values of work and family among generational cohorts. Expectation and perception about work and family can vary by generation. People in the same generation tend to share similar cultural beliefs and practices. People tend to prefer and feel more comfortable with communication and interactions with people in the same age group rather than interaction with someone older or younger. People of the same age also may share life experiences in the same era which could guide them to have similar norms, values, beliefs, attitudes, backgrounds and motivations that effectively bind people into a group, gang or team (Deal, 2007).

Generation refers to a group of people who are born and live in the same period. Generation can be defined by age or life experience, such as a group of people who get married in the same era or a group of students who graduate in the same year. In demography, the term generation reflects a group of people who are born from parents in the previous generation (e.g., children of immigrants are considered the second generation of immigrants) (Prasartkul, 2015). Well-known generations in Thailand typically are marked by important political events, such as the 'October 14' generation – people who lived and where involved in the October movement of the 1973 Thai popular uprising – or the 'Black May' generation – people who lived and were involved in the May 1992 popular protest in Bangkok (Thongthai, 2009).

Studies in the U.S. define generations based on years of birth, which is the standard that enables international comparison between countries. Many studies (Zickuhr, 2010; Norum, 2003; Strauss & Howe, 2006) separate generations into the following five groups:

- (1) GI Generation: Born between 1901 and 1927
- (2) Silent Generation: Born between 1928 and 1945
- (3) Boom Generation (Baby Boomers): Born between 1946 and 1964
- (4) Generation X: Born between 1965 and 1976
- (5) Generation Y: Born between 1977 and 1987

Currently, there are three primary generations active at the workplace: the Boom generation, Generation X and Generation Y.

Modern-day communication connects people from around the world, opening the door to multiculturalism. People in various parts of the world tend to share their norms and cultures. Important events in one country now impact people in other countries, such as the Greek debt crisis and Russian financial crisis. People in the same generation, regardless of their residential nations, tend to absorb similar life experiences that form their perception and behavior. With globalization, generations of people in Thailand could share similarities with those in other parts of the world (Thongthai, 2009).

People's behavior and expectations at the workplace can vary by generation. Beekman (2011) explained possible causes of differing attitudes, backgrounds and motivations of people from different generations. Economic climate of the time, for example, may be associated with the perspectives of people of different generations. Baby boomers were raised in a relatively healthy economic period. In Thailand, baby boomers grew up through the developing period of the nation after World War II. In their childhood, Thailand was under military rule for more than a decade by Field Marshal Sarit Thanarat and Field Marshal Thanom Kittikachorn (Ungpakorn, 1997). People were indoctrinated with the values of discipline and duty. Despite experiencing multiple army coups in the 1960s and 1970s, the country opened its doors to the world and welcomed investments from across the globe, helping the economy to improve. Baby boomers, therefore, developed a positive view about work. Working provides an essential source of income, but also a source of personal fulfillment (Beekman, 2011).

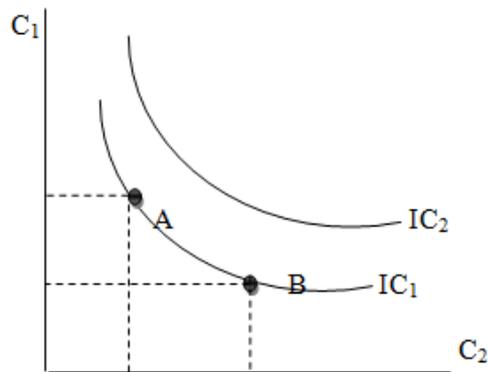
The next generation, Generation X grew up in an era of economic, societal and political transition. Generation Xers in Thailand were raised during time of conflict in political ideologies. A doctrine of socialism emerged while Thailand was enjoying democracy, shortly after its neighboring countries – Laos, Cambodia and Vietnam – were occupied by the Communist regimes. Despite government campaigns against communism from the 1970s to 1980s, many young Thais believed it was their right to choose their preferred ideology. On and off protests were organized mainly by students (Ungpakorn, 2002). In the early stage of labor force participation, Generation Xers encountered a high economic fluctuation from the great boom in late 1990s to the Asian financial crisis in 1997 (Bunbongkarn, 1992; Phongpaichit & Baker, 1999). For Generation X, their actions, including working hard or putting in no effort at all, were based on reflective thinking. They considered the importance of work life together with their personal life, aiming for a balance. Generation Xers, therefore, defined the workplace differently than the boomers. The notion of life-long employment faded as the idea of work became more like a temporary commitment (Beekman, 2011).

Considering the youngest generation in the workplace, Generation Y or the Millennials, Beekman (2011) suggests that they are people who grew up in a time of innovation. Since birth, their lives have been surrounded by computers and technology. Millennials in Thailand experienced this high-tech lifestyle, too. In general, Millennials are skilled at multitasking. Since work can be done anywhere, it should not be limited to the office. Millennials prefer jobs with flexibility in work time and location. They want to manage their own working schedule and work wherever is comfortable. For the job, with the flexible schedule and flexible places to work, it is not necessary for Generation Y to choose between work and family. Blessed with high technology gadgets, they can simultaneously work and spend time with their family members (Beekman, 2011). Gilbert (2011) describes Millennials as skilled in technology, well-educated and energetic. This generation of workers, however, can be quite impatient. Even though their desires for work-life balance are quite high, their willingness to work long hours are low compared to older workers, such as baby boomers (Gilbert, 2011).

The age of workers may be another factor directly linked to their motivation, job satisfaction and performance (Bruce & Blackburn, 1992). Older workers, especially those who are older than 50, are sometimes perceived as less competent and less innovative than younger workers. Rosen and Jerdee (1985; 1976) explained that older workers have long served in the workplace. They may reach the point of declining motivation, in part driven by organizations that discriminate against older employees. The relationship of adult development and the pursuit of goals and values have been critically studied since 1980s. Levinson (1978) analyzed adult development of a white man's life and segregated development into four stages: (1) Childhood and adolescence (0-22 years old), (2) early adulthood (17-45 years old) (3) middle adulthood (40-65 years old), and (4) late adulthood (60 years old and older). Life structure of each stage relates to how a person pursues goals and values. Levinson's studies were groundbreaking in that they linked adult development with human goals. The concepts have been extended and adjusted to promote workforce diversity and make them serve well in all environments (Gilligan, 1979; Roberts, Walton & Viechtbauer, 2006; Costa, Herbst, McCrae & Siegler, 2000).

