



**RELATIONSHIPS BETWEEN IMPLEMENTING SUFFICIENCY ECONOMY
PHILOSOPHY AND FAMILY LIFE QUALITY OF RUBBER FARMERS
IN BURIRAM PROVINCE**

SOCHHATH NGO

**A thesis submitted in partial fulfillment of the requirements for
the degree of Master of Economics in Business Economics
at Maharakham University
September 2014**

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The examining committee has unanimously approved this dissertation, submitted by Mr. Sochhath Ngo, as a partial fulfillment of the requirement for degree of the Master of Business Economics at Maharakham University.

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Sochhath Ngo



TITLE Relationships between Implementing Sufficiency Economy Philosophy and Family Life Quality of Rubber Farmers in Buriram Province

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ABSTRACT

Modern development has caused changes in all aspects of Thai society. The positive impacts of the development are economic growth, progress of material and public utilities, and modern communication systems. However, few of these results have reached rural areas or the underprivileged in the society. Moreover, rapid economic growth and the rise of consumerism has led to a state of economic dependence and deterioration of natural resources as well as the dissolution of existing kinship and traditional groups to manage them. Significantly, the people's ability to rely on themselves and to conduct their lives and pursue their destiny with dignity has deteriorated. Sufficiency Economy Philosophy is a new concept that stresses the middle path as an overriding principle for appropriate conduct of living and a new guideline to enhance the family life quality of Thais at all levels. Therefore, the researcher has conducted the research of Relationships between Implementing Sufficiency Economy Philosophy and Family Life Quality of Rubber Farmers in Buriram Province. Data collection is conducted from 206 household heads of rubber farmers in Buriram Province by questionnaire. The statistics used for data analysis are t-test, F-test (ANOVA and MANOVA), Multiple Correlation Analysis, and Simple and Multiple Regression Analysis.

The findings revealed that the rubber farmers have expressed their opinions on Implementing Sufficiency Economy Philosophy for overall and for each variable which are Moderation, Reasonableness, and Self-Immunity at mostly agree level. The rubber farmers have also expressed their opinions on Family Life Quality for overall and for each variable which are Health, Environmental Well-Being, Productivity, Daily Family



Life, Family Interaction, and Financial Well-Being at mostly agree level. The rubber farmers who have the different Experience of Rubber Growing, Numbers of Family Member, Size of Rubber Plantation, and Monthly Average Income have expressed their opinions on Implementing Sufficiency Economy Philosophy for overall and for each variable indifferently. The rubber farmers who have the different Monthly Average Income have expressed their opinions on Family Life Quality for overall and for each variable differently. The rubber farmers who have the different Experience of Rubber Growing, Numbers of Family Member, and Size of Rubber Plantation have expressed their opinions on Family Life Quality for overall and for each variable indifferently.

According to the correlation and regression analysis of Implementing Sufficiency Economy Philosophy, the findings show that: 1) Implementing Sufficiency Economy Philosophy for Moderation is positively correlated with Family Life Quality for overall, Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being; 2) Implementing Sufficiency Economy Philosophy for Reasonableness is positively correlated with Family Life Quality for overall, Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being; 3) Implementing Sufficiency Economy Philosophy for Self-Immunity is positively correlated with Family Life Quality for overall, Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being.

In conclusion, Implementing Sufficiency Economy Philosophy is positively correlated with Family Life Quality. Therefore, the rubber farmers should be aware of implementing sufficiency economy philosophy efficiently so as to enhance their family life quality. They have to economize their daily expenditure, focus on only necessary consumptions and decent living standard, balance their work life and personal life, be proud to be the rubber farmers, make decision carefully by estimating all factors involved, make good financial planning, allocate their existing resources in the most effective way, create no environmental problems to their community, live wisely and consistently with the social context independent from globalization trend, be ready to cope with internal and external changes, build networks among rubber farmers, and manage risks efficiently. Thus, the rubber farmers will be able to enhance their family life quality effectively.



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CHAPTER I

INTRODUCTION

Overview

In the capitalized World, nations are focusing primarily on economic growth; that is, to seek wealth from investment, production, and consumption. Consumption is the key ingredient of capitalism. It leads to stiff competition, and is continuously stimulated in order to maintain the system. Even goods which are not particularly necessary must be wrapped in a beautiful package in order to encourage continual consumption. However, the production of such goods requires raw material from natural resources and the greater the consumption, the more damage to the environment is inevitably sustained. The World is, therefore, severely affected both by natural exploitation and pollution from production and use of consumables (Tantivejkul, 2011).

Modern development has caused changes in all aspects of Thai society. The positive impacts of the development are economic growth, progress of material and public utilities, modern communication systems, and improvement and expansion of education. However, few of these results have reached rural areas or the underprivileged in the society. On the other hand, rapid economic growth and the rise of consumerism has led to a state of economic dependence and deterioration of natural resources as well as the dissolution of existing kinship and traditional groups to manage them. The traditional knowledge and wisdom that have been employed to solve problems and accumulated in the past are forgotten and have started to disappear. Significantly, the people's ability to rely on themselves and to conduct their lives and pursue their destiny with dignity has deteriorated. For Thailand, the 1997 financial crisis served as a costly lesson of unbalanced and unstable growth, partly due to the improper economic and social development process, in which the economy relied heavily on foreign capital inflows and external markets (The Chaipattana Foundation, 2013: Web Site). His Majesty King Bhumibol Adulyadej has, therefore, proposed the sufficiency economy philosophy as a new guidance for Thais in order to build Thailand with sustainable development.



Thailand's sufficiency economy philosophy stems from remarks made by His Majesty King Bhumibol Adulyadej throughout his 58 years of the throne (NESDB, 2004a). Through royal remarks on many occasions over the past three decades, His Majesty has provided guidance on appropriate conduct covering numerous aspects of life. Sufficiency economy philosophy stresses the middle path as an overriding principle for appropriate conduct by Thais at all levels, from family to community to country. It calls for national development and administration to modernize in line with the forces of globalization. In particular, after the Asian financial crisis in 1997 in which numerous business organizations in Thailand went bankrupt, His Majesty reiterated the philosophy as the way to recovery that would lead to a more resilient and sustainable economy (NESDB, 2004b). Sufficiency economy philosophy framework comprises three key principles and two underlying conditions (Tantivejkul, 2011). Three key principles of sufficiency economy philosophy are moderation, reasonableness, and self-immunity. Moderation means sufficiency at a level of not doing something too little or too much at the expense of oneself or others, for example, producing and consuming at a moderate level. Reasonableness refers to the decision concerning with the level of sufficiency which must be made rationally with consideration of the factors involved and careful anticipation of the outcomes that may be expected from such action. Self-immunity means the ability to cope with shocks from internal and external changes by considering the probability of future situations. Two underlying conditions necessary to achieve sufficiency economy philosophy are knowledge and morality. Sufficiency economy philosophy requires breadth and thoroughness in planning, carefulness in applying knowledge, and the implementation of those plans. As for the moral/ethical condition, sufficiency economy philosophy enforces the conditions that people are to possess – honesty and integrity – while conducting their lives with perseverance, harmlessness, and generosity. Sufficiency economy philosophy serves as a guide for the way of living/behaving for people of all levels, and is scalable with universal domain applicability, including business organizations (Piboolsravut, 2004).

Family life quality has increasingly become an important issue for scholars and policy makers throughout the World. There is a growing awareness that expanding the gross national product per capita (GDP Per Capita) will not, by itself, lead to improved citizen well-being. Family life quality involves much more than income and economic



indicators are not capable of assessing the standard of living. With its roots in the individual life quality concept, family life quality has emerged in response to the needs for a strength-based theoretical and conceptual framework within which to understand and develop family-centered approaches to family support (Brown and Brown, 2004). As contrasted to individual life quality, family life quality addresses the impact of individual life quality on the family – the interaction and reverberation of individual members as they produce the aggregate of family life quality (Poston et al., 2003). Brown and Brown (2004) suggested that numerous important aspects of family life need to be taken into account as people attempted to follow those concepts and principles detailed in the individual life quality. Families experience a high life quality when their needs are met, they enjoy their time together, and they are able to do things that are important to them (Park et al., 2003). Although individual life quality research has produced sufficient momentum to result in an international consensus document, family life quality is at the very beginning of the conceptualization process (Poston et al., 2003). Poston et al. (2003) suggested a domain structure of family life quality with two parts: (a) domains with an individual orientation and (b) domains with a family orientation. Domains with an individual orientation represent the idiosyncratic ways that the life quality of individual family members has an impact on the life quality of other family members and on the family as a whole. The six individual domains are advocacy, emotional well-being, health, physical environment, productivity, and social well-being. And the four family-oriented domains are daily family life, family interaction, financial well-being, and parenting.

Rubber industry and products are accounted as one of the most significant enterprises of Thailand in both sides, employment and exportation. Thailand, Malaysia, and Indonesia are the World's largest rubber producing and exporting countries. In 2011, the total global rubber production was 10.7 million tons, of which, 7.48 million tons of rubber were produced by the three countries, accounting for 70% of the global production. 33% of the amount is contributed by Thailand, followed by Indonesia (27%), and Malaysia (10%) (The Thai Rubber Association, 2012a : Web Site). Natural rubber is a plant of economic importance of Thailand, involving various sectors: farmers, entrepreneurs, laborers, government agencies, and other sectors concerned (one million families or more than 6 million people across the country). In 2011,



revenue generated from crude rubber exports is 383,319 million baht; 252,985 million baht for rubber based products; 57,571 million baht for compound rubber; 42,639 million baht for parawood and products. The overall export value is 678,942 million baht while 14% of rubber output was domestically consumed. Thailand has been the World's largest natural rubber producer and exporter since 2001. In 2011, Thailand produced 3.569 million tons of natural rubber, including 1.455 million tons (40.7%) for STR (Standard Thai Rubber); 892,249 (25%) for RSS (Ribbed Smoked Sheet); 713,804 (20%) for latex concentrate (only dry rubber content), and 428,276 (12%) for compound rubber. Thailand exported 2.95 million tons, including 1.3 million tons (44%) for STR; 747,284 tons (25%) for RSS; 519,628 for latex concentrate (only dry rubber content); 339,942 (11.5%) for compound rubber while 486,745 tons is domestically consumed. Natural rubber is mainly consumed in vehicle tire manufacturing (60%) and elastic and gloves (14%). Thailand is heavily dependent on export market of which rubber output is in the form of primary processing products. The largest export destination is China (1.27 million tons, accounting for 43%), followed by Malaysia (344,589 tons, accounting 12%), Japan (333,669 tons or 11%), and the USA (205,410 tons or 7%) (The Thai Rubber Association, 2012b: Web Site).

Natural rubber industry affects the lives of around one million families or about seven million farmers, entrepreneurs, labors, government officers, and other related sectors. The rubber industry is an integrated supply chain involving production, transformation, marketing, and manufacturing. So, any international or domestic economic influence will profoundly impact natural rubber production in Thailand, which eventually directly and indirectly affects farmers (The Thai Rubber Association, 2012c: Website). Originally, rubber trees have been planted only in the South and East of Thailand because of the appropriate climate. Later, a new policy of the government to cultivate the economic plant at least one million Rai during year 2004-2006 objecting to improve income and security for farmers in the North and Northeast of the country. It is founded that the rubber trees can be well grown and become a main economic plants of those two regions. In 2008, the total rubber cultivating areas of Thailand provided by 16.72 million Rai with the available tapping areas of about 11.37 million Rai. Most cultivation areas are situated in the South, Northeast, East and Center, and North at the rate of 68%, 17%, 11%, and 4% respectively. The average productivities of country



were 278 kilograms/Rai/year. From the national data, the total rubber cultivating areas of the Northeast are approximately 2,799,209 Rai, as being accounted for the tapping areas by 569,668 Rai (just 5% of the whole tapping areas of the country) with the amount of natural rubber products by 154,917 tons. Having been compared among all the northeastern provinces, NongKhai has the highest tapping areas (126,398 Rai with its productivities of 35,138 tons), followed by Buriram (75,956 Rai by 20,660 tons), and Udonthani (52,000 Rai by 14,880 tons). The rubber cultivation in the Northeast will be a vital step of rubber development of Thailand. It encourages the improvement on regional economy, society, and environment and also contributes the competitive potential of the country in the World market at large (The Thai Rubber Association, 2010: Website). With its second largest tapping areas in the Northeast, Buriram consists of approximately 1,646 households of rubber farmers who have grown rubber trees as their main occupation. Most rubber plantations in Buriram province are family-owned plantation. Most farmers in some districts of Buriram province have started to change from their rice fields to rubber plantations because they view rubber growing is more profitable than rice growing. Ban Kruat district has the largest area of rubber plantations in Buriram province with the area of 34,694 Rai, followed by Sahansai district with the area of 12,461 Rai, and Nonsuvan district has the third largest area of 7,824 Rai (Buriram Agriculture Office, 2012).

According to the aforementioned, the researcher has investigated the relationships between implementing sufficiency economy philosophy and family life quality of rubber farmers in Buriram province. The researcher has examined the effects of implementing sufficiency economy philosophy on family life quality of rubber farmers in Buriram province. Data collection had been done through household heads of rubber farmers in Buriram province and the main purpose of the research would improve the efficiency of implementing sufficiency economy philosophy among rubber farmers to help them lead the moderate lives and have a good family life quality sustainably.



Purposes of the Research

1. To investigate the implementing sufficiency economy philosophy of rubber farmers in Buriram province,
2. To examine the family life quality of rubber farmers in Buriram province,
3. To test the relationships between implementing sufficiency economy philosophy and family life quality of rubber farmers in Buriram province,
4. To test the effects of implementing sufficiency economy philosophy on family life quality of rubber farmers in Buriram province,
5. To compare the implementing sufficiency economy philosophy of rubber farmers in Buriram province who have the different experience of rubber growing, numbers of family member, size of rubber plantation, and monthly average income, and
6. To compare the family life quality of rubber farmers in Buriram province who have the different experience of rubber growing, numbers of family member, size of rubber plantation, and monthly average income

Importance of the Research

1. To provide the source of information which is necessary for developing and improving the effectiveness of implementing sufficiency economy philosophy in order to improve family life quality of rubber farmers in Buriram province,
2. To provide the guidelines for rubber farmers to recognize the benefits of implementing sufficiency economy philosophy in their communities,
3. To establish the road map for rubber farmers to improve their family life quality through properly implementing sufficiency economy philosophy,
4. To generate the guidelines for rubber farmers to adapt themselves consistently with the future economic changes, and
5. To be used as the academic database which is important for academics to reference their future research studies



Conceptual Framework of the Research

In the research of “Relationships between Implementing Sufficiency Economy Philosophy and Family Life Quality of Rubber Farmers in Buriram Province”, the researcher uses the conceptual framework as follows:

1. Implementing Sufficiency Economy Philosophy, applied from Sufficiency Economy Philosophy (Tantivejkul, 2011: 4)
 - 1.1 Moderation
 - 1.2 Reasonableness
 - 1.3 Self-Immunity
2. Family Life Quality, applied from Family Quality of Life (Poston et al., 2003: 321 – 323)
 - 2.1 Health
 - 2.2 Environmental Well-Being
 - 2.3 Productivity
 - 2.4 Daily Family Life
 - 2.5 Family Interaction
 - 2.6 Financial Well-Being

Scope of the Research

1. Population and Sample
 - 1.1 Population: 1,646 household heads of rubber farmers in Buriram province (Buriram Agriculture Office, 2012)
 - 1.2 Sample: 350 household heads of rubber farmers in Buriram province (Krejcie and Morgan, 1970: 608) with convenience sampling
2. Research Areas: Rubber plantations in Buriram province
3. Period of Data Collection: September 15 – October 30, 2013
4. Variables:
 - 4.1 Group 1: Investigating the Relationships and Effects of Implementing Sufficiency Economy Philosophy and Family Life Quality



4.1.1 Independent Variable: Implementing Sufficiency Economy
Philosophy

4.1.2 Dependent Variable: Family Life Quality

4.2 Group 2: Comparing the Relationships and Effects of Implementing
Sufficiency Economy Philosophy and Family Life Quality of Rubber Farmers in
Buriram Province

4.2.1 Independent Variables: Experience of Rubber Growing,
Numbers of Family Member, Size of Rubber Plantation, and Monthly Average Income

4.2.2 Dependent Variable: Implementing Sufficiency Economy
Philosophy and Family Life Quality

Hypotheses of the Research

1. Implementing Sufficiency Economy Philosophy has a relationship with family life quality of rubber farmers in Buriram province.

2. Implementing Sufficiency Economy Philosophy has an effect on family life quality of rubber farmers in Buriram province.

3. Rubber farmers in Buriram province who have the different experience of rubber growing, numbers of family member, size of rubber plantation, and monthly average income have implemented sufficiency economy philosophy differently.

4. Rubber farmers in Buriram province who have the different experience of rubber growing, numbers of family member, size of rubber plantation, and monthly average income have different family life quality.