## 2.2 Utility function and happiness

Economics is guided by the notion of unlimited human desires in the face of resources that are finite. Limited resources drive people to make choices, and preferences of people vary. A decision made by one person could differ from another under similar circumstances, since consumers possess diverse tastes based on their individual characteristics, cultures and social norms. Economists created the indifference curve to simplify people's taste and their possible choices of consumption (Mankiw, 2012). Disregarding the paradox and the subtle process of human decision-making, the theory of consumer preferences considers the two-commodity case, with the assumption of *ceteris paribus*. A person's preferences can be represented based on their answers regarding which bundle – or set of goods and services – they prefer or whether they are indifferent, when confronted with any two bundles. Moreover, in response to the fact about humans' demand, "more is always better". A bundle with more of either commodity is preferred to a bundle with less. Figure 1 illustrates the preference of a person consuming two commodities,  $C_1$  and  $C_2$ .  $IC_1$ , an indifference curve 1, shows that the consumer is equally happy for all combinations of  $C_1$  and  $C_2$  that fall on  $IC_1$ . Higher indifference curves, for example  $IC_2$ , represent higher levels of happiness.

**Figure 1:** Indifference curves  $IC_1$  and  $IC_2$  illustrating two levels of utility

Despite its simplicity, the indifference curve can show how people value their commodities. The slope of the indifference curve measures the rate at which a person is willing to trade one good for the other, which refers to marginal rate of substitution (MRS) (Varian & Repcheck, 2010). In Figure 1, MRS is the amount of  $C_2$  that a person would be willing to substitute for one more unit of  $C_1$ . With normal goods—a good whose consumption increases with income—the slope of indifference curve is negative, which shows that a person must trade off one good for more consumption of the other.

The indifference curve can apply to the concept of utility. Economists simply substitute the scores of satisfaction that a person obtains from various bundles of goods in order to observe how much satisfaction each commodity bundle creates. Numerical scores of consuming particular commodity bundles is the utility that represents a person's satisfaction. The utility function is, therefore, a formula that shows the total utility associated with each bundle of commodities. With the concept of utility, the function does not need to be based on a two-commodity case only. Equation 1 shows the utility of a commodity bundle that comprises of  $n$  commodities.

$$U = U(x_1, x_2, x_3, \dots, x_n) \quad (1)$$

Limiting the concept of utility to the satisfaction from consuming commodities cannot fully explain human desire. People want more than just commodities in their life. Besides consumption, people typically want to be part of communities comprised of family, friends and organizations (Skocpol, 1976). Welfare economists, therefore, have applied the concept of utility beyond its original scope (Kaldor, 1939; Rothbard, 1977; Dixon, 1997; Layard, 2006). Welfare economists utilize the measurable principle of utility to explain and predict social choices. In search of optimal choices that maximize welfare, the term "public happiness" has become a primary concept in welfare analysis (Heckscher, 1962; Bruni & Zamagni, 2007).

In modern welfare economics, utility, well-being and happiness partially intersect in their definitions. Easterlin (2003) explained the determinants of happiness by exploring the intersection of two concepts: psychologists' theory on subjective well-being and economists' views of utility. The terms happiness, utility and well-being could be used interchangeably, he posited. Winkelmann and Winkelmann (1998) also examined the linkage of utility and happiness through their findings on the low happiness scores of unemployed workers. Peiró (2006) examined the relationship between socio-economic conditions and happiness. Based on the measurement of utility that an individual quantified and reported as happiness in a

quantitative survey, he found a strong association between age, health and marriage as well as a mild, yet significant, association between happiness and income. Though one could be reluctant to apply economic theory to happiness, continued research enriches knowledge in this sphere and underscores the relationship between economics, psychology and sociology.

### 3. Data and Variables

For this study, we used data measuring the personal happiness of industrial workers who worked in the member organizations of the International Organization for Standardization (ISO) in Thailand. Data was drawn from the National Quality of Life Survey and Happiness Survey for workers in Thailand. The survey is a part of Happiness Watch in Thailand 2011-2014, sponsored by the Thai Health Promotion Foundation. The sampling frame included organizations in both private and public sectors in Thailand, listed with their sizes of employment. A stratified sampling technique was used to select respondents. Data was collected through a self-administered survey with a structured questionnaire.

In order to focus on those who work in the industrial sector, for this study we selected only respondents who work in organizations that are ISO members. Therefore, 3,153 respondents from 34 sample organizations in the private sector were included in the analysis, including 1,498 males and 1,655 females ages 18-65.

Multivariate linear regression analysis<sup>3</sup> was used to examine the influence of work and family satisfaction on personal happiness. Equation 1 shows the basic structure of the estimating form of personal happiness equation. This equation is formed as the utility function in order to estimate the compensating differential of generational cohorts.

$$Happiness_i = \alpha + \beta_1(job)_i + \beta_2(family)_i + \beta_3(others)_i + \varepsilon_i \quad (2)$$

where '*happiness*' is the overall happiness level reported by worker *i*, measure on scale of zero to 10, '*job*' is the vector of job satisfaction of worker *i*, '*family*' is the vector of family satisfaction and '*others*' are other factors that contribute to personal happiness and measured characteristics of workers *i*.

Standard economic analysis of utility captures the important concept of marginal utility (Varian, 2006). Family satisfaction and job satisfaction are considered as items that would increase utility if their quantity increases. The idea here is that with one more unit of family or job satisfaction, the level of utility will go up. The marginal increase of utility reflects marginal utility. On the other hand, with fewer units of family or job satisfaction, utility will decline. The concept of marginal rate of substitution (MRS) is based on changing utility from having more or less family and job satisfaction. If family satisfaction falls, job satisfaction should increase to maintain the same level of utility. At a certain level of utility, the amount of reduction on family satisfaction on a unit increase in job satisfaction shows MRS of family for job ( $MRS_{j,f}$ ). This MRS represents the value of family and work on happiness. Comparing

---

<sup>3</sup> Ordinary Least Square (OLS) method was used in this analysis. There was no violation of principle assumption on linear and additivity of predictive relationships, independence of errors, and homoscedasticity of the errors and normality of the error distribution.

MRS among generational cohorts can show the differential value of family and work on happiness.

In this study, *happiness* is defined as an overall assessment of one's happiness reported by respondents on a scale of zero to 10. Zero means "*truly unhappy in life*" and 10 means "*very happy in life*". *Job satisfaction* is defined as an overall assessment of a present job, based on working conditions and career development. Nine questions that captured the cognitive states (worker's perception) of working conditions were used to construct the variable of job satisfaction. A factor analysis using varimax rotation revealed two factors. The KMO of 0.868 and the Bartlett's test of sphericity of 0.000<sup>4</sup> suggested that the sample was factorable. Income, fringe benefit, security and organizational involvement had the highest loadings in the first factor defined as "working condition." The second factors centered on "career development" where the main items measured interest in personal development and skill improvement (See Appendix A). Calculating from the matrix of factor loading after rotation (Organisation for Economic Co-operation and Development (OECD), 2008), the proportions of the explained variances were used to weight two factors to construct a composite indicator of job satisfaction comprised of 0.70 for working condition, and 0.30 for career development.

*Family satisfaction* is defined as personal satisfaction related to all family matters. Construction of family satisfaction was accomplished using three questions that captured family relations via factor analytic procedure. In this article, family satisfaction was evaluated using the following headings: "satisfaction on time committed to family," "frequency of activities done with other family members" and "satisfaction on family relations" (See Appendix A). To construct this factor, scores from all questions were standardized and weighted based on the matrix of factor loading after rotation. The KMO of 0.641 and the Bartlett's test of sphericity of 0.000 suggested that the sample was factorable. A factor analysis using varimax rotation suggested one factor labeled "family satisfaction."

*Other independent variables* were included as additional determinants of happiness, including health satisfaction and social relations among workers. A number of studies confirm that better health and social relationships have powerful effects on happiness (Morse, Gilbert, & Killingsworth, 2012; Helliwell, Layard & Sachs, 2012; Sugisawa, 1993; Cohen & Wills, 1985). Health satisfaction is defined as personal assessment of one's physical health, which was measured through a five-point Likert scale ranking from the lowest satisfaction of 1 to the highest satisfaction of 5. The construction of the social relations factor was guided by the conceptualization of social support created by House (1981). House segregated social support into four theoretical constructs: emotional, instrumental, informational and appraisal support. Seven questions that captured social integration, social responsibility and trust were factored via factor analytic procedure. Only emotional and instrumental supports were included in this analysis. Informational and appraisal support were excluded due to the lack of relevant questions in the survey. The KMO of 0.776 and the Bartlett's test of sphericity of 0.000 suggested that the sample was factorable. A factor analysis using varimax rotation suggested two factors. The first factor was labeled as "emotional social support" which centered on social integration, caring, volunteering and trust (House, 1981). The second factor was labeled as "instrumental social support," which emphasized employing labor, money and time to help others (House, 1981) (See Appendix A). To construct this

---

<sup>4</sup> If the sample is adequate, the value of KMO should be greater than 0.5. P-value of Bartlett's test of sphericity should be less than 5% significant level to suggest that the sample was factorable.

factor, scores from all questions were standardized and weighted based on the matrix of factor loading after rotation.

Demographic and job characteristics of workers were included in the model as control variables. Demographic factors controlled in the models were gender, level of education and marital status. Job characteristics were based on the type of work categorized as office work, work in the production sector, and work in the service sector, management and other.

Baby boomers, Generation X and Generation Y are defined by workers' birth years (Norum, 2003). Baby boomers are workers who were born between 1946 and 1964; Generation X workers are those who were born between 1965 and 1976; and Generation Y workers are those who were born between 1977 and 1987.

## 4. Results

The sample of industrial workers from ISO member organizations was relatively young. About 56% were members of Generation Y, while about 33% were Generation Xers and 11% were Baby Boomers. Most workers are well educated (Table 1). About one-third (33%) of the sample possessed a bachelor's degree or higher. A majority of the sample performed work on the production line (59%).

While the sample workers were relatively young, more than half (56%) had at least one child. About 56% of the sample lived with their spouse. Proportionately, workers who have children rise with age of workers.

Average happiness level of female workers tended to rise with age (Table 2). By contrast, happiness level of Generation X tended to be lower than other generations among male workers. While the pattern of happiness based on marital status was not clear, married workers seemed to be happier than other groups. Concerning type of work, managers and workers in the managing department were relatively happier than others. Among Generation Y and the baby boom generation, those working in the service department seemed to have a lower level of happiness, while Generation X workers, who mainly worked in the production line, tended to report lower levels of happiness compared to others.

**Table 1:** Demographic characteristics of industrial workers in Thailand by generational cohort and gender

	Total	Generation Y		Generation X		Baby boomers	
		Male	female	Male	female	Male	female
<b>Marital status</b>							
Single	35.5	50.9	46.3	17.4	20.6	6.7	22.6
Married/living together	48.1	33.4	39.8	64.9	58.9	80.0	54.1
Married/not living together	3.3	2.9	2.0	5.4	3.8	3.0	3.8
Not married/living with partner	7.4	10.8	7.1	6.1	5.9	5.2	3.8
Widow	1.6	0.2	0.8	0.8	4.2	0.7	10.7
Separated	4.1	1.7	4.0	5.4	6.5	4.4	5.0
<i>Total</i>	<i>100.0</i>						
<b>Number of children</b>							