Terms and Definitions

1. Rubber Farmer refers to farmers who grow rubber trees as their main job.

2. Implementing Sufficiency Economy Philosophy refers to achievement of practicing the concept of sufficiency economy philosophy that stresses the middle path as the overriding principle for appropriate way of life at individual, family, and community levels and bases on three principles: moderation, reasonableness, self-immunity and two conditions: knowledge and morality.



2.1 Moderation refers to having enough or sufficient to live on and ability of leading decent lives with necessity instead of luxury and extravagant.

2.2 Reasonableness refers to decisions and behaviors which are made and acted by intelligent approach supported or justified through fair, proper, and sound reason by avoid greedy and extremes.

2.3 Self-Immunity refers to the condition of being able to resist or prevent oneself from risks both internal and external changes.

3. Family Life Quality refers to degree of living condition in family which involves many factors such as basic needs, health, leisure, entertainment, security, education, and environment.

3.1 Health refers to the condition of family members' health both physical and mental health.

3.2 Environmental Well-Being refers to good condition of surrounding environment such as neighborhood, school, work place, and so on.

3.3 Productivity refers to ability of family's members to access good education, suitable job, and leisure and recreation.

3.4 Daily Family Life refers to free time from working and enjoyment of activities.

3.5 Family Interaction refers to relationship among members of family in everyday life.

3.6 Financial Well-Being refers to good level of having money to support family expenditure.

4. Buriram Province refers to one of the provinces located in the northeastern part of Thailand.



CHAPTER II

LITERATURE REVIEWS

In the research of “Relationships between Implementing Sufficiency Economy Philosophy and Family Life Quality of Rubber Farmers in Buriram Province”, the researcher has investigated from relevant literatures for guidelines as follows:

1. General Information of Rubber Cultivation in Thailand
2. Concept of Sufficiency Economy Philosophy
3. Concept of Family Life Quality
4. Relevant Literature Reviews

General Information of Rubber Cultivation in Thailand

1. Background of Rubber Trees

Historically, rubber is a non-wood forest product that has been utilized since ancient times. Its geographic distribution has been present in all continents within the tropical forest areas. Many tree species were utilized until the starting of large scale rubber plantations in the early 1900s. It has been found that rubber was an important commodity in the ancient cultures of Latin America where people used it to have protective clothes, balls for playing games, and syringes. Also it has been found that Castilla rubber was an important element of religious rites (rubber was preserved and used in the liquid form and was related in ceremonial use to the blood of living sacrifices: statuettes of gods). According to the historical evidence, the first rubber trees to be tapped extensively belonged to Castilla species. Native tappers started to harvest latex from Hevea species when Castilla tree population almost disappeared. After the disappearance of the primeval stands of Castilla, Hevea became the first choice of the rubber gatherers, particularly near the streams. Rubber-producing plants are found all over the world – Ficus in India, Funtumia in Africa, Cryptostegia in India and Madagascar, Langdolphia in Africa, and hundreds of latex-producing Apocynaceous vines and shrubs in southern China and the Malayan Peninsula. At least some species of Hevea and at least two species of Castilla and guayule had been used for rubber



production in the western hemisphere before the time of Columbus. The only usage for latex in the East was as a bird-lime. Already in the old times, the methods of tapping the rubber tree and processes for making crude articles from latex had been developed. Primitive technology for obtaining latex had been used nearly three and a half centuries after the discovery of rubber in the West. Once technical improvement of rubber tapping took place, the use of rubber increased; but the overall consumption of rubber was not greatly changed during that time. The merged civilization of the East and the West made their first big joint contribution to rubber technology when vulcanization was discovered in 1839 (Polhamus, 1962).

Rubber was imported into the European market in crude bottles nearly four centuries after the discovery of America by Columbus. This raw material was used for manufacturing crude footwear, waterproof raincoat, and other coverings. The sixteenth and seventeenth centuries were a period of incubation in the history of rubber. Europeans considered rubber a curiosity and found no particular use for it. By the end of the eighteenth century three species of rubber-bearing plants had been identified and described (*Hevea*, *H. brasiliensis* and *H. guianensis*; one species of *Castilla*, *C. elastica*; and an Indian vine, *Urceolaelastica*). In Europe, the usage of rubber in the eighteenth century was to manufacture pencil-mark erasers (rubbers, whence the name), catheters, surgical products and toys. The nineteenth century had new contributions to rubber development. Vulcanization was discovered, *Hevea* was introduced to the East, and new methods of tapping and coagulation were introduced. Also other important developments directly caused increasing level of rubber consumption during this century. The automobile industry was developing fast, scientific research increased the knowledge of chemical structure of rubber, and the first rubber-like material was produced synthetically. In the twentieth century, rubber consumption was significantly increasing due to fast developments that took place in the automotive industry. This event forced the auto manufacturers to establish thorough research to discover new rubber-bearing trees and to deepen knowledge on elasticity properties of rubber, and the synthesizing of new rubber-like materials. The wild-rubber industry almost disappeared in the first half of the twentieth century and at the same time the synthetic-rubber industry increased at a high speed (Polhamus, 1962).



The natural range of *Hevea*, of the family Euphorbiaceae, covers the Amazon River basin and parts of the nearby uplands. Within the genus, *Hevea brasiliensis* (also known as para rubber) is one of the most widely distributed species. It grows in an area south of the Amazon River, extending towards the west in Peru and the south to Bolivia and Brazil (Wycherley, 1992). The rubber tree has always been known for its latex, which was used by the ancient civilizations of Central and South America. The commercial and large-scale exploitation of the tree did not begin until in the last quarter of the 19th century. With the arrival of cars, discovery of the pneumatic tire and following increase in rubber prices, the produced amount of plantation-originated rubber was soon larger than that of wild rubber. At the same time, there were strong geo-political pressures to move the rubber production away from South America (Jones and Allen, 1992). While searching for a cash crop for its eastern colonies, the British identified rubber as a potential crop for planting in Southeast Asia (Hong, 1999).

2. Rubber Cultivation in Southeast Asia

Rubber was first introduced in Asia in 1876, when seeds were first shipped from the Amazonas to the United Kingdom and further to Ceylon and planted there. In the following year, rubber trees were planted in Singapore and Malaya (Hong, 1999). Although rubber was first an estate crop, local individual farmers soon adopted the crop and so they were drawn into the world commercial economy (Courtenay, 1979). Nowadays rubber is cultivated worldwide in most parts of the lowland humid tropics, but the production is heavily concentrated into Asia, where most of the World's natural rubber is being produced. In Southeast Asia, there have been found a lot of rubber-bearing plants. According to Polhamus (1962), Most of them are members of the one family, Apocynaceae, but there are also some important species from other families, like *Ficus elastica* Roxb and *Bleekrodea tonkinensis* Dub and Eber, which both belongs to the family Moraceae. The first seeds for the cultivation of the rubber were sent to Asia, Sri Lanka, in 1876, but these first attempts to grow the rubber trees (*Hevea brasiliensis* Muell. Arg.) were not successful. It was not until 1877 when 22 rubber trees were planted in Singapore. From these individuals many new rubber trees were reproduced and planted throughout the South-East Asia countries.

Because rubber has traditionally been classified as an agricultural crop, rubber plantations are considered as agricultural land and not as forest plantation.



However, the rubber tree is the most widely planted tree species in Southeast Asia (FAO, 2005). The characteristics of rubber farming systems vary within Southeast Asia. In the beginning of the 20th century, estate cultivating was encouraged in Malaya, while in Thailand and the Netherlands Indies rubber became an important crop for smallholders (Courtenay, 1979). Still at present in Peninsular Malaysia rubber is grown on smallholdings and estate plantations, the latter being characteristic to Malaysia while the smallholder rubber is dominant in Thailand. The plantations are for the most part 'monoculture', i.e. consisting of a single crop.

In Indonesia the practice is different- rubber is mainly cultivated in extensive and often complex agroforestry systems, referred to as jungle rubber. In these systems rubber is the main crop cultivated, but it is grown together with timber species, fruit trees, rattan or medicinal plants (Wibawa, 2005). Incentives for improving the productivity of rubber cultivation can sometimes be limited. In Indonesia, where the productivity of natural rubber per hectare is low, yield could be improved by increasing the number of trees per hectare, and by planting better yielding rubber varieties. However, expected land scarcity caused by outside land claims provides incentives for securing future land rights by forest clearing and rubber planting, and not so much for intensification of existing farming systems (Angelsen, 1995). Neither in Thailand is the land tenure secure in all cases. Private land ownership is recognized step by step, from registration of land use to full ownership. The registration of land occupancy is at present the only form of land security for millions of people, and although the complex rubber agroforestry system includes a variety of plants, trees as well as tree lets (banana, cocoa, and coffee), lianas and herbs which are all associated. The structure and functioning of these systems has been reported to be close to that of a natural forest. A simple agroforestry system in turn consists of a smaller number of plants, usually no more than five tree species and annual species (paddy or upland rice, maize, vegetables, herbs) or tree lets (Gouyon, 2003). These people are commonly regarded as owners of the land; a formal ownership is still missing (Luukkanen, 2001).

In Malaysia rubber has generally been planted as monocrop, but to increase productivity, some farmers cultivate short term crops such as vegetables, corn, pineapple, groundnut, and banana between rubber rows during the first two and a half to three years of rotation. An improved intercropping system has been developed in order



to sustain the productivity of intercropping over a longer period of time. In this system rubber is planted in one, double or triple rows and the inter-hedges are planted with forest or fruit trees. To assess the financial viability of rubber plantation with integrated forest trees, an economic analysis was carried out comparing rubber agroforestry systems with integrated timber trees to traditional monoculture plantations in terms of income in both smallholdings and large estates. For the smallholdings, projected income from integrated timber species seemed attractive. Hedge planting with rubber and teak (*Tectona grandis*) or sentang (*Azadirachta excelsa*) was identified an option for consideration. Sentang or teak could provide a bonus income at harvest while latex collection provides continuous supply of cash before harvesting (Arshad et al., 1997).

In Indonesia, over 70 % of the total rubber area is jungle rubber agroforestry. A jungle rubber cultivation system is usually established after slash-and-burn of secondary forest or old rubber area. Complex rubber agroforests have been observed to preserve many functions of a natural forest and therefore they could provide many environmental services: maintaining biodiversity, retaining soil water captivation capacity and sequestering carbon from the atmosphere (Joshi et al., 2002). However, complex agroforests are competing for land with more intensive land use options. When incentives for retaining the traditional agroforestry systems are not available, farmers often choose land use forms that provide fewer environmental services. Efficient compensation such as a reward practice could help preserve and promote complex agroforestry systems and the environmental services they provide (Joshi et al., 2002). The production of latex in jungle rubber agroforestry is very low- only about a third of that in intensive monocultures. Improved rubber agroforestry systems have been successfully developed, studied and promoted in Indonesia in order to improve the productivity of rubber cultivation. According to Xavier (2004), promising results on integrating plantation tree species grown for timber in rubber agroforestry have been observed in Indonesia.

Most of the original forest cover in Southeast Asia has been cleared for agriculture, including rubber cultivation. In recent times the expansion of rubber growing into primary forest has been most common in Indonesia, as a result of population growth, insecurity of land rights, land scarcity and rising rubber prices (Angelsen, 1995). Obviously, intensive rubber cultivation cannot be comparable to



natural forest in terms of biodiversity, and rubber cultivation should therefore not extend to areas covered with natural forest. In the case of jungle rubber, as pointed out before, the complex agroforestry could, however, perform many ecological functions, and when comparing rubber cultivation with other land use alternatives, the change from traditional shifting rice cultivation to smallholder rubber has been reported to have various positive ecological effects in Indonesia (Angelsen, 1995). According to Balsiger, Bahdon and Bahdon (2000), the role of rubber tree as a carbon sink has often been underestimated. Apparently due to its high leaf area index and the extra energy the tree requires to produce latex, it acts as an effective carbon sink. Intensive rubber growing areas can become vulnerable to soil nutrient loss and erosion that result from ground preparation and clear-cutting. Growing rubber together with agricultural crops could be the best way to decrease these environmental impacts. On steep slopes, terracing has been recommended to prevent erosion (RFD, 2000). Land Development Department (2005) has recommended planting of votive grass in hilly areas for erosion control. While latex harvesting is practiced, fertilizer may be required to replace nutrients lost (RFD, 2000).

3. Rubber Cultivation in Thailand

Rubber seeds were first brought to Thailand from Malaya in 1900 and planted in Trang province in southern Thailand (RFD, 2000). Estate agriculture was for political reasons discouraged in Thailand, unlike in Malaya, in the beginning of the 20th century. Rubber growing became important as a smallholder crop, when local farmers responded to the improved rubber prices in mid-1920s and planted rubber in southern Thailand (Courtenay, 1979). Favorable climatic conditions, free land areas and easy railway access enabled the adoption of rubber growing in the South (Pendleton, 1962). Small areas were planted elsewhere, mainly in Chantaburi province, where rubber seeds and seedlings from Malaya were first taken in 1908. Later the cultivation extended to some other eastern provinces (RFD, 2000).

The idea to bring rubber trees planted in Thailand was first thought when Phraya Ratsadanupradit Mahison Phakdi visited Malaysia. He saw the Malays planting rubber trees and they produced the good productivity. So he was interested to take rubber trees planted in Thailand but at that time the owner of rubber plantations did not want to give him the rubber breed. In 1901 Phra Sathon Sathanphitak visited Indonesia



and could bring rubber seedlings which their roots were wrapped by moistened cotton and wrapped again with the newspaper before containing into rain tree wooden boxes. Then he came back Thailand immediately by his personal steam boat. There were 4 wooden boxes of rubber seedlings which were planted in front of Phra Sathon Sathanphitak's house at Kantang District, Trang Province. Nowadays, there is only one left in front of the Agricultural Cooperative. Phra Sathon Sathanphitak expanded the planting area about 45 plantations. It could be considered that Phra Sathon Sathanphitak was the first rubber plantation owner of Thailand. After that Phraya Ratsadanupradit sent the group of Provincial Governors, Marshals, Village Chiefs, and Headmen going to study the method of rubber growing abroad. Then he assigned them to teach and support about rubber growing and rubber seedlings contribution. It could be said that this time was an era of rubber booming which called 'Tesa Rubber'. Now rubber trees were planted in the South and the East which there are about 9 million plantations owned by 5 hundred thousand families. Rubber is significant to be an economic plant of Thailand after rice. It makes income for the country about billions baht per year. So Phraya Ratsadanupradit Mahison Phakdi was praised to be the 'Father of Rubber'. Phraya Ratsadanupradit Mahison Phakdi devoted himself to his work. He took care of people's problems and dared to punish the ones who did wrong while the ones who did the good things would be rewarded. He tried to bring the new technologies coming back to Thailand to promote and support people in the country. In addition, he supported the policy that allowed foreigners coming to invest in Thailand. He made a deal of exchange condition which was good for public. This was a great deal of benefits until now. A monument commemorating him was erected in Tub-Thiang District, Trang Province and it was celebrated on 8th April 1951 after his 39 years death. Moreover, the streets in Phuket Province, Trang Province, and Kantang District were named after Phraya Ratsadanupradit such as Ratsada Street, and Ratsadanupradit Street to celebrate his fame (ORRAF, 2013: Web Site).

Diversification of income through introducing food crops, timber trees or livestock in rubber farming systems is a common practice in Southeast Asia. In Thailand, simple agroforestry practices such as intercropping and integration of fruit trees have been adopted at smallholdings in order to diversify sources of income. These practices have, however, not yet been formally recommended nor well documented



(Joshi, 2005). The Rubber Research Institute of Thailand (RRIT) has carried out research on various intercropping systems, and according to these studies, intercrops that could successfully be grown with rubber in Thailand are banana, papaya, pineapple and upland rice (RRIT, 2005). Cherdchom et al. (2002) reported four main integrated rubber farming systems in the South of Thailand emerging during the financial crisis in the late 1990's. The major systems included 1) Rubber intercrop farming, 2) Rubber-rice farming, 3) Rubber-fruit tree farming, and 4) Rubber-livestock farming. According to Joshi (2005), diversification of income sources through rubber agroforestry systems could become more crucial in the non-traditional cultivation area, where rainfall is low and other conditions less favorable for rubber, than in the South of Thailand. The LDD has already recommended planting of food crops with rubber in eastern Thailand. Fruit trees such as durian, mangosteen and rambutan were also recommended in order to diversify sources of income (Land Development Department of Thailand, 2005).

4. Overall Image of Rubber Industry in Thailand

In 1996, the fourth survey on Thailand's rubber plantation area was carried out by the RRIT using Landsat satellite images. According to this survey, the total plantation area was 1,959,285 ha, of which 45,420 ha (2.3 %) were in the Northeast and North of Thailand. The eastern provinces including Chachoengsao accounted for 12.3 % of the plantation area (RFD, 2000). According to Chantuma et al. (2005), presently 5 % of the plantations are in northeastern and 10 % in eastern Thailand. The Thai Government has targeted enlarging the area of rubber plantation by 48 000 hectares in the North and 112 000 ha in the Northeast of Thailand (Chantuma et al., 2005). The rubber plantation area in Thailand is much larger than the area of forest plantations in the country. According to FAO (2005), the total area of rubber plantations in Thailand was 1,680,000 ha in 2005. According to the statistics of the Rubber Research Institute of Thailand (RFD, 2000), the rubber plantation area was larger already in the year 2000, when it was recorded as 1,959,000 ha. In comparison, the area of forest plantations in Thailand in the year 2000 was 355,000 hectares. The area of natural forest in the same year was 16,486,500 hectares (RFD, 2000).