	Total	Generation Y		Generation X		Baby boomers	
		Male	female	Male	female	Male	female
None	43.8	63.0	54.9	25.9	27.1	7.4	23.1
1 child	29.6	24.2	30.4	31.7	35.2	31.9	28.2
2 children	22.2	10.9	12.5	35.7	31.3	47.4	41.0
3-4 children	4.2	1.7	2.2	6.3	5.6	13.3	7.7
5 children or more	0.2	0.1	0.0	0.4	0.7	0.0	0.0
<i>Total</i>	<i>100.0</i>						
<b>Education</b>							
Primary school or lower	11.6	5.0	7.5	6.7	27.7	9.7	38.4
High school	36.8	39.2	39.3	32.4	35.5	29.1	32.1
Certificate and bachelor degree	46.9	51.3	49.7	55.7	34.1	47.0	25.8
Higher than bachelor degree	4.7	4.5	3.5	5.2	2.6	14.2	3.8
<i>Total</i>	<i>100.0</i>						
<b>Type of work</b>							
Administration	18.5	9.5	30.4	10.2	20.8	11.2	15.8
Production line	59.0	63.6	54.7	57.0	66.3	41.0	62.7
Service	11.5	15.0	7.6	18.4	6.1	14.9	8.2
Management	4.8	2.9	2.8	6.9	3.7	23.1	9.5
Others	6.2	9.0	4.4	7.5	3.1	9.7	3.8
<i>Total</i>	<i>100.0</i>						
<b>Time of current employment</b>							
Less than 1 year	14.3	21.4	21.3	5.7	7.1	1.5	1.3
1-2 years	14.2	20.0	21.6	5.7	7.1	0.7	2.5
3-5 years	20.0	28.6	25.0	10.5	15.9	4.4	2.5
6-9 years	20.5	22.8	24.0	18.7	19.9	7.4	14.5
10 years+	31.0	7.1	8.1	59.3	50.0	85.9	79.2
<i>Total</i>	<i>100.0</i>						

**Table 2:** Happiness level of industrial workers in Thailand by generational cohort and gender

	Generation Y		Generation X		Baby boomers	
	Male	female	Male	female	Male	female
<b>Marital status</b>						
Single	6.8	6.6	6.5	6.8	6.6	7.6
Married/living together	7.0	6.5	7.0	6.8	7.5	7.0
Married/not living together	7.6	6.3	7.0	6.7	8.9	8.0
Not married/living with partner	6.3	6.6	6.7	6.5	5.9	7.7
Widow	7.7	6.4	5.8	6.6	9.7	6.6
Separated	7.4	6.3	5.9	6.8	7.2	7.2
<b>Type of work</b>						
Administration	7.1	6.8	6.7	7.2	8.2	7.1
production line	6.9	6.4	6.6	6.5	7.5	7.0
Service	6.5	6.4	6.9	7.0	7.0	6.7
Management	7.0	7.1	7.8	8.6	7.3	8.1
Others	6.9	6.6	7.1	7.2	6.9	8.6
<b>All</b>	<b>6.9</b>	<b>6.5</b>	<b>6.8</b>	<b>6.8</b>	<b>7.4</b>	<b>7.1</b>

Table 3 shows the multivariate linear regression analysis of the factors related to personal happiness. Job satisfaction highly contributed to happiness for all generations ( $p < .01$ ). The higher the score for job satisfaction, the greater the happiness. Family satisfaction also has a significant positive influence on workers' happiness ( $p < .05$ ). Again, the higher the score for family satisfaction, the greater the happiness.

**Table 3:** Multivariate linear regression models for industrial workers' happiness by generational cohorts.

	Generation Y	Generation X	Baby Boomers
Independent variables	Coefficient(se)	Coefficient(se)	Coefficient(se)
Job satisfaction	1.93(0.12)***	1.74(0.16)***	2.48(0.28)***
Family satisfaction	0.28(0.07)***	0.16(0.10)**	0.31(0.18)* *
Emotional social support	0.05(0.06)	0.07(0.09)	-0.40(0.15)***
Instrumental social support	-0.17(0.10)	-0.07(0.14)	-0.34(0.25)
Physical health satisfaction	0.16(0.05)*	0.13(0.08) *	0.15(0.13)
Gender (vs. female)	0.39(0.10)***	-0.09(0.15)	-0.16(0.26)
<b>Education (vs. primary school)</b>			
Higher than high school degree	0.04 (0.22)	0.08 (0.23)	0.50 (0.35)
High school degree	0.22 (0.22)	0.01 (0.22)	-0.03 (0.33)
<b>Marital status (vs. divorced/sep.)</b>			
Single	0.14 (0.17)	0.11 (0.25)	-0.02 (0.43)
Married	0.27 (0.17)	0.28 (0.21)	-0.20 (0.33)
<b>Job type (vs. other)</b>			
Office work	0.22 (0.22)	-0.01 (0.35)	-0.23 (0.64)
Production sector	0.11 (0.20)	-0.10 (0.31)	0.08 (0.55)
Service sector	-0.15 (0.23)	0.04 (0.35)	-0.54 (0.62)
Management	-0.04 (0.36)	0.59 (0.44)	-0.58 (0.64)
Adjusted R Square	0.26	0.22	0.32
N	1,264	738	236

\* $p < .10$  \*\* $p < .05$  \*\*\* $p < .01$

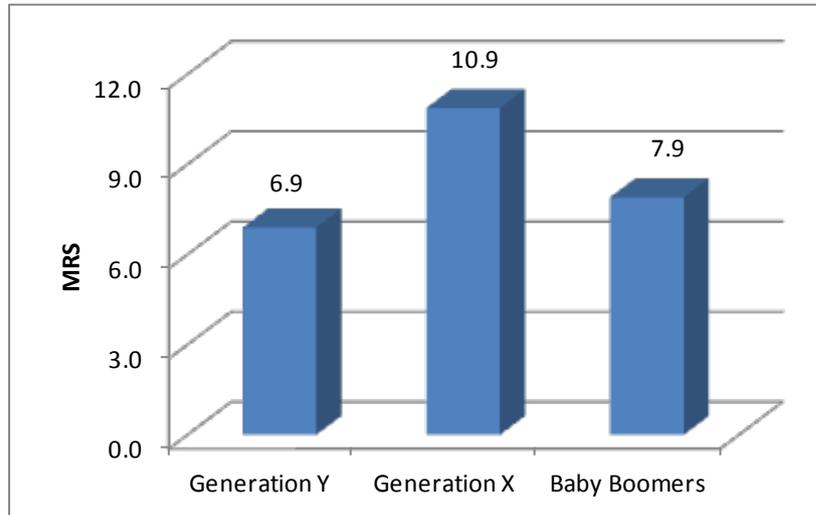
In addition to family and work satisfaction, emotional social support was related to happiness for baby boom workers. While emotional social support was not related to happiness of workers in Generation X and Y, it negatively influenced happiness for baby boom workers ( $p < .01$ ). Related to social integration, caring and trust, provision of emotional social support can decrease with age due to a reduction in social contact (Sener, 2011). Quantity of social contact often declines with age. Carstensen (1992) found that the social interaction of individuals declines with age. Her findings showed that individuals begin narrowing their range of social partners in early adulthood. With the declining trend of social contact by age, in later life, social contact of a person could be very limited. Baltes & Baltes, (1990) found that older adults spend only 10 percent of their days in direct social contact. Therefore, declining social contact with age could reduce the role of emotional social support among older workers.

Instrumental social support and physical health satisfaction had no real statistical influence on industrial workers' happiness, for all cohorts, while controlling for other sources of happiness, demographic and job characteristics.

Considering how people value family and work, there were differences in the level of MRS of family for jobs between individual generational cohorts shown in Figure 2. Compared to the older generations, the value of family was relatively high for Generation Y workers. On

the other hand, compared to Generation Y and baby boom workers, the value of work was relatively high for Generation X workers.

**Figure 2:** Marginal rate of substitution (MRS) of family for job by generational cohorts



Note:  $MRS_{j,i}$  is calculated based on equation 1  $= \frac{\partial family}{\partial work} = \frac{\beta_1}{\beta_2}$

## 5. Discussion

Job and family satisfaction can contribute to happiness. The findings here confirm that job satisfaction and family satisfaction have positive influences on workers' happiness. Employment offers a source of income, social status and self-esteem, which generate happiness (Cantril, 1965; Myers & Diener, 1995; Campbell, 1981). Researchers have found that job satisfaction can contribute to life satisfaction in the form of spillover, where experiences on the job can spill over to non-work life (Judge & Watanabe, 1994; Saari & Judge, 2004). Therefore, good working conditions, sufficient fringe benefits and reasonable remuneration can be related to personal happiness through workers' job satisfaction. On the other hand, family concerns which focus on happy family life and good relationships with family members have been considered one of the essential sources of happiness (Easterlin, 2001; Cantril, 1965). Spending time with family, participating in family activities and maintaining harmonious family relationships can create a sense of cohesion, and fulfill personal inner peace, comfort, self-confidence and self-esteem. However, difficulties in marital relationships, combined with a high burden of housework and child rearing, can have negative impacts on personal happiness.

Previous research has demonstrated the relationship between generational cohorts and a variety of work-related behaviors. The findings here show that generational cohorts are also linked to workers' preferences related to work-life balance. Compared to the older generations, the value of family was relatively high for Generation Y workers. At the time of the survey, Generation Y workers were relatively young, ages 24-34, and new to the workforce. Many were approaching the time of embarking on their careers together while

searching for their soul mates and starting their own families. These young workers were in their stage of searching for the right work and family life that fit their expectations. The high value of family for Generation Y workers implicitly showed that work-life balance was highly crucial for this generation. These workers grew up in a different economic climate compared to the cohorts before them (Beekman, 2011). Many likely experienced childhood in a structured way, with childcare, preschool, and after-school programs. Various activities that were scheduled in their childhood could influence their preference for a structured adulthood with combinations of work, family, personal life and society (Weston, 2006). Therefore, Generation Y workers may have concerns on fair resource allocation to their family life as well as their work life. Furthermore, Generation Y workers have grown up with modern technologies that positively contribute to their work. Familiarity with the Internet and modern software could enable them to achieve the assigned task in less time than their coworkers with more years of experience. This generation is looking for a flexible working environment that allows them to balance their resources, such as time with their family and friends.

Compared to Generation Y and baby boom workers, Generation X workers in Thailand placed the highest value of work. They are in the group of middle-age workers, ages 35-46, and perhaps in the thriving period of their career (Levinson, 1978). Many may be moving toward management roles. Therefore, resource allocation to work life is crucial to their career achievement. Despite focusing on family life, motivation for success as they age could cause their value of work to be relatively high, compared to the other cohorts. Regarding the economic climate, Generation X workers have experienced economic difficulties in their adulthood (Regnier, 2009) with the global financial crisis and organizational downsizing. They have perceived in the uncertainties in life, like the collapse of the Soviet Union and the HIV/Aids epidemic. Even though Generation X is not traditionally characterized as a workaholic generation, like the baby boomers, Generation X workers are willing to work hard toward their own goals, centered on quality of life and financial security (Kaylene & Robert, 2011).

## 6. Conclusion

Work and family satisfaction are usually conceptualized as factors of personal happiness. However, work and family share time resources. Time limitations can put strains on relationships in work lives and family lives. Intense commitment at work has the potential to interfere family life. Many working parents have experienced work-family conflicts (Cohen, 1993; Frone, 2003; Parasuraman & Greenhaus, 2002).

To effectively improve well-being, it is important to understand how workers value their work lives and family lives. However, one great challenge is acknowledging the demographic diversity that exists regarding workers' preference on their work-life balance. Our findings shed light on the patterns of relationships between work and family satisfaction by generational cohorts. Generation Y workers, currently the youngest generation in the workplace, value their family life more than the older generations. This result suggests that younger workers are looking for flexible working environments that allow them to spend time and energy with their family. On the other hand, Generation X workers place a higher value on work than the other generations. This result underscores the importance of career achievement among this group of workers.