In contrast to Malaysia, where rubber is mainly grown on large estates, in Thailand 90% of rubber is grown in family-owned smallholdings less than eight hectares in size, the average area of a plantation being only two hectares (Pratummintra,



2005). Rubber yields per hectare in Thailand are the highest of the three leading rubber-producing countries. This is due to governmental support for smallholder rubber cultivation, and especially to the use of improved planting material. Of the three leading rubber producers, the yield per hectare is lowest in Indonesia, where rubber has traditionally been grown in “jungle rubber” agroforestry systems. In these systems, the low yields have been reported to result from a low level of maintenance and use of non-improved planting material (Wibawa et al., 2005).

In Thailand the smallholder rubber is intensively supported by the Royal Thai Government, in forms of technology and production inputs such as seedlings, land preparation and fertilizer (Joshi, 2005). In recent years the Thai Government has been promoting rubber planting also in new areas. In the year 2004, the goal was to extend the planted area, with a target of one million rai (160, 000 hectares) extension within two years from 2004 to 2006 (RRIT, 2005). The establishment of new rubber plantations has been promoted especially in the North and Northeast of Thailand. The estimated extension of rubber cultivation area is 400, 000 hectares by the year 2010 (RRIT, 2005). The Department of Agriculture (DOA) of Thailand has classified smallholdings, medium-sized holdings and estates as those where rubber area is less than 8 hectares, 8-40 hectares and more than 40 hectares, respectively (Pratummintra, 2005). According to Courtenay (1979), the smallholding is usually family-owned, managed by the family head and worked by family labor. The plantation in turn is frequently owned by a company or a government enterprise, and usually professionally managed (Courtenay, 1979).

Rubber grows best in a climate similar to that in its area of origin in the Amazonas, where the rainfall is heavy and there is no dry season (Rao and Vijayakumar, 1992). In northeastern Thailand, the annual rainfall is less than optimal for rubber and the dry season lasts for approximately six months. In this climate, smaller wood volumes per hectare have been reported in comparison with plantations in the traditional cultivation area (Chantuma et al., 2005).



Table 1 Planted Area, Harvested Area, Production, Reported Yields per Rai, and Farm Price 2000-2010

Year	Planted Area	Harvested Area	Production	Reported Yields per Rai per year (Dry Rubber Content)	Rubber Price
	(1,000 Rai)	(1,000 Rai)	(1,000 tons)	(Kilogram)	(Baht/kilogram)
2000	12,421	9,524	2,378	250	21.53
2001	12,440	9,521	2,561	269	20.52
2002	12,525	9,708	2,632	271	27.68
2003	12,616	10,008	2,861	286	37.76
2004	12,950	10,354	3,008	290	44.12
2005	13,596	10,574	2,980	282	53.57
2006	14,342	10,901	3,095	284	66.24
2007	15,362	11,087	3,022	273	68.9
2008	16,717	11,371	3,167	278	71.38
2009	17,254	11,600	3,090	266	58.47
2010	18,095	12,058	3,051	253	102.76

Source: The Thai Rubber Association (2011a, Web Site)

According to the Table 1, the total planted area of rubber in Thailand has increased from 12,421,000 Rai in 2000 to 18,095,000 Rai in 2010. Harvested area of rubber has also increased from 9,524,000 Rai in 2000 to 12,058,000 Rai in 2010. In 2010, Thailand produced 3,051,000 tons of natural rubber. Yields per Rai per year (dry rubber content) were 253 kilogram and rubber price was 102.76 baht per kilogram in 2010.



Table 2 World Production of Natural Rubber 2002-2010 (Unit: thousand tons)

Country	Year								
	2002	2003	2004	2005	2006	2007	2008	2009	2010
Thailand	2,615.1	2,876.0	2,984.3	2,937.2	3,137.0	3,056.0	3,089.8	3,164.4	3,252.1
Indonesia	1,630.0	1,792.2	2,066.2	2,271.0	2,637.0	2,755.2	2,751.0	2,440.0	2,736.0
Malaysia	889.8	985.6	1,168.7	1,126.0	1,283.6	1,199.6	1,072.4	856.2	939.0
China	527.0	656.0	573.0	510.0	533.0	590.0	560.0	644.0	665.0
Vietnam	331.4	363.5	419.0	481.6	555.4	605.8	660.0	711.3	754.5
India	640.8	707.1	742.6	771.5	853.3	811.1	881.3	820.3	850.8
Others	691.9	639.6	790.2	809.7	827.7	872.3	1,113.5	1,053.8	1,203.6
Total	7,326.0	8,020.0	8,744.0	8,907.0	9,827.0	9,890.0	10,128	9,690.0	10,401

Source: The Thai Rubber Association (2011b, Web Site)

According to table 2, Thailand has been the largest producer of natural rubber in the world since 2002. In 2010, Thailand produced 3,252,100 tons of natural rubber while Indonesia produced 2,736,000 tons of natural rubber, the second largest producer, followed by Malaysia which produced 939,000 tons of natural rubber.

5. Importance of Rubber Industry in Thailand

Rubber has been and still is an important commercial crop in Thailand and Southeast Asia. In Thailand's case, income from rubber cultivation is especially important for rubber smallholders. According to RRIT (2005), there are over one million rubber smallholders in the country. The demand for natural rubber has been predicted to rise from 8.4 million tons in the year 2004 to 11.9 million tons in the year 2010 (Joshi, 2005). As the demand for rubber wood products remains high as well, it is



important to ensure a sustainable and sufficient future supply of rubber products while improving the productivity of farming systems in order to contribute to ensuring good income for rubber smallholders in Thailand.

The rubber tree, *Hevea brasiliensis* (Muell.) Arg., is a major crop for smallholders in Thailand and an important commercial crop everywhere in Southeast Asia. It is grown for latex production, while rubber wood is considered as a secondary product. Therefore, rubber is regarded as an agricultural crop. However, recent improvements in wood technology have led to rubber tree becoming increasingly important as a source of wood products (Evans and Turnbull, 2004). Rubber wood has enjoyed an environmentally friendly reputation as a raw material, because it is a by-product of latex production, and when grown in renewable plantations, it can substitute timber from natural forests.

Peninsular Malaysia has been the world's most important rubber cultivation area, and the present wealth of this area was largely based on production of natural rubber (Collins et al., 1991). In the year 2005, Indonesia, Thailand and Malaysia produced 33 %, 23 % and 13 % of the world's natural rubber, respectively (FAO, 2006). Lately, the rubber plantation area has been decreasing in Malaysia, but in Thailand the trend has been reverse and plantations have started to spread to new areas in the East and Northeast of Thailand. This area has been referred to as non-traditional for rubber cultivation (Chantuma et al., 2005). Today Thailand has the second largest area of rubber plantations in the world following Indonesia, is the world's largest producer of natural rubber (FAO, 2006) and also the world leader in rubber wood production and export (Land Development Department of Thailand, 2005).

Although latex is still the main product of rubber cultivation, wood selling can increase the total productivity and enable reaching a maximum productivity of the rubber plantation earlier. This is possible because wood selling can shorten the latex tapping period, after which trees can be either felled or used for further tapping depending on the current prices of latex and wood (Arshad et al., 1997; Clément-Demange, 2004).



The wood production potential of rubber at a given site depends mainly on clone, planting density and tapping practices. In the case of clones, their architecture, most importantly the branching pattern is a critical characteristic. Breeding of more suitable clones could lead to better rubber wood productivity and increased income in the long term, but meanwhile clonal recommendations can already be given (Clément-Demange, 2004). The RRIT has already grouped rubber clones into three classes according to their latex, timber and joint production potential. Clonal recommendations for the non-traditional area in Thailand could be very useful in order to determine which clones can be best adapted to a marginal cultivation environment. Plantation forestry and estate crops are controversial issues due to their reported negative social and environmental impacts. Indeed, rubber plantation establishment has had some direct negative environmental consequences in Thailand in the past. The logging ban of all forests, which was declared in Thailand in 1989, was adopted following environmental degradation caused by logging and rubber plantation development on forest land (Collins et al., 1991). After the ban, Thailand's timber has had to be taken from forest and rubber plantations. This has been one of the main factors driving the increasing utilization of rubber wood for industrial purposes.

Thailand has a large rubber wood industry, and its products include furniture, particle board, and parquet board and construction boles (RFD, 2000). The annual export value of Thailand's furniture industry is more than 300 million US dollars (FAO, 2005). Yet the rubber wood industry in Thailand still faces some constraints and challenges within resource management as well as industries, product and market development. Although the resource base is large, the quality of raw material is restricted. The main problems concerning resource management and utilization were inefficiency of rubber wood raw material management due to insufficient promotion and development of high-yielding combined latex and timber clones, unfavorable infrastructure, and difficulties in logging especially during rainy season, and restricting regulations for logging.

Rubber production on small-scale farming systems in Thailand is a secured way for farmers to gain constant income for their livelihood. Besides, rubber wood farming systems are easy to maintain because culture costs are mainly present at the preparation and planting stages. Economic risks to small-scale rubber farmers are not



that significant because farmers always have the possibility to substitute their income source by switching into alternative farming products. For instance, if latex price is low, farmers may decide to clear their land and sell rubber wood to a sawmill. Also, farmers have the possibility to intercrop other cash crops or valuable tree species such as Dipterocarp for construction wood.

Table 3 Natural Rubber Production of Thailand in 2000 – 2010 (Unit: tons)

Year	Production	Export	Domestic Consumption	Stock	Import
2000	2,346,487	2,166,153	242,549	188,635	-
2001	2,319,549	2,042,079	253,105	213,000	-
2002	2,615,104	2,354,416	278,355	196,680	1,347
2003	2,876,005	2,573,450	298,699	202,240	1,704
2004	2,984,293	2,637,096	318,649	232,560	1,772
2005	2,937,158	2,632,398	334,649	204,256	1,585
2006	3,136,993	2,771,673	320,885	249,895	1,204
2007	3,056,005	2,703,762	373,659	230,390	1,911
2008	3,089,751	2,675,283	397,595	251,721	4,458
2009	3,164,379	2,726,193	399,415	293,659	3,167
2010	3,252,135	2,866,447	458,637	227,252	6,542

Source: The Thai Rubber Association (2011c, Web Site)

According to table 3, the natural rubber production of Thailand was 2,346,487 tons and the total export was 2,166,153 tons in 2000. The natural rubber production of Thailand has increased to 3,252,135 tons and the total export has increased to 2,866,447 tons in 2010. Domestic consumption has also increase from 242,549 tons in 2000 to 458,637 tons in 2010. In 2010, the total stock and import of natural rubber has increased to 251,721 tons and 6,542 tons respectively.



Concept of Sufficiency Economy Philosophy

1. Definition of Sufficiency Economy Philosophy

With an aim to encapsulate this profound thinking, during the year of 1999, the National Economic and Social Development Board (NESDB) invited a group of eminent persons to construct the definition of the philosophy of sufficiency economy. The endeavor has resulted as the following definition:

Sufficiency Economy is a philosophy that stresses the middle path as an overriding principle for appropriate conduct by the populace at all levels. This applies to conduct starting from the level of the families, communities, as well as the level of nation in development and administration so as to modernize in line with the forces of globalization. Sufficiency means moderation, reasonableness, and the need of self-immunity mechanism for sufficient protection from impact arising from internal and external changes. To achieve this, an application of knowledge with due consideration and prudence is essential. In particular great care is needed in the utilization of theories and methodologies for planning and implementation in every step. At the same time, it is essential to strengthen the moral fiber of the nation, so that everyone, particularly public officials, academic, businessmen at all levels, adheres first and foremost to the principle of honesty and integrity. In addition, a way of life based on patience, perseverance, diligence, wisdom and prudence is indispensable to create balance and be able to cope appropriately with critical challenges arising from extensive and rapid socioeconomic, environmental, and cultural changes in the world (NESDB, 1999).

As a result of the Asian Financial Crisis, in 1998, His Majesty the King re-emphasized the importance of the sufficiency economy during his speech on his birthday that year. The sufficiency economy can be defined as:

A philosophy that stresses the middle path as the overriding principle for appropriate conduct and way of life by the populace at all levels. This applies to conduct and way of life at the levels of the individual, family, and community, while providing a choice of a balanced development strategy for the nation so as to develop in line with the forces of globalization, and shielding against inevitable shocks and excesses that may arise. Sufficiency means moderation and due consideration in all modes of conduct, together with the need for sufficient protection from internal and external



shocks. To achieve this, the application of knowledge with prudence is essential (Sufficiency Economy Organization, 1999: Web Site).

His Majesty the King also elaborated on the meaning of ‘self-sufficiency’ as: Having enough to live on and to live for means self-sufficiency. If everybody has enough to live on and to live for, that is good. And if the whole nation reaches that status that is even better. Formerly, Thailand had enough to live on and to live for. Self-Sufficiency, in English, means that whatever we produce, we have enough for our own use. We do not have to borrow from other people. We can rely on ourselves, as people say; we can stand on our own legs. But self-sufficiency carries a broader meaning. It means having enough and being satisfied with the situation. If people are satisfied with their needs, they will be less greedy. With less greed, they will cause less trouble to other people. If any country values this idea – the idea of doing just to have enough, which means being satisfied at a moderate level, being honest and not being greedy, its people will be happy. Being self-sufficient does restrict people from having a lot, or possessing luxurious items, but it implies that one must not take advantage of others. Everything must be within limits. Saying what is necessary, acting just as needed is and working adequately. Therefore, self-sufficiency here means within proper bounds and reasons (The Chaipattana Foundation Journal, 1999: Web Site).

Sufficiency Economy is a philosophy that guides the livelihood and behavior of people at all levels, from the family to the community to the country, on matters concerning national development and administration. It calls for a ‘middle way’ to be observed, especially in pursuing economic development in keeping with the world of globalization. Sufficiency means moderation and reasonableness, including the need to build a reasonable immune system against shocks from the outside or from the inside. Intelligence, attentiveness, and extreme care should be used to ensure that all plans and every step of their implementation are based on knowledge. In this way we can hope to maintain balance and be ready to cope with rapid physical, social, environmental, and cultural changes from the outside world (Krongkaew, 2003)

Sufficiency Economy Philosophy, bestowed by His Majesty the King of Thailand, is a holistic concept of moderation that acknowledges interdependency among people and with nature. It calls for a balanced and sustainable development as its



objectives which can be achieved, if the framework and the process of development are appropriate with social and natural conditions (Sathirathai and Piboolsravut, 2004).

In summary, Sufficiency Economy Philosophy is a philosophy that focuses on having enough or sufficient to live on, being able to lead decent lives with necessity instead of luxury and extravagant, making decisions by intelligent approach supported or justified through fair, proper, and sound reason by avoiding greedy and extremes, and being able to cope with internal and external shock under two conditions, knowledge and morality, in order to achieve the goal of balance and sustainability.

2. Background of Sufficiency Economy Philosophy

Although His Majesty has been promoting self-reliant or sustainable farming since the 1950s, it is generally accepted that the idea of sufficiency economy had been brought up in the 1970s during in His Majesty's speeches. "I ask all of you to aim for moderation and peace, and work to achieve this goal. We do not have to be extremely prosperous. If we can maintain this moderation, then we can be excellent" (Royal Speech, 1974). In this royal statement, His Majesty concerned that modern development which emphasized only the economic expansion might eventually lead the country to crisis. Therefore, he stressed the importance of building a good and stable foundation before further progress could be developed. This means that instead of putting the emphasis on the expansion of the industrial sector prior to development, the stability of the basic economy should be established first, that is, assuring that the majority of rural people have enough to subsist first. This is a method of development that stresses the distribution of income to build the overall economic foundation and stability of the country before going on to a higher level of development (The Chaipattana Foundation, 2013: Web Site).

The concept of sufficiency economy philosophy was initially articulated in the Royal Speech of December 1974. Over the past three decades, His Majesty has graciously reminded Thai people through his royal remarks on many occasions of a step-by-step and balanced approach to development, which is now known as Sufficiency Economy Philosophy. The philosophy provides guidance on appropriate conduct covering numerous aspects of life. The following is one example of an excerpt from His royal speech in 1974:



Economic development must be done step by step. It should begin with the strengthening of our economic foundation, by assuring that the majority of our population has enough to live on. Once reasonable progress has been achieved, we should then embark on the next steps, by pursuing more advanced levels of economic development. Here, if one focuses only on rapid economic expansion without making sure that such plan is appropriate for our people and the condition of our country, it will inevitably result in various imbalances and eventually end up as failure or crisis as found in other countries (Royal Speech, 1974).

This philosophy attracted attention once again during the 1997 financial crisis, as the King advised the country to adopt such an economic principle in order to maintain stability and to quickly recover (UNESCAP, 2006). Note should be taken that the King's words are highly valued by the Thais, not simply because the Thai people revere their King, but also because His Majesty the King has been committed to life-long learning and continuous development for the Thai people and their well-being (Curry and Sura, 2007). Therefore, in order to understand economic development in Thailand, it is important to consider the special relationship between the Thai people and their monarch. The King has earned abiding love and profound respect from his people through his caring leadership (Krongkaew, 2003; Piboolsravut, 2004). His thinking has inspired the establishment of the country's development strategy and his words are not merely believed because of his position; he is equipped with experience and knowledge. The King of Thailand was educated in Switzerland and received a certificate from the Public Health Program of Harvard University. He has been committed to the best interest of the Thai people and the country (Curry and Sura, 2007; Israngkul and Pootrakool, 2008). He has provided economic development initiatives, educated the farmers on how efficiently to grow agricultural products, suggested land planning and development ideas to minimize the effects of flooding in urban areas, including Bangkok, all for the purpose of ensuring that his people have enough to live on. The idea of Sufficiency Economy is one of his other initiatives which he urges Thai people to practice to the greatest extent possible (Krongkaew, 2003). The Philosophy of Sufficiency Economy is not only well-regarded by Thai people, but also in the international arena. At the tenth UN Conference on Trade and Development



(UNCTAD) in February 2000, the sufficiency economy was acclaimed and His Majesty the King Bhumibol Adulyadej was recognized as the ‘Developer King.’

The New Theory puts a high priority on human resource development, under the principle of people-centered development, by means of empowerment by and for the people, comprising enhancement of people's potential and capacity-building for individuals. The process of participation in decision-making on development is encouraged, in tandem with the creation of an enabling environment, for individuals to utilize their potential for enhancing their opportunities and to have more options in life, along with the development of the quality of life. This has been summed up as the development of the people, by the people and for the people. The development of the people, as farmers are given the knowledge and ability to increase their productivity, earning more income, such as from rice-farming, fruit-tree growing, and fish rearing, management of the market and improved administration as groups or cooperatives, with better bargaining power and extension of cooperation to energy and capital sources; the development by the people, because farmers adopt the New Theory of their own free will, and voluntarily expand the results of the development to strengthen the society from the grassroots, by attaining self-supporting ability; the development for the people, as in the objectives of the second phase of the New Theory, with the focus on the improvement of the living condition, welfare, education, social and religious aspects, and the third phase, which clearly defines the ‘development of the quality of life’, yielding benefits to all sides. The main feature of the community economy is that families and communities are the production units, with the objective of enabling the families and communities to be self-supporting. The production is therefore meant for household consumption, and then for sale to raise income for the family's survival, rather than to make maximum profits. The household is thus a small and independent producer, utilizing the available labor in the family on the existing land to feed the family, originally with rice-growing (The Chaipattana Foundation, 2013: Web Site).

The New Theory consists of the three following phases (UNESCAP, 2006):

Phase 1: Self-reliance: To live at a self-sufficient level which allows farmers to become self-reliant and maintain their living on a frugal basis.



Phase 2: Community-reliance: To cooperate as a group in order to handle the production, marketing, management, and educational welfare, as well as social development.

Phase 3: Network-reliance: To build up connections within various occupation groups and to expand businesses through cooperation with the private sector, Non-governmental Organization (NGOs) and the government, in order to assist the farmers in the areas of investment, marketing, production, management and information management.

Moreover, the new theory of the Philosophy of Sufficiency Economy also emphasizes on the means and goals of using existing resources in the long term. Farmers should produce and consume the resources sufficiently and reasonably in order to keep balances of the natural resources and as a result, they will have sustainable resources for future consumption which is safe from unexpected changing external world.

3. Key Principles of Sufficiency Economy Philosophy

His Majesty the King suggested that prosperity must be sustained and it should be decentralized. As such, he proposed three key principles and two foundations as the guiding principles for both country and any developments of enterprise (Tantivejakul, 2011).

Principle1: Moderation refers to sufficiency at a level of not doing something too little or too much at the expense of oneself or others, for example, producing and consuming at a moderate level. Moderation is the key to success. We must examine our strengths and weaknesses, and know where we stand in terms of potential. Keep the middle path as a balance of life. As an example of moderation, people said we are the world boxing champion, but at what level? In terms of moderation, our potential is the bantamweight level and below, not the heavyweight. Even our boxers with the same weight as Mike Tyson could not compete with him, since it is beyond their capacity. As another example, people should not be led by desire by over-consuming food so that they feel uncomfortable. We should eat moderately in order to avoid obesity, high blood pressure, or high cholesterol. Such diseases are not caused by any bacteria, but by dining habits alone, even though 57% of people face similar health problems.



Principle 2: Reasonableness refers to the decision concerning the level of sufficiency that must be made rationally with consideration of the factors involved and careful anticipation of the outcomes that may be expected from such action. Use reasons as guidance rather than desires. Be bold to choose the path of the country's development and not fall into the global trend, since each country has its own conditions and environment. Sufficiency Economy Philosophy gives attention to future generation capability to utilize resources; therefore, the present generation must utilize natural resource efficiently and concerning the long run impacts. Investment and productivity improvement are needed to make up for depleting natural resources. We need to maintain consciousness and wisdom, and to choose our way of life with our own judgment. For example, do not accept the idea that we are not competent; it will be unsuccessful and cause needless stress.

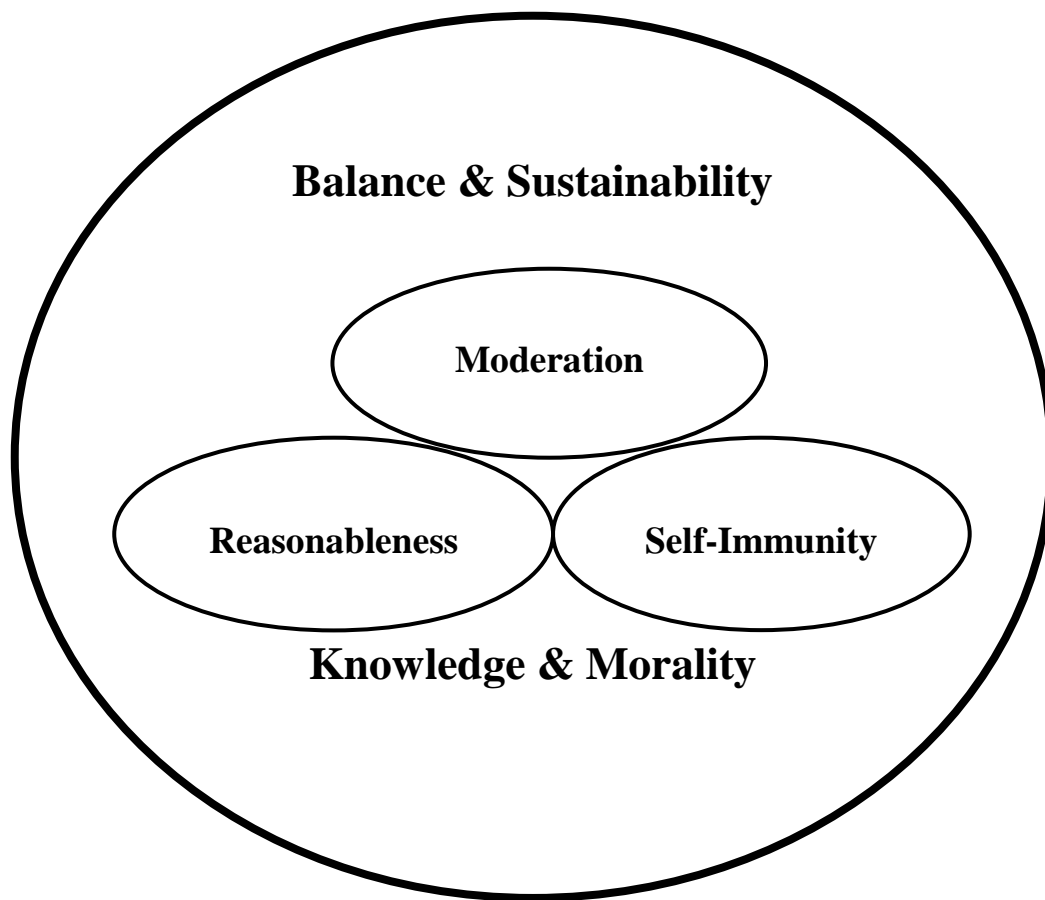
Principle 3: Self-Immunity refers to the preparation to cope with the likely impact and changes in various aspects by considering the probability of future situations. Build immunity continuously because the world is changing rapidly. Any planning is, therefore, subject to risks. We need to have a clear vision about where we are heading for. The price of oil is a case in point. In order to mitigate risk, we need to find alternative sources of energy, such as bio-diesel. His Majesty has told us about bio-diesel for a very long time. If we prepare ourselves, we would better be able to respond to such a crisis. Therefore, building immunity must act in concert with clear foresight. Even at the individual level, we need to prepare ourselves for unexpected situations, such as sicknesses or accidents. We must have savings reserved for such unexpected incidents. In other words, immunity is the way in which we manage risks.

In addition to the above principles, His Majesty the King has proposed two foundations that one should adhere to; namely knowledge and morality.

Foundation 1: Knowledge comprising all-round knowledge in the relevant fields and prudence in bringing this knowledge into consideration to understand the relationship among the field so as to use them to aid in the planning and ensure carefulness in the operation.

Foundation 2: Morality comprising the awareness of honesty, patience, perseverance, and intelligence in leading one's life.





Source: Tantivejkul (2011: 4)

Figure 1 Conceptual Framework of Sufficiency Economy Philosophy

4. Importance of Sufficiency Economy Philosophy

The country development in the last four decades lacks balance, is unsustainable, and is susceptible to the effects from the uncertainty of external factors such as the economic crisis in 1997. Also, there are economic and social structural problems and deterioration of natural resources and environment. The Office of National Economic and Social Development Board (NESDB) has realized the problem; therefore, it has defined a new direction of the country development focus on complement the balance, sustainable and giving priority on people participation in all level by the introduction of the Sufficiency Economy Philosophy that bestowed by His Majesty the King to his subjects through royal remarks on many occasions over the past three decades (Tantivejkul, 2006).



His Majesty has told us, in his philosophy of Sufficiency Economy, that the national development is similar to building a house. The first step is to lay a strong foundation, and we must bear in mind that the weight a house can support is determined before we ever begin physical construction. It goes without saying that a two-story house requires a foundation that is appropriate for its weight; so does a country that has to be developed on a reasonably firm foundation. Thailand is an agricultural society, but it is progressing toward becoming a newly industrialized country (NIC), a goal which requires 3 key factors. The first is money; since that is presently insufficient, more loans are needed. Secondly, Thailand's level of technology must be improved, which can best be accomplished by technology transfer, meaning that new technology must be imported. Thirdly, human resources must also be a priority. Our average level of education is rather low; we need to import foreigners to manage our money and technology. As mentioned above, Thailand's industrial development has thus far excessively relied on other countries. Accordingly, when a global investment target changes, the economy collapses, just as if the foundation were suddenly removed from beneath the house. The house then falls apart; the final stage in the development cycle, in accordance with Buddhist beliefs on birth, oldness, sickness and death (Tantivejkul, 2011).

This new economic philosophy aims to generate ties among different people from all sectors and to enhance positive strength in order to create unity, balanced and sustainable development, as well as readiness to cope appropriately with critical challenges occurring as a result of globalization. It also aspires to strengthen the symbiosis and harmony between man and nature (Tinsulanonda, 2001; Piboolsravut, 2004). Therefore, it can be said that the Sufficiency Economy is good capitalism. Bad capitalism is where production is higher than demand, consumption is higher than earnings, and the environment is destroyed more than it is repaired. As mentioned earlier, sufficiency economy promotes everything opposite the 'bad' capitalism, where one should earn more than his expenditures, save more in order to invest, and live within one's means. It is often misunderstood that the philosophy of the 'Sufficiency Economy' is applicable only to the agricultural sector, given the fact that Thailand is predominantly engaged in the agricultural sector, with most of its population located in the rural area. In fact, it is important for Thailand to remain competitive in sectors other



than the agricultural sector, including manufacturing, services, and other non-agricultural economic activities, so that the country can be an active player in the global economy. The Sufficiency Economy promotes taking a balanced approach to life as the finest route for personal conduct (Krongkaew, 2003). It is meant to be followed by people at all levels and in every sector of the Thai economy. Piboolsravut (2004) has elaborated on the Sufficiency Economy as a guide for living with universal domain applicability as well as a foundation that governs everything from motivation, criteria, behavior and systems while addressing all issues within a dynamic setting.

His Majesty's Philosophy of Sufficiency Economy emphasizes that the producers or consumers try to produce or consume within the limit or limitation of existing income or resources first. This is the principle in decreasing the dependence and increasing the ability to control the production themselves, thus decreasing the risk from not being able to efficiently control the market system. Sufficiency Economy does not mean that one must constantly be frugal. A person can indulge himself in luxury once in a while, provided that it is within his capacity to do so. But the majority of the country's population often overspends beyond their means. Sufficiency Economy can lead to the goal of establishing economic stability. Fundamentally, Thailand is an agricultural country; therefore, the country's economy should be keyed towards agro-economy and food stability in order to establish a stable economic system to a certain degree. This is an economic system that can help lessen the risk or economic instability in the long run (The Chaipattana Foundation, 2013, Web Site).

It is a common goal for all countries to achieve not only economic growth but also sustainable development (Israngkul and Pootrakool, 2008). Israngkul and Pootrakool have also suggested that in order to achieve sustainable development, developing countries are urged to adopt liberal market-oriented approaches, and since World War II, Thailand has followed this path. The success of economic growth and social development that Thailand enjoyed until the economic crisis was a consequence of the cooperation among four important institutions, namely: the Ministry of Finance, the Budget Bureau, the Bank of Thailand, and the National Economic and Social Development Board. Despite such success, Thailand encountered many problems after 1997. As a result of the Asian Financial Crisis, in 1998, His Majesty the King re-



emphasized the importance of the Sufficiency Economy during his speech on his birthday that year.

The Sufficiency Economy promotes gradual development on the basis of self-reliance and having enough to live and to eat, and the three main components of this philosophy include Moderation, Reasonableness, and Self-Immunity (Piboolsravut, 2004; Israngkul and Pootrakool, 2008). The principle of self-reliance has five aspects, as quoted from UNESCAP (2006: 1):

1. State of Mind: One should be strong, self-reliant, compassionate and flexible.

2. Social Affairs: People should help one another, strengthen the community, maintain unity and develop a learning process that stems from a stable foundation.

3. Natural Resource and Environmental Management: the country's resources need to be used efficiently and carefully to create sustainable benefits to develop the nation's stability progressively.

4. Technology: technological development should be used appropriately while encouraging new developments to come from the villagers' local wisdom.

5. Economic Affairs: one needs to increase earnings, reduce expenses, and pursue a decent life.

To achieve Sufficiency Economy, there must be two underlying conditions: knowledge and morality. The Sufficiency Economy requires carefulness when applying knowledge. The Sufficiency Economy can: (Keyes, Hart, and Ruangtorsak, 2007: 1)

1. Alleviate poverty and reduce the economic vulnerability of the poor: through 'Moderation' (modesty in consumption), 'Self-Immunity' (minimization of borrowing to the amount where the borrowers can for certain pay back the loans), and 'Reasonableness' (reasoning prior to consumption and borrowing).

2. Drive community empowerment and community strength to be foundations of the local economy: through a collective goal shared by communities could jointly steer for the best production. For instance, the King has initiated the Sufficiency Economy program in many local communities to do farming and agricultural products whereby a village produces what it is good at and trades with its neighbors.



3. Be vital for improving governance standards in public administration: less greed by the government officials would take away corruption in the public administration.

4. Guide macro-economic policy making to immunize a country against shocks and to plan strategies for more equitable and sustainable growth: Self-Immunity would minimize the side-effects of adversity.

Further, Thailand is one of the many countries facing severe problems of natural resource depletion, environmental degradation, and global warming as a result of economic development (Sathirathai and Piboolsravut, 2004). The Sufficiency Economy promotes the symbiosis and harmony between people and their natural environment through Reasonableness, Moderation and Self-Immunity. Economic problems arise because people want more than they have (Calkins, 2008). One prevalent criticism is against the prevailing Anglo/U.S. capitalist ideology, claiming that it promotes a short-term, share-holder approach and arguably neither does it lead to sustained business success nor to improved life quality of individuals and societies (Kantabutra, 2006; Calkins, 2008; Kantabutra, 2008). The sufficiency philosophy was then brought to the attention of the public by the King. Nevertheless, there was a false assumption that the Sufficiency Economy is against capitalism, which is not good for the economy as a whole. Some scholars were misled into thinking that the Sufficiency Economy promotes isolationism, and this belief should be disregarded outright (Krongkaew, 2003). Krongkaew (2003) has stated that in a self-reliance system, a country is completely reliant on itself and/or its people to produce all its needs without any dependence on others. Some also refer to the Sufficiency Economy as a 'Gandhian Economy', where the economy is traditionally based on the family and on small-scale level enterprises. This would have been practical in India during the middle of the twentieth century due to limited but it is no longer feasible nowadays, where there are modern needs and modern technology. The Sufficiency Economy has taken the concepts of advanced technologies and globalization into consideration. The Sufficiency Economy is an economy fundamentally conditioned by basic needs, not greed or a consciousness to reduce consumption (Krongkaew, 2003; Calkins, 2008), although luxuries are allowed within each individual's means.