Demographic diversity poses a challenge for designing measures to improve industrial workers' happiness. Intervention programs that support work-life balance should be suitable for each generational cohort. While Generation Y workers may thrive when faced with creative and challenging tasks, a flexible working environment is needed to allow them to balance their time with non-work activities. For Generation X workers, resource allocation toward work is critical to their career achievement. Working environments for them should allow multitasking activities—even combining work with leisure time, and allowing flexible working hours—and offer trainings that support their career advancement. Baby boomers in Thailand, despite being known for their organizational loyalties and hard work, must bear family burdens, particularly at this stage in their lives when they may be taking care of their children and aging parents. Working conditions that support families could help prevent work-family conflicts.

## References

- Achor, S. (2012). Positive intelligence. *Harvard Business Review*, 90(1), 100-102.
- Angeles, L. (2010). Children and life satisfaction. *Journal of Happiness Studies*, 11(4), 523-538. <http://dx.doi.org/10.1007/s10902-009-9168-z>
- Baltes, P. B. & Baltes, M. M. (1990). Psychological perspectives on successful aging: The model of selective optimization with compensation. In P. B. Baltes & M. M. Baltes (Eds.), *Successful Aging*, (pp. 1-34). Cambridge, England: Cambridge University Press. <http://dx.doi.org/10.1017/cbo9780511665684.003>
- Becker, G.S. (1965). A theory of the allocation of time. *Economic Journal*, 75, 493-517. <http://dx.doi.org/10.2307/2228949>
- Becker, G. S. (1985). Human capital, effort, and the sexual division of labor. *Journal of Labor Economics*, S33-S58. <http://dx.doi.org/10.1086/298075>
- Beekman, T. (2011). Fill in the generation gap. *Strategic Finance*, 93(3), 15-17.
- Boehm, J.K. & Lyubomirsky, S. (2008). Does happiness promote career success? *Journal of Career Assessment*, 16(1), 101-116. <http://dx.doi.org/10.1177/1069072707308140>
- Bruce, W. M. & Blackburn, J. W. (Eds.). (1992). *Balancing job satisfaction & performance: A guide for human resource professionals*. Westport, CT: Praeger Pub Text.
- Bruni, L. & Zamagni, S. (2007). *Civil economy: Efficiency, equity, public happiness* (Vol. 2). Berne, Switzerland: Peter Lang.
- Bunbongkarn, S. (1992). Thailand in 1991: Coping with military guardianship. *Asian Survey*, 131-139. <http://dx.doi.org/10.2307/2645210>
- Burke, R. J. & Cooper, C. L. (2008). *Building more effective organizations: HR management and performance in practice*. Cambridge: Cambridge University Press. <http://dx.doi.org/10.1017/cbo9780511802928>
- Campbell, A. (1981). *The sense of well-being in America: Recent patterns and trends*. New York: McGraw-Hill.
- Cantril, H. (1965). *The pattern of human concerns*. New Brunswick, NJ: Rutgers University Press.
- Carstensen, L. L. (1992). Social and emotional patterns in adulthood: Support for socioemotional selectivity theory. *Psychology and Aging*, 7(3), 331-338. <http://dx.doi.org/10.1037/0882-7974.7.3.331>
- Chimote, N. K. & Srivastava, V. N. (2013). Work-life balance benefits: From the perspective of organizations and employees. *The IUP Journal of Management Research*, 12(1), 62-73.
- Cennamo, L. & Gardner, D. (2008). Generational differences in work values, outcomes, and person-organisation values fit. *Journal of Managerial Psychology*, 23, 891-906. <http://dx.doi.org/10.1108/02683940810904385>
- Cohen, S. & Wills, T. A. (1985). Stress, social support, and the buffering hypothesis. *Psychological Bulletin*, 98(2), 310-357. <http://dx.doi.org/10.1037/0033-2909.98.2.310>