According to Susangkarn (1999), the Sufficiency Economy is in line with neo-classical economics, as he compared moderation with diminishing marginal utility and reasonableness with rationality. Further, the Sufficiency Economy is consistent with capitalism. The fundamental principle of capitalism is that consumers supply labor and use their income and returns from savings to finance their spending. They can choose to consume or save, and they can spend more than their lifetime earnings, although they are allowed to borrow in the short-run. Savings are used to finance investment or capital accumulation in the economy and there is not enough capital accumulation if everyone consumes his or her income. Economic growth rests on the capital return, not borrowing. Japanese citizens saved a lot and their savings were channeled to their country's productive economic sectors from the 1950s to the 1970s; and the buyers of their products are foreigners. In case there is an immediate need for the country's economic development, the 'Sufficiency Economy' allows borrowing to a certain limit where the borrowers are certain of their capability of repaying their debts as long as the debts create further capital gains and not unreasonable over-borrowing. This supports the 'Reasonableness' component of the Sufficiency Economy.

The Sufficiency Economy Philosophy also promotes a more efficient and successful integration of the Thai economy into the extensive and unstable globalization process (Tinsulanonda, 2001). It supports the inevitable process of increasing global interdependence as well as the dependence of people on their natural environment through modest consumption (Sathirathai and Piboolsravut, 2004). The two frameworks of the Sufficiency Economy include the unavoidability of being a part of the globalized world, guided by economic efficiency and competition, as well as the need for economic security and the capacity to protect oneself from external shock and instability (Krongkaew, 2003).

5. Implementation on Sufficiency Economy Philosophy

According to Sumeth Tantivejkul, Sufficiency Economy Philosophy can be applied to a society at all levels (Tantivejkul, 2011) as follows:

5.1 Individual and family levels

Sufficiency economy at individual and family levels is the ability to lead one's life according to their circumstances, not being enchanted by the wave of materialism, and being independent without any confinements. We must be reliant on



five principles: namely, mentality, society, natural resources and environment, technology, and economy. We need to be content with 'enough' and not take advantage of others; to continuously self-improve in order to strengthen our capability; and to be happy and satisfied with our sufficient lives by holding the middle path in leading them. For example, we would not buy things without the presence of true necessity.

5.2 Community level

People work together for the benefit of the community by utilizing the wisdom and capability of each individual. To be successful, everyone must be conscious of morality and honesty, and utilize transparent, moderate, and reasonable practices. Other factors include careful investment with wisdom in order to continue improving one's community, and to build immunity responsive to internal and external challenges, with which one can promote a network among communities. In addition, those living together in family and community settings must be considerate, and kindly help each other in order to create synergy among community networks. In modern society, people in urban areas do not often know their neighbors, which is quite different from past times in which communities were familiar with every resident. This is a potential sign of weakness in our society.

5.3 National Level

The concept is to administer the country by laying a foundation such that citizens have enough to live on and are self-reliant; that they are equipped with knowledge and morality in leading their lives. People are encouraged to work together in groups to exchange knowledge and wisdom, and work together under the principle of Sufficiency Economy in a loving and harmonious manner. In addition, people must work together as a network in order to create a society of sufficiency. The country's development must base on a strong foundation, with a clear direction that considers its capability and strengths. Once our own potential is realized, our correct path of development will clearly follow. For example, we should promote a policy of , Thai kitchen to the world', since we are an agricultural country. We have high quality materials and ingredients, and the deliciousness of Thai cuisine is renowned the world over. Therefore, comprehensive measures along the value chain should be conducted in order to promote such policies.



5.4 Politicians

Politicians must be aware that in formulating policies, legislation, and regulations, as well as their own political path, they must hold to the principles of sufficiency and the realization of social benefits. Their actions and decisions must be made on the basis of equality, good attitude, and thinking, never neglecting honesty, trustworthiness, diligence, and conscientiousness.

5.5 Government Officials

Executives must pay strict attention to risk management, improvement of organizational structure, and must assign staff according to their capacity. Such administration must be conducted according to good governance principles, e.g. transparency and morality. Resources must be economically and carefully administered. Implementation, policy and program formulation must be made in correspondence with the principles of sufficiency economy, by focusing on development and finding solutions for social, economic, and moral problems. Government officials should adopt the concept of sufficiency economy to their way of life; e.g., living normal lives with self-reliance, and performing their duties with honesty, responsibility, carefulness, suitable spending to their income, continuing improvement of skills and knowledge, avoiding allurements, and maintaining Thai culture. As government officials, they should provide services to people with kindness, efficiency, and equality. Similarly to the current concept on risk management, immunity must be built when implementing government policies, in order to avoid any possible problems.

5.6 Teachers and Academic Administrators

As the role model to their students, teachers can adopt the concepts of sufficiency economy to their lives, including diligence, tolerance, not being involved in gambling and allurements, frugality, etc. They should also develop teaching methods in accordance with sufficiency economy, such as paying strict attention to teaching, continually searching for new knowledge, and allowing students to express their opinions. As a result, sharing of knowledge between teachers and students will thus be promoted, which will then stimulate the love-of-learning attitude. Morality should then be instilled, in order to create responsible and clever citizens who will contribute to the future of Thai society.



5.7 Students

Students must appropriately arrange their schedules for studying, playing, and living. They should know themselves and keep pursuing knowledge and new theories. They should also associate with good friends, and be diligent, honest, grateful, and reasonable in spending. They must build moral immunity by not stealing, not telling lies, and not smoking or drinking alcohol.

5.8 All Citizens

All citizens must live their lives on the basis of self-awareness, self-reliance, and interdependence amongst each other. They should live sufficiently, and adhere to religious principles by leading their lives according to a sound moral framework, not taking advantage of themselves or others. One should lead one's life without excess or overindulgence in luxury, knowing how to share and help others according to one's capacity. In other words, we should lead our lives on the middle path, that is, moderately, without too much or too little.

5.9 Business Level

Under the concept of Sufficiency Economy, a business has the intention to conduct its transactions with long term benefits rather than short term ones. It accepts normal profits with reasonable returns to its investors and shareholders. In addition, such businesses must not seek profits by taking advantage of consumers or conducting illegal transactions. Sufficiency Economy does not object to export, but such exports must be done with immunity in order to prepare for any changes. They shall be done with the realization that in keeping pace with globalization, one must rely on knowledge, attentiveness, and carefulness. In addition, businesspersons should be able to seek reasonable loans to support their investments and generate income. However, they must be able to pay back their debts. Business should be conducted with morality, honesty, diligence, tolerance, and with social responsibility. Its products and the quality therefore should continue to improve, in order to maintain responsiveness to market needs and changes due to technology. To be sustainable, business conduct must be ethical and maintain balance in sharing benefits to all stakeholders, including employees, company, consumers, and society as a whole.



5.10 Farmers

His Majesty the King has given the 'new theory' for farmers as the way toward sufficiency. Capitalism encourages farmers to grow a single crop, such as rice, sugarcane, rubber, jute, or pineapple. Instead of growing many crops in their farms so that family members are able to consume and sell, farmers grow only one crop, believing that they can earn more income from selling a high volume of produce. On the other hand, if it turns out that they cannot sell their produce, they will earn nothing, at the same time having to buy other crops for consumption. For farmers who grow only rice, once they sell the produce from their paddies, they have to buy rice and other vegetables for household consumption. When rain is plentiful and agricultural yield is high, they are happy. On the contrary, in a drought year, they face severe difficulty. His Majesty, therefore, placed a high priority on subsistence agriculture. The land shall be divided into four parts with proportion of 30:30:30:10. The first 30% is to dig ponds to collect water, so that farmers can have water without sole reliance on underground sources. Fish can also be raised in these ponds, so that farmers have food and can even earn income from selling their catch. Another 30% is reserved for cultivating rice for domestic consumption, while rice bran can be used for raising pigs. His Majesty said that brown rice has high nutritional value; once it is polished, all the nutrition has been taken out. Brown or unpolished rice has now become popular among Thai people. With high demand, brown rice has become more expensive than polished rice. The next 30% is allocated for garden crops, farm crops, and home-grown vegetables used for household consumption. If there are any of those crops left over, farmers will be able to sell them. These crops include chili, 8 onions, lemongrass, garlic, coconut, and other fruits. Farmers therefore do not need to purchase any crops for self-sustenance; additionally, these crops remain toxin-free. The last 10% of land is for housing and other domestic activities. His Majesty remarked that such a sufficiency economy can endure in perpetuity. Those crops left over from household consumption can be sold. They can even be transformed into curry paste or other food as desired. If farmers have more capital, they may even use machines to increase their productivity. Some groups may set up cooperative or community stores in order to better place their produce. Step-by-step, they then expand into bigger and more sustainable businesses. Such practices have been widely applied throughout Thailand, and those who observe



them lead happier and wealthier lives in their small plots of land. As for the business sector, several sizable corporations have adopted such concepts and thereby become successful. Currently, Kasetsart University has initiated a course on Sufficiency Economy for business administration. I would here like to recommend one book, namely, *The Millionaires Next Door*. The behavior of 100 American millionaires is therein observed. They were invited to a party with luxury foods, such as caviar, Champagne, etc. More than half of those millionaires did not eat such food at all. When asked, they replied that they have never eaten such food, and prefer to live moderately. Before expanding their businesses, they evaluated themselves and did not accept huge loans. When crises struck, they were therefore less affected. That is to say, they conducted their businesses according to the principles of Sufficiency Economy. In 2006, the United Nations presented an award in recognition to His Majesty's many contributions to human development, dissolution of poverty, and conservation of the environment in Thailand. Under the statement, the philosophy of Sufficiency Economy does not benefit only Thailand, but to all countries who desire to sustainably strengthen their development. In addition, UNDP Thailand published the 2007 Thailand Human Development Report on, Sufficiency Economy and Human Development, and distributed it to all countries worldwide. His Majesty does not bestow this philosophy for the Thai people only, but to suggest the way out for all humans worldwide, so that globalization moves in the right and appropriate direction, leading to sustainable balance on the foundation of morality, ethics, and good deeds. Sufficiency Economy can bring sustainable happiness for everyone whom is involved.

Concept of Family Life Quality

1. Definition of Life Quality and Family Life Quality

Quality of life has no single uniform definition (O'Boyle, 1997). Cummins (1997) summarized 60 quality of life definitions. Hughes and Hwang (1996) analyzed 87 studies on what constitutes quality of life and identified 44 definitions. Some scholars have equated it with access to material goods and services and others have equated it with positive life experiences (Andrews and Withery, 1976; Campbell, 1981). While the former focus on the objective conditions in which people live, the latter deal



exclusively with how people feel about those conditions and other life experiences. Indeed, researchers have agreed that quality of life is multi-dimensional and includes both subjective and objective dimensions (Halpem, 1993; Testa and Simonson, 1996).

Life quality based on the ecological perspective is concerned with human betterment and refers to the good and satisfactory character of people's lives and to the totality of life fulfillment (Szalai, 1980).

Life quality has been defined as the satisfaction of an individual's values, goals and needs through the actualization of their abilities or lifestyle (Emerson, 1985).

Life quality has been defined as the satisfaction and well-being stem from the degree of fit between an individual's perception of their objective situation and their needs or aspirations (Felce and Perry, 1995).

Ferrell, who has carried out a large research program on pain and life quality, defined life quality as well-being covering four areas: life quality is physical, mental, social and spiritual well-being (Ferrell, 1995).

Lindströ and Henriksson (1996) has presented a model where life quality was divided in a different way into four life spheres /the global, external, interpersonal and personal sphere where the last one was represented by the physical, mental and spiritual dimension.

Life quality is a broad concept that incorporates all aspects of life and has been used in a variety of disciplines such as: geography, philosophy, medical sciences, social sciences, health promotion, and advertising (Oort, Visser, and Sprangers, 2005).

The World Health Organization defines life quality as an individual's perception of their position in life in the context of the culture and value systems in which they live and in relation to their goals, expectations, standards, and concerns. It is a broad ranging concept affected in a complex way by the person's physical health, psychological state, personal beliefs, social relationships, and their relationship to salient features of their environment (Oort, 2005).

In summary, life quality could be the individual's perception of satisfaction level of life in terms of both objective materials and subjective experiences.

Family life quality involves the goodness of family life. There are numerous important aspects of family life that people everywhere share and in which they strive to



attain a satisfactory outcome. Family life quality can best be understood from a basic definition of each of its inherent constructs.

Turnbull et al. (2000) defined family as those people who; (a) consider themselves as a family (whether or not they are related by blood or marriage), and (b) support and care for each other on a regular basis. Thus, they defined quality of life experienced at the family level as family members; (a) having their needs met, (b) enjoying their life together as a family, and (c) having opportunities to pursue and achieve goals that are meaningful to them.

Family life quality is no different in its ingredients than individual life quality. However, it is different in its focus. Family life quality pertains to the family as a whole rather than to each individual within it (Baum, 2000).

Family life quality has been defined as – conditions where the family’s needs are met and family members enjoy their life together as a family and have a chance to do things which are important to them (Park et al., 2003).

Poston et al. (2003) concluded that an appropriate definition of family is as follows: A family includes the people who think of themselves as part of the family, whether related by blood or marriage or not, and who support and care for each other on a regular basis.

In summary, family life quality is the level of satisfaction in which all family members perceive as a whole in terms of health, education, leisure and recreation, neighborhood, school, workplace, support from each other, interaction with each other, happiness, and income.

2. Importance of Family Life Quality

Individual life quality and family life quality are based on similar principles. However, while the foundation for both concepts is similar the focus of individual life quality and family life quality is, as their names suggest, somewhat different.

Life quality refers to the quality of life of the individual (Schalock, 1996; 1997; 2005). Family life quality focuses on the quality of life of the family as a whole (Brown et al, 2003). Each person was, at some point in his or her life, a part of a family and thus had an effect on it and was also affected by it. This inter-relatedness occurred regardless of whether the person’s family life experience was a positive or a negative one. As such, it seems only logical to suggest that these two areas of life quality and family life



quality, while different in focus, are strongly related to, and affected by, each other (Brown and Brown, 2003). In such situations an enhanced insight to the inter-relatedness between individual life quality and family life quality would enable a better realization of the supports people need to nurture their individual and family life quality. As important as it is to explore and research the elements, concepts, and domains of life quality and family life quality it is even more important to implement them into everyday life (Baum, 2000; Brown and Brown, 2003).

More than one hundred years ago Frederick LePlay was studying the family life quality of European workers, using the intensive case study method, since his theory considered family as the critical social unit that reflected all the important characteristics of society (Zimmerman and Frampton, 1935). Family life was important in LePlay's theory of social change because the social practices and the production and consumption of resources in the family setting reflected the welfare of society, and correspondingly the welfare of society significantly influenced family well-being. LePlay postulated that how well a family is meeting the material and non-material needs of its members is a barometer of how well society is functioning (Rettig and Bubolz, 1983). If these ideas are converted to the language of contemporary life quality researchers, then we would say that family life quality is an important indicator of overall life quality, a premise that has been repeatedly validated (Andrews and Withey, 1976; Campbell, 1981; Jeffres and Dobos, 1995) across many countries and life circumstances (Bowling, 1995; Carlsson and Hamrin, 1996; Farquhar, 1995; Ferrans, 1996; Steyn, 1996).

Family life quality has grown out of work developed in a life quality approach or framework, which over the last 25 years has become established, the trend has become fairly well accepted within the field of intellectual and developmental disabilities (Brown, 1997; Schalock et al., 2002). However, the concept of family life quality has not been addressed in a systematic way. The voice of parents has been heard to some degree for a number of years (Turnbull and Turnbull, 1978; 1985) and some application of family life to the concept of life quality has been initially explored (Crutcher, 1990; Ficker Terrill, 1996; McPhail, 1996); however, only one study on family life quality has been reported (Renwick et al., 1997). At the end of the 1990s, two larger projects on family life quality were initiated, one based at the University of Kansas, and the other conducted by a team of researchers from Australia, Canada, and



Israel. Much of this development started in the 1980's (Brown et al., 1989) and began to flourish in the 1990's (Goode, 1994; Renwick et al, 1996). It has been noted that families that function well and have meaningful life quality are seen as a social resource.