- Cohen, T. F. (1993). What do fathers provide? Reconsidering the economic and nurturant dimensions of men as parents. In J. C. Hood (Ed.), *Men, work, and family* (pp. 1-22). Newbury Park, CA: Sage.
- Collins, J. (1998). Why we must keep Baby Boomers working. *New Zealand Business*, 12(8), 53.
- Costa, P. T., Herbst, J. H., McCrae, R. R. & Siegler, I. C. (2000). Personality at midlife: Stability, intrinsic maturation, and response to life events. *Assessment*, 7(4), 365-378. <http://dx.doi.org/10.1177/107319110000700405>
- Deal, J. J. (2007). *Retiring the generation gap: How employees young and old can find common ground* (Vol. 35). San Francisco: John Wiley & Sons.
- Diener, E. & Lucas, R.E. (1999). Personality and subjective well-being, In D. Kahneman, E. Diener & N. Schwarz (Eds.) *Well-being: The foundations of hedonic psychology* (pp. 213-229). New York: Russell Sage Foundation.
- Dixon, H. D. (1997). Economics and happiness. *The Economic Journal*, 107, 1812-1814. <http://dx.doi.org/10.1111/j.1468-0297.1997.tb00084.x>
- Duncan, G. (2005). What do we mean by "happiness"? The relevance of subjective wellbeing to social policy. *Social Policy Journal of New Zealand*, 25, 16.
- Easterlin, R. A. (2001). Income and happiness: Towards a unified theory. *Economic Journal*, 111, 465-484. <http://dx.doi.org/10.1111/1468-0297.00646>
- Easterlin, R. A. (2003). Building a better theory of well-being. *IZA Discussion Paper No. 742*.
- Fisher, C. D. (2010). Happiness at work. *International Journal of Management Reviews*, 12(4), 384-412. <http://dx.doi.org/10.1111/j.1468-2370.2009.00270.x>
- Frey, B. S. (2008). *Happiness: A revolution in economics*. London: MIT Press Books.
- Frey, B. S. & Stutzer, A. (2000). Maximising happiness? *German Economic Review*, 1(2), 145-167. <http://dx.doi.org/10.1111/1468-0475.00009>
- Frone, M. R. (2003). Work-family balance. In J. C. Quick & L. E. Tetrick (Eds.), *Handbook of occupational health psychology* (pp. 143-162). Washington, DC: American Psychological Association. <http://dx.doi.org/10.1037/10474-007>
- Gilbert, J. (2011). The millennials: A new generation of employees, a new set of engagement policies. *Ivey Business Journal*, 4. Retrieved from <http://iveybusinessjournal.com/publication/the-millennials-a-new-generation-of-employees-a-new-set-of-engagement-policies/>
- Gilligan, C. (1979). Woman's place in man's life cycle. *Harvard Educational Review*, 49(4), 431-446. <http://dx.doi.org/10.17763/haer.49.4.h13657354113g463>
- Glass, J. & Fujimoto, T. (1994). Housework, paid work, and depression among husbands and wives. *Journal of Health and Social Behavior*, 35, 179-191. <http://dx.doi.org/10.2307/2137364>
- Heckscher, A. (1962). *The public happiness*. New York: Atheneum.
- Helliwell, J. F. & Huang, H. (2010). How's the job? Well-being and social capital in the workplace. *Industrial and Labor Relations Review*, 63(2): 205-227.
- Helliwell, J. F., Layard, R. & Sachs, J. (2012). *World happiness report*. New York: Earth Institute, Columbia University.
- House, J. S. (1981). *Work, stress, and social support*. Reading, MA: Addison-Wesley.
- Howe, N. & Strauss, W. (1992). The new generation gap. *The Atlantic*. 270(6).67-89.
- Judge, T. A. & Watanabe, S. (1994). Individual differences in the nature of the relationship between job and life satisfaction. *Journal of Occupational and Organizational Psychology*, 67, 101-107. <http://dx.doi.org/10.1111/j.2044-8325.1994.tb00554.x>
- Kahneman, D. (1999). Objective happiness. In D. Kahneman, E. Diener & N. Schwarz (Eds.). *Well-being: The foundations of hedonic psychology*. New York: Russell Sage Foundation.
- Kahneman, D., Krueger, A.B., Schkade, D., Schwartz, N. & Stone, A.A. (2004). Toward national well-being accounts. *American Economic Review*, 94(2), 429-434. <http://dx.doi.org/10.1257/0002828041301713>
- Kaldor, N. (1939). Welfare propositions of economics and interpersonal comparisons of utility. *The Economic Journal*, 549-552. <http://dx.doi.org/10.2307/2224835>
- Kaylene, C. W. & Robert, A. P. (2011). Marketing to the generations. *Journal of Behavioral Studies in Business*, 3, 1-17.
- Kim, H., Knight, D. K. & Crutsinger, C. (2009). Generation Y employees' retail work experience: The mediating effect of job characteristics. *Journal of Business Research*, 62, 548-556. <http://dx.doi.org/10.1016/j.jbusres.2008.06.014>

- Kupperschmidt, B.R. (2000). Multigenerational employees: Strategies for effective management. *The Health Care Manager*, 19(1), 65-76. <http://dx.doi.org/10.1097/00126450-200019010-00011>
- Layard, R. (2006). Happiness and public policy: A challenge to the profession. *The Economic Journal*, 116(510), C24-C33. <http://dx.doi.org/10.1111/j.1468-0297.2006.01073.x>
- Ledford, G. E. (1999). Happiness and productivity revisited. *Journal of Organizational Behavior*, 20(1), 25-30. [http://dx.doi.org/10.1002/\(sici\)1099-1379\(199901\)20:1<25::aid-job913>3.0.co;2-k](http://dx.doi.org/10.1002/(sici)1099-1379(199901)20:1<25::aid-job913>3.0.co;2-k)
- Levinson, D. J. (1978). *The seasons of a man's life*. New York: Knopf.
- Mankiw, N. G. (2012). *Principles of microeconomics*. Stamford: Cengage Learning.
- Meier, J., Austin, S. & Crocker, M. (2010). Generation Y in the workforce: Managerial challenges. *The Journal of Human Resource and Adult Learning*. 6(1), 68-78.
- Moen, P. (1992). *Women's two roles: A contemporary dilemma*. New York: Auburn House.
- Morse, G., Gilbert, D. & Killingsworth, M. (2012). The science behind the smile: An interview with Harvard University psychologist Daniel Gilbert. *Harvard Business Review*, 90(1), 85-90
- Myers, D. & Diener, E. (1995). Who is happy? *Psychological Science*, 6, 10-19. <http://dx.doi.org/10.1111/j.1467-9280.1995.tb00298.x>
- Norum, P. S. (2003). Examination of generational differences in household apparel expenditures. *Family and Consumer Sciences Research Journal*, 32(1): 52-75. <http://dx.doi.org/10.1177/1077727x03255901>
- Organisation for Economic Co-operation and Development (OECD). (2008). Handbook on Constructing Composite Indicators: Methodology and User Guide. <http://dx.doi.org/10.1787/9789264043466-en>
- Oswald, A.J., Eugenio, P. & Daniel, S. (2009). Happiness and productivity. *IZA discussion papers*. 4645.
- Peiró, A. (2006). Happiness, satisfaction and socio-economic conditions: Some international evidence. *The Journal of Socio-Economics*, 35(2), 348-365. <http://dx.doi.org/10.1016/j.socec.2005.11.042>
- Parasuraman, S. & Greenhaus, J. H. (2002). Toward reducing some critical gaps in work family research. *Human Resource Management Review*, 12, 299-312. [http://dx.doi.org/10.1016/s1053-4822\(02\)00062-1](http://dx.doi.org/10.1016/s1053-4822(02)00062-1)
- Phongpaichit, P. & Baker, C. (1999). The political economy of the Thai crisis. *Journal of the Asia Pacific Economy*, 4(1), 193-208. <http://dx.doi.org/10.1080/13547869908724676>
- Prasartkul, P. (2015). *Glossary of terms in population and social research*. Nakhon Pathom, Thailand: Institute for Population and Social Research, Mahidol University. (in Thai) Retrieved from <http://www.popterms.mahidol.ac.th/Popterms/index.php>
- Regnier, P. (2009). Oh, to be young again (for real). *Money*, 38(9), 124.
- Roberts, B. W., Walton, K. E. & Viechtbauer, W. (2006). Patterns of mean-level change in personality traits across the life course: a meta-analysis of longitudinal studies. *Psychological Bulletin*, 132(1), 1. <http://dx.doi.org/10.1037/0033-2909.132.1.1>
- Rosen, B. & Jerdee, T. H. (1976). The nature of job-related age stereotypes. *Journal of Applied Psychology*, 61(2), 180. <http://dx.doi.org/10.1037//0021-9010.61.2.180>
- Rosen, B. & Jerdee, T. H. (1985). *Older employees: New roles for valued resources*. Homewood, Ill: Dow Jones-Irwin.
- Rothbard, M. N. (1977). *Toward a reconstruction of utility and welfare economics* (No. 3). San Francisco: Center for Libertarian Studies.
- Roxburgh, S. (2004). There just aren't enough hours in the day: The mental health consequences of time pressure. *Journal of Health and Social Behavior*, 45, 115-131. <http://dx.doi.org/10.1177/002214650404500201>
- Saari, L. M. & Judge, T. A. (2004). Employee attitude and job satisfaction. *Human Resource Management*, 43(4), 395-407. <http://dx.doi.org/10.1002/hrm.20032>
- Skocpol, T. (1976). France, Russia, China: A structural analysis of social revolutions. *Comparative Studies in Society and History*, 18(02), 175-210. <http://dx.doi.org/10.1017/s0010417500008197>
- Sener, A. (2011). Emotional support exchange and life satisfaction. *International Journal of Humanities and Social Science*, 1(2): 79-88.
- Smith, J. C. (2013). *Pay growth, fairness and job satisfaction: Implications for nominal and real wage rigidity*. Working Paper. Coventry, UK: University of Warwick, Department of Economics. Warwick economics research papers series (TWERPS), Volume 2013 (Number 1009)
- Strauss, W. & Howe, N. (2006). *Millennials and the pop culture*. USA: Life Course Associates.

- Sugisawa, H. (1993). Difference in impact of social support on morale and medical utilization between elderly with low activity of daily living and elderly with high activity of daily living. *Japanese Journal of Public Health*, 40(3), 171-180.
- Thongthai, V. (2009). "Generation" X Y Z. In C. Podhisita & S. Taweessit (Eds.). *Thai Families in the Social and Demographic Transitions*. Nakhon Pathom: Institute for Population and Social Research, Mahidol University.
- Thurik, R., Hessels, J., Millán, J. M. & Aguado, R. (2011). *Determinants of job satisfaction: A European comparison of self-employed and paid employees* (No. H201106). EIM Business and Policy Research.
- Ungpakorn, J. (1997). *The struggle for democracy and social justice in Thailand*. Bangkok: Arom Pongpangan Foundation.
- Ungpakorn, J. G. (2002). From tragedy to comedy: Political reform in Thailand. *Journal of Contemporary Asia*, 32(2), 191-205. <http://dx.doi.org/10.1080/00472330280000121>
- Varian, H. R. (2006). *Intermediate microeconomics: A modern approach* (8<sup>th</sup>ed.). New York: W.W.Norton & Company, Inc.
- Varian, H. R. & Repcheck, J. (2010). *Intermediate microeconomics: A modern approach* (Vol. 7). New York: W.W. Norton & Company, Inc.
- Veenhoven, R. (1988). The utility of happiness. *Social Indicators Research*, 20(4), 333-354. <http://dx.doi.org/10.1007/bf00302332>
- Weston, M. J. (2006). Integrating generational perspectives in nursing. *OJIN: The Online Journal of Issues in Nursing*, 11(2), 1-9.
- Winkelmann, L. & Winkelmann, R. (1998). Why are the unemployed so unhappy? Evidence from panel data. *Economica*, 65(257), 1-15. <http://dx.doi.org/10.1111/1468-0335.00111>
- Zickuhr, K. (2010). *Generations 2010*. Washington, D.C.: Pew Research Center. Retrieved from [http://www.pewinternet.org/files/old-media/Files/Reports/2010/PIP\\_Generations\\_and\\_Tech10.pdf](http://www.pewinternet.org/files/old-media/Files/Reports/2010/PIP_Generations_and_Tech10.pdf)

**Appendix Table:**

Questions used to calculate job, family, health satisfaction and social relations of workers (all are Likert scales with a 5-point scale)

	Variable	Item	Sub-Item	Original question
1	Job satisfaction	Working condition	Income	(1) Do you feel your salary is worth the risks you may face in your job? (2) Do you feel fairly compensated? (3) How often are you paid the full amount of your salary?
			Fringe benefits	(1) Are you satisfied with the benefits offered by your employers?
			Security	(1) Is your career stable?
			Organizational involvement	(1) Do you take pride in your organization? (2) Do you feel involved with the organization?
		Career development	Personal development	(1) Overall, do you feel interested to obtain new knowledge into your life? (2) Overall, are you interested in developing yourself for the future?
			Skill improvement	(1) Do you have opportunities to attend classes/ education/ conferences to develop your skills?
2	Family satisfaction	Satisfaction on time committed to family	(1) Do you spend enough time with your family? ( 1-minimum to 5-maximum)	
		Frequency of activities done with other family members	(1) Do you participate in some activities with your family? (Exercise, make merit, shopping, gardening, etc.)	
		Satisfaction on family relations	(1) Overall, are you happy with your family life?	
3	Health satisfaction		(1) Overall, are you satisfied with your health?	
4	Social relations of workers	Emotional social support	Social integration	(1) Overall, are you satisfied with your social life?
			Caring	(1) Overall, do you care for those around you?
			Volunteering	(1) Overall, do you practice any Corporate Social Responsibility: CSR such as recycling or reducing usage of plastic bags etc.?
			Trust	(1) Overall, do you feel secure about your life and property?
		Instrumental social support	Employing labor	(1) Overall, do you give assistance to those around you?
			Money	(1) Overall, do you give donations or make merit?
			Time to help others	(1) Overall, do you participate in charitable events such as planting trees?