In 2000, several international research teams met in the World Congress of the International Association for the Scientific Study of Intellectual Disability (IASSID) to share the results of their research endeavors for moving from an individual to a family as the unit of analysis to conceptualize, measure, and apply quality of life (Turnbull et al., 2004). Since 1998, researchers at the Beach Center on Disability have initiated a series of qualitative and quantitative studies trying to understand and measure the family quality of life construct through the lens of families who have children with disabilities. Aside from the Beach Center endeavor, Brown et al. (2003) from Canada partnered with other international researchers to develop a conceptual framework and a survey instrument for gathering qualitative and quantitative information from families of children with disabilities regarding family quality of life. In addition, the IASSID Special Interest Research Group (SIRG) on quality of life has contributed to the research development by embracing the topic of family quality of life in its annual discussions over the past several years. This group is made up of researchers from a number of countries including Australia, Canada, Holland, Japan, Mexico, the United Kingdom, and the United States. Although the SIRG was initially concerned with the topic of individual quality of life, their work on conceptualization, measurement, and application of quality of life have greatly influenced the development of family quality of life for children with intellectual disabilities. Many members of this group worked collaboratively with the researchers at the Beach Center on Disability, and their collaboration led to the first hand book on family quality of life published by the American Association on Intellectual and Developmental Disabilities (Turnbull et al., 2004).

Family quality of life, as a natural extension of quality-of-life research for individuals with intellectual and developmental disabilities, has emerged in the last decade as an important concept to influence policymaking, guide service delivery, and enhance outcomes of individuals with disabilities and their families (Brown and Brown, 2004; Turnbull et al, 2004). Most seem to contain similar major ideas: (a) a life of



quality is based on individual needs, choices, and control and is experienced when his or her needs are met and when he or she has the opportunity to pursue life enrichment in major life environments across the life span (Brown & Brown, 2003); and (b) quality of life, including both subjective and objective aspects, is a multidimensional construct consisting of personal and environmental factors (Schalock et al., 2002). The quality of life conceptual framework and its key principles have provided a solid foundation for the rapid growth of family quality of life research and have significantly impacted and shaped the emerging work on family quality of life.

Families like to form part of and connect with what their culture has accomplished and carried on its traditions. Families like to transcend everyday experience to dream and to connect with powers that are greater than themselves. Families tend to seek stability in economic, psychological, and social terms even though these attributes may be negated by family and community circumstances. Despite the fact that families share many characteristics, each family is to some degree unique in terms of its likes and dislikes and things that they consider important. When professionals attempt to understand the concept of family quality of life, they need to focus on both aspects of family quality of life: the aspect that most families share universally and the aspect that a family values uniquely. In particular, the latter aspect is more important as researchers and practitioners tend to respect the family's voice about what is important to the family.

It is accepted that objective elements such as financial well-being, health of family members, housing, support from other family members, and the existence of supports and services have a strong effect on the life quality of the individual and the family as a whole. Subjective elements, such as emotional well-being, interpersonal relations, self-determination, and decision-making opportunities are those that have the most significant effect on individual life quality. Strong families also have a commitment to each other and to the family as a unit. They are proud to belong to the family. They think of each other as friends with whom they can talk and have fun. They enjoy each other as individuals and like being together. Showing appreciation for other family members is also a key to having a strong, healthy family. Doing positive things for one another or expressing love and appreciation daily lets others know they are cared about and valued. As Brown and Brown (2003) stated, the family is the



meeting place of life quality and family life quality. As such, these subjective elements have an effect not only on the individual but also on the family as a whole. It seems clear that because the life quality of the individual and the family are inter-related, a need exists to invest energy in improving both. Enhancing individual life quality will bring a better family life quality and vice versa.

3. Domains of Family Life Quality

The family life quality domain has been measured in survey research with global indicators, including a few items asking about satisfaction with the primary relationships of partner and children (Andrews and Withey, 1976; Ball and Robbins, 1986; Schumm et al., 1986; Voydanoff, 1988). Questionnaires that have examined the content of family life quality more extensively have also included various aspects of the family environment, such as neighborhood, friends, and employment, as well as the internal family concerns of financial well-being (Olson and Barnes, 1987). Researchers that have developed more extensive explorations of the content of family life have produced scales that have differing definitions of family quality (strong, healthy, and effectively functioning) using various conceptual frameworks, but few have been guided by a general theory (Becker, 1997; Epstein et al., 1987; Lowman, 1987; Moos and Moos, 1987). What is needed in subjective indicators research today is a general theory that guides the development of measurement. Such a theory would improve the content validity of the measures by specifying the universe of the content to be examined (Carmines and Zeller, 1979). There are many domains in the concept of life quality, including emotional well-being, material well-being, physical well-being, social well-being, and productive well-being (Felce and Perry, 1995; Wallander et al., 2001). With particular reference to social well-being such as personal relationship and community involvement, life quality within the family (family life quality) is an important domain to be considered. For example, Putnam (1995) argued that the family was the most fundamental form of social capital. Unfortunately, as pointed out by Shek et al. (2005) in a review of studies on life quality, family life quality is a neglected topic in the study of life quality.

According to Siu and Shek (2005), there are at least two levels upon which family life quality can be conceived – systemic family functioning (e.g., family climate and overall communication among the family members) and dyadic relationships within



the family. As far as dyadic relationships within the family are concerned, there are two basic aspects that deserve our attention. The first aspect is quality of parenting. With reference to some of the existing models of parenting (Maccoby and Martin, 1983), parenting quality has been defined in terms of responsiveness and demandingness. Besides, parenting quality can be conceived in terms of parental behavioral control. Shek (2005) argued that at least five different aspects of parental behavioral control (i.e., parental attempt to control and manage the child's behavior) should be examined: (1) parental knowledge (i.e., how much the parent knows about the situation of the child); (2) parental expectations (i.e., parental rules and expectations of the parent); (3) parental monitoring (i.e., parental surveillance and tracking and whether the parent takes initiative to understand the child); (4) parental discipline (reward and punishment of the child in relation to parental expectations); and (5) parental demandingness as proposed in some of the existing models of global parenting (Maccoby and Martin, 1983). Finally, parental psychological control should also be used as an indicator of parenting quality (Shek, 2005). Psychological control refers to 'parents' attempt to control the child's activities in ways that negatively affect the child's psychological world and thereby undermines the child's psychological development. The second aspect of the dyadic relationship within the domain of family life quality is parent-child relational quality. While quality of the parent-child relationship has commonly been defined in terms of satisfaction with the parent-child relationship or parent-adolescent conflict (Siu and Shek, 2005), there are four other aspects of the parent-child relationship that deserve our attention. These include 1) parental trust of the child, 2) the child's trust of parents, 3) child's readiness to communicate with the parents, and 4) child's satisfaction with parental control.

Poston et al. (2003: 221 – 323) constructed domains of family life quality by suggesting a domain structure with two parts: a) domains with an individual orientation and b) domains with a family orientation. Domains with an individual orientation represent the idiosyncratic ways that the quality of life of individual family members has an impact on the quality of life of other family members and on the family as a whole. The six individual-oriented domains are advocacy, emotional well-being, health, environment well-being, productivity, and social well-being. And the other four family-



oriented domains are daily family life, family interaction, financial well-being, and parenting. Each domain has details as follows:

3.1 Domains of Family Life Quality with Individual Orientation

3.1.1 Advocacy

Advocacy is the activities that family members undertake to learn and act on behalf of themselves and each other. Three subdomains of advocacy are advocacy role, advocacy activities, and facilitators of advocacy. Family members advocate when and where they want. Family members advocate to improve services and outcomes for themselves and/or other family members. Family members have support from others to advocate successfully. Advocacy is the domain where the greatest discrepancy existed between the comments of parents of children with and without disabilities. Families of children without disabilities spoke in very general terms about seeking to advance opportunities for their children, but their comments in no way mirrored the intensity and frequency of the comments of parents of children with disabilities, many of whom described their advocacy efforts (especially with the education and health systems) with anger, frustration, and fatigue. They often used metaphors related to battle to describe advocacy – fighting, ammunition, guns, and combat. It's a fight; it is a daily battle to get anything you need for exceptional children. You fight the teacher, you fight the principal, and you fight the superintendent. It's very frustrating to do all those battles.

3.1.2 Emotional Well-Being

Emotional well-being is the feeling aspects of life. The four subdomains of emotional well-being are as follows: 1) identity: family members feel a sense of pride in their own and each other's accomplishments, 2) respect: family members are treated with respect by people outside the family, 3) reducing stress: family members are able to take time for themselves, and 4) choice: family members have opportunities to make choices.

3.1.3 Health

Health is both physical and mental well-being. The three subdomains of health are as follows: 1) physical health: family members have the best possible physical health, 2) mental health: family members have the best possible mental health, and 3) health care: family members can get medical care on a regular basis. Healthiness



is a key determinant of family life quality. There are several benefits of a healthy life. Families become free from various diseases and get a longer life. Families can live a life without suffering from any aches, pain, or discomfort. In every sphere of family life, family members will be able to perform to the best of their abilities. The health of individual family members is important to consider when describing family life quality. Sometimes one or two members of a family have health problems, and these problems may impact—often quite considerably—how that family functions (Renwick et al., 1997). Family members want to be healthy and have energy to be active inside and outside the family.

3.1.4 Environment Well-Being

Environmental well-being is the condition of the physical contexts within which family members live. Four subdomains of environmental well-being are: 1) home environment: family's home has enough space, 2) school environment: children are safe at school, 3) work environment: family members are safe at work, and (4) neighborhood and community environment: family lives in a community that has services to meet the family's needs. A safe and comfortable house is a basic condition for any family life (McLoyd and Wilson, 1991). Sherman (1994) pointed out that overcrowding, utility shut-offs, inadequate heating, and other housing quality problems may disrupt children's ability to rest or do homework and may also contribute to stress and depression in adults. Duncan et al. (1994) investigated how neighborhood conditions affect the behaviors of a group of parents and their 5-year-old children. They found that living in low-income neighborhoods had a significant correlation with higher levels of externalizing problem behaviors in young children, such as temper tantrums or destruction of objects. In another study, Duncan (1994) found that adolescents who grew up in poor neighborhoods completed less years of school and had higher school dropout rates than those who grew up in affluent neighborhoods. With regard to disability and neighborhoods, living in a supportive community is associated with better coping capability of the family (Yau and Li Tsang, 1999). Clearly, neighborhood quality of life is closely connected to family quality of life. The environment in which people live and the resources they command affect life quality directly by offering things beneficial or harmful to human existence. Such objective conditions of life also affect its quality indirectly through the mediation of values. Not only do values



influence which needs and aspirations people have but different values also cause people to evaluate the same resources in different manners (Campbell, 1981).

3.1.5 Productivity

The area of family quality of life associated with participating in and contributing to useful and enjoyable daily activity is referred to as productivity. Productivity is characterized by skills and opportunities to participate and succeed in education, work, leisure and personal development. Children are access to an appropriate education. Family members balance work and family life. Family members can participate in the hobbies they enjoy. Family members support each other's growth and development. Leisure and recreation have an important impact on quality of life as they provide the opportunity to gain respite from every day stresses. Finding a balance between outside activities and family time is important so the family's schedule should be reviewed often to ensure there is time for family members to talk, play and have fun together. The health benefits that can be gained through leisure and recreation can be both physical and mental. Early cognitive development and young children's IQs are associated with the family's ability to provide intellectually stimulating experiences (Bradley et al., 1994).

3.1.6 Social Well-Being

Social well-being is referred to skills and opportunities to have relationships with people outside the family. Three subdomains of social well-being are: 1) social acceptance: family members are accepted by people they meet, 2) social relationships: family members have friends, and 3) social support: family members get practical help from people outside the family. Although families of children with and those without disabilities described issues related to social well-being, the degree to which social acceptance was an issue and the intensity of associated feelings was much greater for families of children with disabilities, many of whom reported grave concerns about their child's acceptance, with most comments describing negative experiences. Many reported that they had a very high priority with regard to their child with a disability developing friendships. They also described the impact that the family member's disability had on their own friendships, typically relating to the discomfort their friends experienced regarding their child with a disability.



3.2 Domains of Family Life Quality with Family Orientation

3.2.1 Daily Family Life

Daily family life is referred to the recurring activities that sustain families logistically – the daily routines of life. Three subdomains of daily family life are: 1) family care: family provides care to family members, 2) daily activities: family members do chores within the home (cleaning, cooking, and yard work), and 3) getting help: family plans for help from others (finding, asking, and supervising). Family members like to initiate and accomplish things, both individually and collectively as a whole family. Families like to do things together, for example, to explore and create, to play and laugh, to experience the environment they live. Family like their members to be closely connected each other, love, feel compassion, and care for each other.

3.2.2 Family Interaction

Family interaction is the relationship that family members have with each other and the emotional climate within which the relationships exist. Family interaction is characterized by four subdomains such as positive interaction environment, communication, supporting each other, and flexibility. Positive interaction environment is indicated by family members feel loved and accepted by each other. Communication means family members talk openly with each other. Supporting each other is that family members help each other. Finally, flexibility means that family can fairly quickly make plans to do things without a lot of complicated planning. Responsive interactions between parents and children provide children with a sense of security and trust. Strong family relationships also lead to a better life quality for each family member. Having positive relationships enhances the family's overall health, safety, and support; and provides a good environment in which the family can grow. By spending pleasant, positive time together, families build up a reserve of good feelings which will help them through times of crisis. Strong families communicate well with one another. They are open and honest and are willing to listen to each other's point of view. They work together to solve problems and wait to cool down if tempers flare.



3.2.3 Financial Well-Being

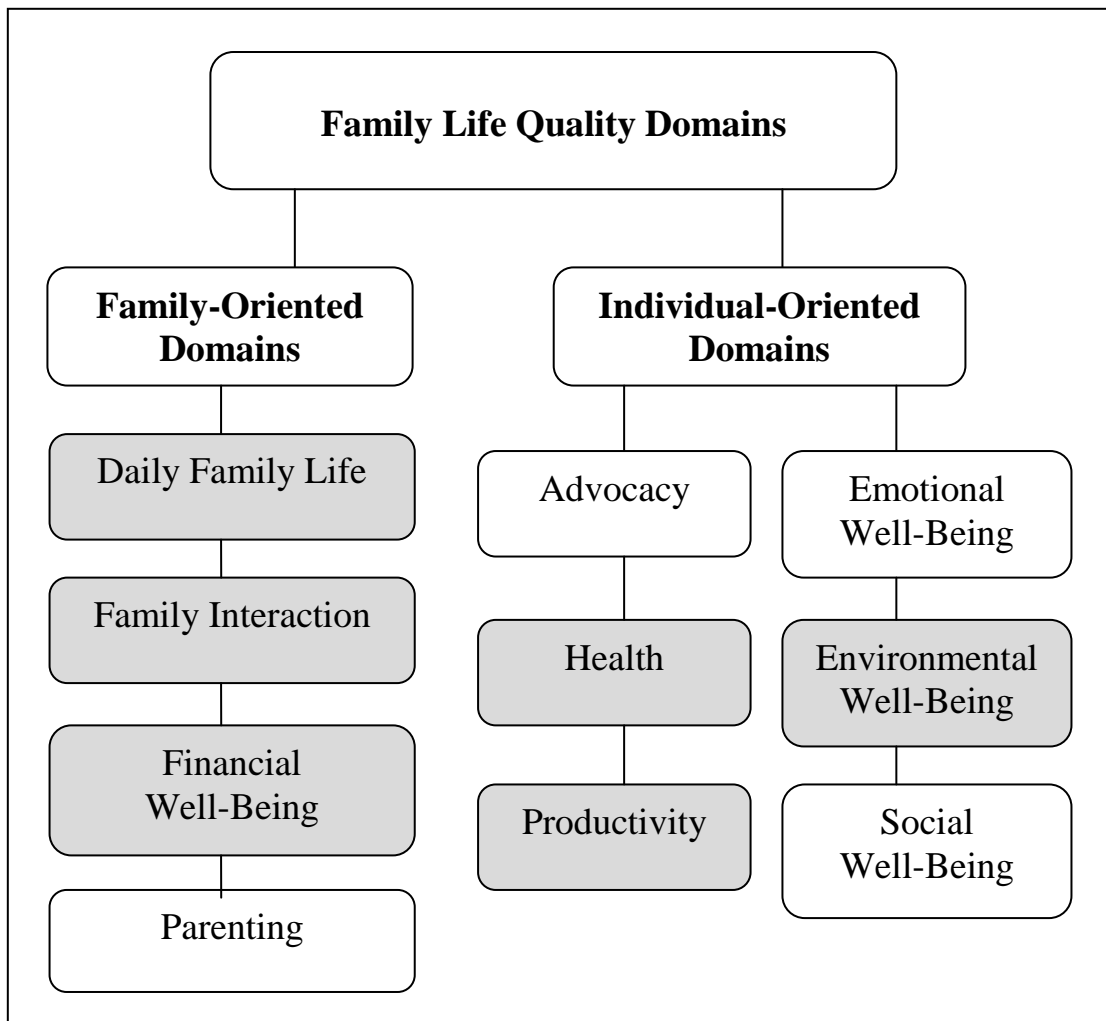
Financial well-being means families having income that at least meets or preferably exceeds their expenses. Financial well-being is characterized by subdomains such as paying for basic necessities, paying for health care, paying for other needs, sources of income, and financial security. Family can pay for basic necessities (housing, food, and clothing), health care and child care. Source of income means family has salary and benefits from employment and financial security means family is financially secure. Financial well-being is one of the most single most important factors influencing life quality in general. It is a key indicator of well-being and health for individuals and household. Income level indicates the ability of people to purchase essential and non-essential goods including food, housing, health services, and transport. It is clear that policies targeted at raising family incomes also contribute to increasing children's cognitive development and academic accomplishments (McLoyd, 1998).

3.2.4 Parenting

Parenting is referred to the providing guidance, structure, and teaching to children and youth. Parenting is characterized by three subdomains such as: 1) providing parental guidance: family helps children learn right from wrong, 2) discipline: family sets boundaries and rules for children, and 3) Teaching: family helps children with school work.

In summary, only six indicators of family life quality, three indicators from individual-oriented domains such as health, environmental well-being, and productivity and other three indicators from family-oriented domains such as daily family life, family interaction, and financial well-being, are used in this research because these six indicators are suitable for generating family life quality of rubber farmers to adapt themselves consistently with the future economic change.





Source: Poston et al. (2003: 323)

Figure 2 Conceptual Framework of Family Life Quality

Relevant Literature Reviews

1. Domestic Relevant Literature Reviews

Ieamvijarn (2009: Abstract) investigated the application of the philosophy of sufficiency economy in retail business in the provinces cluster number 12 of Thailand. The research found that most of the retailers had knowledge and understood the philosophy of sufficiency economy at a moderate level. They agreed at a high level with the application of this philosophy as a whole and each aspect. The aspects were corporate analysis, marketing, finance, personnel, moral and social responsibility.



The retailers who were different gender opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were different ages opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were different educational opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were utilizing different business models opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were of different types of business opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were of different investment schemes opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were of different durations of business operations agreed that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were different gender opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference.

Leungingkasut (2008: Abstract) investigated the relationship between the understanding of sufficiency economy philosophy bestowed by His Majesty the King and the household accounting of people in the area of Nhong Pai sub-district, Muang district, Udon Thani province. The research found that: 1) The cognitive knowledge of the sufficiency economy philosophy of people was at a high level. Considering of the cognitive knowledge level for each part, it was found that the parts of the environment



conservation and the sustainable use of the natural resource, the increasing income, the reducing expense, the learning, the saving and helping each other were at a high level. 2) The study of accounting of the people found that the samples did the accounts sometimes. When considering the questionnaire on each item, doing accounting of every income and expense announcing the monthly income and expense to the members of the households; training or receiving suggestions on doing households accounts doing accounting of households doing the accounts on your own, doing accounts by other members instead of you, participating in doing the accounts by other members, and following and supporting the work by, it was found that all items were answered at the moderate levels. 3) Concerning the opinions of the people doing accounts, it was found that people agreed with doing the accounts but they were not sure with the aspects of there were many problems on doing the accounts and we can save money without doing the accounts. 4) This study found significant relationship between the cognitive knowledge of the sufficiency economy philosophy bestowed by His Majesty the King and the people doing households accounts. In general, it was found that the relationship coefficient was at 0.16 with the significant level of .01. Specifically, the cognitive knowledge of reducing expense and helping each other had significant relationship with doing the accounts at the level of 0.5, while the part of gaining income had significant relationship with doing the accounts at the level of .01.

Poolsawat (2008: Abstract) investigated the application of the sufficiency economy philosophy with business management of small and medium Enterprises (SMEs) in Pathumthani Province. The research found that, application of the sufficiency economy philosophy with business management of small and medium enterprises (SMEs) in Pathumthani province was at a high level in the following respective aspects i.e., moderation, reasonableness, the need for good immunity and moral principles. However, the application of the sufficiency economy philosophy in the aspect of knowledge was at a moderate level. Having studied business operation results of small and medium enterprises (SMEs) in Pathumthani province, it was following respective aspect i.e, environmental capital and physical capital. However, business operation results in aspects of human capital and social capital was at a moderate level. Having compared between organization characters and business operation results of SMEs, it was found business operation results at the entrepreneurs with different knowledge of



the sufficiency economy philosophy were also significantly different at .05 level. In addition, the application of the sufficiency economy philosophy with business management significantly related to SMEs business operation results at .05 level.

Kittivongprateep (2007: Abstract) investigated the perception of sufficiency economy, quality of employees' work life and work happiness: a case study of employees in the provincial Electricity Authority. The research found that the employees had the moderate level of perception of sufficiency economy, moderate level of quality of work life and moderate level of work happiness. Quality of work life and work happiness had a meaningful correlation at significant level of .01. The employees who had different genders, ages, and salaries did not have different quality of work life. The employees who had different genders had different levels of work happiness at significant level of .01. The employees who had different ages and salaries did not have different level of work happiness. The employees who had different perception of sufficiency economy had different levels of quality of work life at significant level of .05 and the employees who had different perception of sufficiency economy had different levels of work happiness at significant level of .01.

Klinchan (2006: Abstract) investigated the relation between agriculturists' information perception and implementation on sufficiency economy philosophy in Nakhon Ratchasima province. The research found that most of the agriculturists' age was 40 years and over; education level was elementary; average income earned from 20,000 baht/person/year and over; land property of their own was lowly 16 Rai. They perceived the information of sufficiency economy philosophy by television as the main source of information. The agriculturists' information perception on sufficiency economy philosophy was totally at high level whereas their implementation was at the medium level. When compare by age, education level, income, and household size with the information perception and implementation on sufficiency economy philosophy, it was totally shown no significance difference. For the relation between information perception and implementation, it was found that there was direct relation; when considered for each aspect, the most relative aspect were social and technology respectively whereas the least was mind.



2. Foreign Relevant Literature Reviews

Ondigi and Mugenda (2011: Abstract) investigated the psychosocial determinants of quality of life among Kenyan families. This research was to establish to investigate whether psychosocial related factors such as emotional status, marital status, spiritual status, number of children, health status, educational level, and income level contribute to the satisfaction of quality of life among Kenyans. The information was gathered from all the eight Kenyan provinces including urban and rural households. A total of 5179 people were interviewed using a survey questionnaire and also use of focus group discussions. The research found that the majority of the respondents who were married, had more children, had more income, had high education level, were in good health status, who were more spiritual, indicated more satisfaction with their quality of life. Therefore, this study concluded that psychosocial factors attribute greatly to the satisfaction of quality of life among Kenyans of all walks of life. In essence, the majority of Kenyan people will be happier if their health status improves to what they called good, have a circle of family or friends, stay married for a longer period of time, increase their income level, stabilize their emotional level by reducing stress related impediments, elevate their educational level, have more spiritual people, and have a precise number of children for prestige and pride.

Yadav (2010: Abstract) conducted a case study of the perceived social support, hope, and quality of life of family living with Human Immunodeficiency Virus Infection/Acquired Immunodeficiency Syndrome (HIV/AIDS) in Nepal. This research has investigated the relationship among perceived satisfaction from social support, hope, and quality of life of family living with HIV/AIDS. A cross-sectional in design was applied, among a sample of 160 HIV-infected persons receiving treatment, care, and support from eight community-based Non-Governmental Organizations (NGOs). Quality of life was assessed using the World Health Organization's Quality of Life (WHO-QOL)-26 tools, and social support was assessed by use of a modified Sarason's Social Support Questionnaire. A Hope Assessment Scale was also developed. The non-family support network was greater than family support network. Overall satisfaction from social support and hope was significantly correlated with quality of life; the greatest effect of social support was on environmental functioning, and the lowest was on social relationships, emotional support was less a predictor of social



relationship than other types of supports. The effect of perceived satisfaction from social support was through the mediation variable hope. Asit has widely been recognized that community-based support is vital for issues of quality of life, strategies to improve social support and hope intervention programs are strongly encouraged. The results of the study have implications for providing care, treatment, and psychosocial support to maintain or enhance quality of life of family living with HIV/AIDS.

Gill and Renwick (2007: Abstract) investigated the relationship between family quality of life and service delivery for family with adults who have developmental disabilities. Utilizing interview data previously collected in one geographical region as part of a larger project, this secondary analysis explores service delivery as an important aspect of quality of life for families with adults who have developmental disabilities and are living at home. Employing a modified grounded theory approach, a finer-grained analysis of data from 10 interviews with family members revealed the following themes: 1) obstacles that families encounter when accessing services, 2) concerns about the future, 3) accepting additional responsibility, and 4) unmet service needs. All of the participants stated that they encountered obstacles of some sort when trying to access community services for their children. Reported obstacles encountered included: lack of coordination of services, lack of information, long waiting lists, and lack of services available to access. All of these obstacles detracted from overall quality of life experienced by their families. All but two families had their son or daughter living in the family home. The parents' major concerns were optimal future care and future residential placements for their child. Most participants clearly emphasized that their families could not take an increased responsibility for their children, either at present or in the future. Most families stated in very strong terms that they could not take on, or accept, any more responsibility. All but one of the participants indicated that their families' current service needs were not being met. The result was often detrimental and detracted from the quality of life experienced by the family, including the adult member with disabilities. The findings of this study provide a clearer, broader, and more detailed picture of how having an adult child with a developmental disability affects quality of life experienced by the family. In addition, this research makes a strong link between service provision and family quality of life. It is clearly evident that the participating families' quality of life has been significantly



impacted by several aspects of service delivery. Further, they highlight the need to address the manner in which services are delivered in order to contribute to an improved quality of life for the families who require and utilize these services at two levels, public policy and service delivery.

Shek and Lee (2006: Abstract) investigated the family life quality and emotional quality of life in Chinese adolescents with and without economic disadvantage. Chinese secondary school students (N=2758) responded to measures of perceived family life quality (parenting quality and parent-child relational quality) and emotional quality of life (hopelessness, mastery, life satisfaction and self-esteem). Parenting quality included different aspects of parental behavioral control (parental knowledge, expectation, monitoring, discipline and demandingness as well as parental control defined in terms of indigenous Chinese concepts), parental psychological control, and parental responsiveness where as parent-child relational quality included satisfaction with parental control, child's readiness to communicate with the parents, parental trust of the child, and child's trust of the parent. Results showed that parenting quality and parent-child relational quality in poor families were generally poorer than those of non-poor families and the differences were more pronounced in paternal parenting quality and father-child relational quality than in maternal parenting quality and mother-child relational quality. Emotional quality of life of adolescents experiencing economic disadvantage was also found to be poorer than that of adolescents not experiencing economic disadvantage. However, no significant differences between the two groups were found for parental psychological control and parental control defined in terms of indigenous Chinese measures. In short, the present findings showed that in terms of family life quality defined in terms of perceived parenting quality and parent-child relational quality, the Poor Group and Non-Poor Group generally differed on both paternal variables and maternal variables (except psychological control, parental control defined in terms of indigenous Chinese concepts, and satisfaction with parental control) and the differences were consistently greater in the paternal variables than in the maternal variables.

Brown et al. (2003: 226) investigated the quality of life of families that have children with disability by using an original family quality of life framework. The parents of 34 children and adults with intellectual disabilities were interviewed



using the Family Quality of Life Survey, a measurement and assessment tool developed by a team of international researchers. Quantitative and qualitative data were collected for four concepts—opportunities available, initiative to access opportunities, attainment, and satisfaction—for each of the nine key areas of family quality of life such as: health, financial well-being, family relationships, support from others, support from services, Spiritual/cultural beliefs, Careers/preparing for careers, Leisure, and Community/civic involvement. The results of the study were described in the subsequent sentences. 1) No significant correlations were found for opportunities or initiative in the health aspect. However, level of attainment of overall family health was positively related to the level of satisfaction with this attainment. 2) For the financial well-being aspect, the only positive correlation was found between measures of attainment of financial well-being and satisfaction. 3) A strong positive correlation between measures of attainment and satisfaction in the family relationships aspect suggests that engaging in activities designed to foster good family relationships and satisfaction with the resulting relationships go hand in hand. 4) Attainment and satisfaction were also positively correlated in the aspect of support from others indicating that family satisfaction with the support received from others was higher if families were getting the support that they wanted. 5) The fact that satisfaction did not correlate with any of the other three measures, nor did they correlate with each other, suggests a complexity in understanding the role of support services in the lives of these families. Lack of support, not knowing where to find services, and the short-term nature of services, though, were consistent complaints among all the families, and these may be factors that help to explain such complexity. 6) A positive relationship between satisfaction and attainment and between satisfaction and initiative in the spiritual and cultural beliefs aspect suggests that the high levels of satisfaction are also related to high levels of attainment and seeking that attainment. 7) An expected positive correlation was found between the level of attainment of education and careers and the level of satisfaction indicating that families who have attained a higher level of their own career and educational expectations are more satisfied than those whose attainment in this area is low. 8) There was also a positive correlation between the level of enjoyment and leisure attained by the families and their satisfaction with this attainment, further indicating that when they carried out the activities they enjoyed doing so. 9) Only four families were dissatisfied



with their family's level of contribution to community and civic affairs. Thirteen families were "neither satisfied nor dissatisfied," 14 were "satisfied," and one family was "verysatisfied." In general, careers, spiritual and cultural beliefs, and family relationships were rated highly, while support from others and support from disability related services were rated quite low.



CHAPTER III

RESEARCH METHOD

In the research of “Relationships between Implementing Sufficiency Economy Philosophy and Family Life Quality of Rubber Farmers in Buriram Province”, the researcher used research methods as follows.

1. Population and Sample
2. Data Collection Instrument
3. Instrument Design and Development
4. Data Collection Procedure
5. Data Preparation and Analysis
6. Statistics Used for Data Analysis

Population and Sample

In this research, the researcher selected the population and sample as follows:

1. Population: 1,646 household heads of rubber farmers in Buriram province (Buriram Agriculture Office, 2012)

2. Sample: 350 household heads of rubber farmers in Buriram province (Krejcie and Morgan, 1970: 608) by convenience sampling as follows:

2.1 Selected the household heads of rubber farmers who live in the most planted areas of rubber trees in various districts of Buriram province such as Ban Kruot, LahanSai, Non Suwan, King A. Kaen Dung, and Khu Muang

2.2 Delivered the questionnaires to the household heads of rubber farmers via the village chief of each village throughout various districts by convenience sampling until getting enough sample size



Table 4 Number of Rubber Farmers in Harvested Areas in Buriram Province

No.	Name of District	Number of Rubber Farmers in Harvest Areas
1	Muang	1
2	Ban Kruot	866
3	Kra Sang	-
4	LahanSai	133
5	Lamplai Mat	20
6	Nang Rorng	1
7	Phuthai Sung	1
8	Sa Tek	120
9	Brakon Chai	11
10	KhuMuang	130
11	NongKee	24
12	Pa Kham	1
13	Nong Hong	12
14	Na Pho	-
15	Phlaphla Chai	-
16	Huy Rat	-
17	Non Suwan	114
18	Cham Nee	-
19	BanmaiChaiphut	-
20	Non Dindaeng	65
21	ChlermPhrakiet	-
22	King A. Bandan	-
23	King A. Khaen Dung	147
Total		1,646

(Buriram Agriculture Office, 2012)



Data Collection Instrument

In this research, the researcher used questionnaire as the instrument for data collection and the questionnaire was divided into 3 sections as follows:

Section 1: General information of household heads of rubber farmers in Buriram province consists of eight questions. The questions in this section used the checklist and covered information such as gender, age, status, education level, experience of rubber growing, number of family member, size of rubber plantation, and monthly average income.

Section 2: Opinions on implementing sufficiency economy philosophy consist of three variables which are moderation, reasonableness, and self-immunity and five questions for each variable. The questions in this section used the rating scale.

Section 3: Opinions on family life quality consist of six variables which are health, environmental well-being, productivity, daily family life, family interaction, and financial well-being and five questions for each variable. The questions in this section used the rating scale.

Instrument Design and Development

In this research, the researcher designed and developed the instrument through the following steps:

1. Reviewed the literatures concerning with the implementing of sufficiency economy philosophy and family life quality of rubber farmers in Buriram province as the guidelines for questionnaire design,
2. Drafted the questionnaire which its content is concerned with the research conceptual framework, purposes, and hypotheses,
3. Proposed the draft to the advisor for further comments on appropriateness, accuracy, and content coverage of the research,
4. Corrected the questionnaire by following the adviser's comments and proposed it to the research experts for further comments on appropriateness, accuracy and content coverage of the research,



4.1 Assoc. Prof. Dr. Phaprukbaramee Ussahawanitchakit, Dean of Mahasarakham Business School, Mahasarakham University

4.2 Asst. Prof. Dr. Karun Pratum, Associate Dean for Postgraduate Studies and Research, Mahasarakham Business School, Mahasarakham University

5. Corrected the questionnaire by following the research experts' comments and proposed it back to the advisor,

6. Checked the instrument quality by bringing the questionnaire which was approved by the research experts to try out with 30 household heads of rubber farmers in Buriram province who are not the sample of the research,

7. Proposed the results from quality checking of the questionnaire to the advisor again for further comments and prepared the complete questionnaire for data collection

Data Collection Procedure

In this research, the researcher collected data through the following steps:

1. Prepared the number of complete questionnaires according to sample size of the research,

2. Requested Masaharakham Business School of Mahasarakham University a cover letter. which was attached with the questionnaire in order to ask permission from the sample to complete the questionnaire confidentially,

3. Made a field trip to the sample location and delivered questionnaires to household heads of rubber farmers via the village chief of each village in various districts in Buriram province which start from September 15 – October 30, 2013,

4. Collected the questionnaires and checked the completeness of questionnaires which received from the sample of the research, and

5. Prepared data for analyzing in computerized system



Data Preparation and Analysis

Data analysis was done through computerized system and was divided into 4 sections as follows:

1. Data analysis on general information of household heads of rubber farmers in Buriram province was done by descriptive statistics method in order to find statistics values such as frequency and percentage.

2. Data analysis on implementing of sufficiency economy philosophy and family life quality of rubber farmers in Buriram province was done by descriptive statistics method in order to find statistics values such as mean and standard deviation. Data presentation was made through tabular format along with explanation and summary.

The questionnaire answers of the research are determined by following points: (Srisaart, 2002: 43)

Strongly Agree	5 points
Mostly Agree	4 points
Somewhat Agree	3 points
Slightly Disagree	2 points
Strongly Disagree	1 point

With five-level likert scales, it means that the scores falling between the following ranges could be considered generally the level of agreement or disagreement as:

Mean: 4.51 – 5.00	Strongly Agree
Mean: 3.51 – 4.50	Mostly Agree
Mean: 2.51 – 3.50	Somewhat Agree
Mean: 1.51 – 2.50	Slightly Disagree
Mean: 1.00 – 1.50	Strongly Disagree

3. Comparison between implementing sufficiency economy philosophy and family life quality of rubber farmers in Buriram province was classified by experience of rubber growing, number of family member, size of rubber plantation, and monthly average income. Investigation on mean differences of sample which consists of two



variables was done by t-test and of more than 2 variables was done by One Way Analysis of Variance (ANOVA) and Multivariate Analysis of Variance (MANOVA).

4. Investigation on the effects of implementing sufficiency economy philosophy on family life quality of rubber farmers in Buriram province was done by Multiple Correlation Analysis, Simple Regression Analysis, and Multiple Regression Analysis.

Statistics Used for Data Analysis

1. Basic statistics

1.1 Percentage

1.2 Mean

1.3 Standard Deviation

2. Statistics used for instrument quality checking

2.1 Calculating the discriminant power value by item-total correlation technique

2.2 Calculating the instrument reliability value by alpha-coefficient method of Cronbach

2.3 Multicollinearity test by variance inflation factors (VIFs)

3. Statistics for investigation

3.1 t-test

3.2 F-test (ANOVA and MANOVA)

3.3 Multiple Correlation Analysis

3.4 Simple Regression Analysis

3.5 Multiple Regression Analysis



CHAPTER IV

RESULTS OF DATA ANALYSIS

In the research of “Relationships between Implementing Sufficiency Economy Philosophy and Family Life Quality of Rubber Farmers in Buriram Province”, the researcher has presented the results of data analysis as follows:

1. Statistical symbols used for result presentation of data analysis
2. Procedures for result presentation of data analysis
3. Results of data analysis

Statistical Symbols Used for Result Presentation of Data Analysis

\bar{X}	:	Mean
S.D.	:	Standard Deviation
F	:	F-distribution
SS	:	Sum of Squares
MS	:	Mean of Squares
df	:	Degrees of Freedom
p-value	:	Significant Value
VIF	:	Variance Inflation Factors
R	:	Coefficient of Multiple Determinations
AdjR ²	:	Coefficient of Adjusted Forecasting
a	:	Constant
SEP	:	Average score for opinions of Implementing Sufficiency Economy Philosophy for overall
SEM	:	Average score for opinions of Implementing Sufficiency Economy Philosophy for Moderation
SER	:	Average score for opinions of Implementing Sufficiency Economy Philosophy for Reasonableness
SES	:	Average score for opinions of Implementing Sufficiency Economy Philosophy for Self-Immunity



FLQ	:	Average score for opinions of Family Life Quality for overall
FLH	:	Average score for opinions of Family Life Quality for Health
FLE	:	Average score for opinions of Family Life Quality for Environmental Well-Being
FLP	:	Average score for opinions of Family Life Quality for Productivity
FLD	:	Average score for opinions of Family Life Quality for Daily Family Life
FLI	:	Average score for opinions of Family Life Quality for Family Interaction
FLF	:	Average score for opinions of Family Life Quality for Financial Well-Being

Procedures for Result Presentation of Data Analysis

The researcher presented the results of data analysis as follows:

Section 1: General information of rubber farmers in Buriram province,

Section 2: Opinions on Implementing Sufficiency Economy Philosophy of rubber farmers in Buriram province,

Section 3: Opinions on Family Life Quality of rubber farmers in Buriram province,

Section 4: Comparison of opinions on Implementing Sufficiency Economy of rubber farmers in Buriram province who have the different Experience of Rubber Growing, Numbers of Family Member, Size of Rubber Plantation, and Monthly Average Income,

Section 5: Comparison of opinions on Family Life Quality of rubber farmers in Buriram province who have the different Experience of Rubber Growing, Number of Family Member, Size of Rubber Plantation, and Monthly Average Income, and

Section 6: Correlation analysis, multiple regression analysis, and predicting equation building of Implementing Sufficiency Economy Philosophy and Family Life Quality of rubber farmers in Buriram province.



Results of Data Analysis

Section 1: General information of rubber farmers in Buriram province consists of Gender, Age, Status, Education Level, Experience of Rubber Growing, Numbers of Family Member, Size of Rubber Plantation, and Monthly Average Income as presented in the Table 5.

Table 5 General Information of Rubber Farmers in Buriram Province

General Information of Rubber Farmers in Buriram Province	Frequency	Percentage
1. Gender		
1.1 Male	171	83.05
1.2 Female	35	16.95
Total	206	100.00
2. Age		
2.1 Less than 30 years old	32	15.54
2.2 30 – 40 years old	52	25.27
2.3 41 – 50 years old	60	29.13
2.4 More than 50 years old	62	30.06
Total	206	100.00
3. Status		
3.1 Single	23	11.09
3.2 Married	153	74.33
3.3 Separated	10	4.91
3.4 Divorced	20	9.67
Total	206	100.00



Table 5 (Continued)

General Information of Rubber Farmers in Buriram Province	Frequency	Percentage
4. Education Level		
4.1 Lower than high school	105	51.05
4.2 High School	96	46.62
4.3 Bachelor's Degree	5	2.33
Total	206	100.00
5. Experience of Rubber Growing		
5.1 Less than 5 years	41	19.88
5.2 5 – 10 years	68	33.02
5.3 11 – 15 years	62	30.04
5.4 More than 15 years	35	17.06
Total	206	100.00
6. Numbers of Family Member		
6.1 Less than 4 people	64	31.15
6.2 4 – 5 people	87	42.15
6.3 6 – 7 people	37	18.07
6.4 More than 7 people	18	8.63
Total	206	100.00
7. Size of Rubber Plantation		
7.1 Less than 10 Rai	26	12.64
7.2 10 – 30 Rai	57	27.66
7.3 31 – 50 Rai	62	30.17
7.4 More than 50 Rai	61	29.53
Total	206	100.00
8. Monthly Average Income		
8.1 Lower than 10,000 Baht	25	12.18
8.2 10,000 – 20,000 Baht	51	24.82
8.3 20,001 – 30,000 Baht	57	27.75
8.4 More than 30,000 Baht	73	35.25
Total	206	100.00



According to the Table 5, most of rubber farmers in Buriram province are Male (83.05%), More than 50 years old (30.06%) and 40 – 50 years old (29.13%), Married (74.33%) and Single (11.09%), Education Level Lower than high school (51.05%) and High school (46.62%), Experience of Rubber Growing 5 – 10 years (33.02%) and 11 – 15 years (30.04%), Numbers of Family Member 4 – 5 people (42.15%) and Less than 4 people (31.15%), Size of Rubber Plantation 31 – 50 Rai (30.17%) and More than 50 Rai (29.53%), and Monthly Average Income More than 30,000 Baht (35.25%) and 20,001 – 30,000 Baht (27.75%).

Section 2: Opinions on Implementing Sufficiency Economy Philosophy of rubber farmers in Buriram province as presented in the Table 6.

Table 6 Opinions on Implementing Sufficiency Economy Philosophy for Overall and for Each Variable of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy	\bar{X}	S.D.	Level of Agreement
1. Moderation	4.38	0.56	Mostly
2. Reasonableness	4.35	0.53	Mostly
3. Self-Immunity	4.40	0.52	Mostly
Overall	4.38	0.46	Mostly

According to the Table 6, the rubber farmers have expressed their opinions on Implementing Sufficiency Economy Philosophy for overall at mostly agree level ($\bar{X} = 4.38$) and for every variable at mostly agree level which the 3 variables ranked from high to low mean are Self-Immunity ($\bar{X} = 4.40$), Moderation ($\bar{X} = 4.38$), and Reasonableness ($\bar{X} = 4.35$), respectively.



Table 7 Opinions on Implementing Sufficiency Economy Philosophy for Moderation of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy for Moderation	\bar{X}	S.D.	Level of Agreement
1. You aim at leading your life by sticking to sufficiency and economizing.	4.53	0.73	Strongly
2. You are confident that your family has earned enough income from rubber growing which makes your family proud to be the rubber farmers.	4.17	0.71	Mostly
3. You adhere that your main goal of rubber growing is to earn enough to have decent living standard not to emphasize on profit maximization.	4.44	0.76	Mostly
4. You adhere with only necessary consumption rather than luxurious and extravagant consumption.	4.36	0.75	Mostly
5. You understand that balancing your work and life is a good way to get real happiness.	4.38	0.80	Mostly
Overall	4.38	0.56	Mostly

According to the Table 7, the rubber farmers have expressed their opinions on Implementing Sufficiency Economy Philosophy for Moderation at strongly agree level for the item that You aim at leading your life by sticking to sufficiency and economizing ($\bar{X} = 4.53$) and at mostly agree level on the first 3 items, ranked from high to low mean, which are You adhere that your main goal of rubber growing is to earn enough to have decent living standard not to emphasize on profit maximization ($\bar{X} = 4.44$), You understand that balancing your work and life is a good way to get real happiness (4.38), and You adhere with only necessary consumption rather than luxurious and extravagant consumption ($\bar{X} = 4.36$), respectively.



Table 8 Opinions on Implementing Sufficiency Economy Philosophy for Reasonableness of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy for Reasonableness	\bar{X}	S.D.	Level of Agreement
1. You realized that decision making concerning with all factors involved and careful anticipation of outcomes is important to your work performance.	4.29	0.74	Mostly
2. You believe that careful planning on monthly expenditure does not make your family indebted and creates some savings for your family.	4.36	0.75	Mostly
3. You aim at rubber growing with careful planning on your own existing resources in the most efficient and effective way.	4.31	0.80	Mostly
4. You emphasize on rubber growing which does not cause any environmental problems such as pollution and makes this kind of agriculture to be acceptable in your community.	4.49	0.73	Mostly
5. You understand that leading life based on consciousness about your own social context is better than imitating from the globalization trend.	4.28	0.71	Mostly
Overall	4.35	0.53	Mostly

According to the Table 8, the rubber farmers have expressed their opinions on Implementing Sufficiency Economy Philosophy for Reasonableness at mostly agree level for every item and the first 3 items ranked from high to low mean are You emphasize on rubber growing which does not cause any environmental problems such as pollution and makes this kind of agriculture to be acceptable in your community ($\bar{X} = 4.49$), You believe that careful planning on monthly expenditure does not make your family indebted and creates some savings for your family ($\bar{X} = 4.36$), and You aim



at rubber growing with careful planning on your own existing resources in the most efficient and effective way ($\bar{X} = 4.31$), respectively.

Table 9 Opinions on Implementing Sufficiency Economy Philosophy for Self-Immunity of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy for Self-Immunity	\bar{X}	S.D.	Level of Agreement
1. You are confident that readiness for coping with any change causing from internal factors such as cost or labor change is important to your work performance.	4.54	0.65	Strongly
2. You believe that readiness for coping with any change causing from external factors such as economic or political change is important to your work performance.	4.39	0.66	Mostly
3. You emphasize on network building among rubber farmers in your community which benefits everyone rather than competing each other for self-interest.	4.42	0.72	Mostly
4. You realize that being not underestimate any situation which might affect your rubber growing is important to your work performance.	4.30	0.78	Mostly
5. You aim at managing risks by estimating the likely impacts that might affect your living standard and try to find the best solution to cope with those risks.	4.38	0.76	Mostly
Overall	4.40	0.52	Mostly

According to the Table 9, the rubber farmers have expressed their opinions on Implementing Sufficiency Economy Philosophy for Self-Immunity at strongly agree level for the item that You are confident that readiness for coping with any change



causing from internal factors such as cost or labor change is important to your work performance ($\bar{X} = 4.54$) and at mostly agree level for the first 3 items, ranked from high to low mean, which are You emphasize on network building among rubber farmers in your community which benefits everyone rather than competing each other for self-interest ($\bar{X} = 4.42$), You believe that readiness for coping with any change causing from external factors such as economic or political change is important to your work performance ($\bar{X} = 4.39$), and You aim at managing risks by estimating the likely impacts that might affect your living standard and try to find the best solution to cope with those risks ($\bar{X} = 4.38$), respectively.

Section 3: Opinions on Family Life Quality of rubber farmers in Buriram province as presented in the Table 10.

Table 10 Opinions on Family Life Quality for Overall and for Each Variable of Rubber Farmers in Buriram Province

Family Life Quality	\bar{X}	S.D.	Level of Agreement
1. Health	4.29	0.73	Mostly
2. Environmental Well-Being	4.27	0.62	Mostly
3. Productivity	4.29	0.78	Mostly
4. Daily Family Life	4.20	0.81	Mostly
5. Family Interaction	4.22	0.73	Mostly
6. Financial Well-Being	4.12	0.84	Mostly
Overall	4.23	0.64	Mostly

According to the Table 10, the rubber farmers have expressed their opinions on Family Life Quality for overall at mostly agree level ($\bar{X} = 4.23$) and for every variable at mostly agree level which the first 3 variables ranked from high to low mean are Health ($\bar{X} = 4.29$), Productivity ($\bar{X} = 4.29$), and Environmental Well-Being ($\bar{X} = 4.27$), respectively.



Table 11 Opinions on Family Life Quality for Health of Rubber Farmers in Buriram Province

Family Life Quality for Health	\bar{X}	S.D.	Level of Agreement
1. You have strong physical health free from any illness and have enough energy to take care other members of your family.	4.42	0.84	Mostly
2. You have strong mental health, stable feeling, and fresh, cheerful, and joyful sentiment free from any stress.	4.26	0.77	Mostly
3. You are provided good health care in your area where you live.	4.31	0.83	Mostly
4. You eat proper and five-group nutritious food.	4.24	0.84	Mostly
5. You do exercise regularly.	4.23	0.99	Mostly
Overall	4.29	0.73	Mostly

According to the Table 11, the rubber farmers have expressed their opinions on Family Life Quality for Health at mostly agree level for every item and the first 3 items ranked from high to low mean are You have strong physical health free from any illness and have enough energy to take care other members of your family ($\bar{X} = 4.42$), You are provided good health care in your area where you live ($\bar{X} = 4.31$), and You have strong mental health, stable feeling, and fresh, cheerful, and joyful sentiment free from any stress ($\bar{X} = 4.26$), respectively.



Table 12 Opinions on Family Life Quality for Environmental Well-Being of Rubber Farmers in Buriram Province

Family Life Quality for Environmental Well-Being	\bar{X}	S.D.	Level of Agreement
1. You live in a house which has enough space, fresh air, and safety.	4.40	0.73	Mostly
2. You attended a safety school which induced enthusiasm to access proper education.	4.21	0.96	Mostly
3. You work in a safety place which facilitates working without any obstacle.	4.32	0.78	Mostly
4. You have good and friendly neighbors who are willing to help you at all time.	4.27	0.74	Mostly
5. You live in a society where there is good infrastructure and facilities from the past until now.	4.13	0.88	Mostly
Overall	4.27	0.62	Mostly

According to the Table 12, the rubber farmers have expressed their opinions on Family Life Quality for Environmental Well-Being at mostly agree level for every item and the first 3 items ranked from high to low mean are You live in a house which has enough space, fresh air, and safety ($\bar{X} = 4.40$), You work in a safety place which facilitates working without any obstacle ($\bar{X} = 4.32$), and You have good and friendly neighbors who are willing to help you at all time ($\bar{X} = 4.27$), respectively.



Table 13 Opinions on Family Life Quality for Productivity of Rubber Farmers in Buriram Province

Family Life Quality for Productivity	\bar{X}	S.D.	Level of Agreement
1. You could earn good income from your occupation.	4.31	0.82	Mostly
2. You try to develop yourself by continuous learning in order to acquire new skills at all time.	4.27	0.91	Mostly
3. You obtain proper education that you expect that you will get suitable and high-paid job in the future.	4.26	0.95	Mostly
4. You know how to balance between work and life and have enough leisure time to relax from your work.	4.32	0.90	Mostly
Overall	4.29	0.78	Mostly

According to the Table 13, the rubber farmers have expressed their opinions on Family Life Quality for Productivity at mostly agree level for every item and the first 3 items ranked from high to low mean are You know how to balance between work and life and have enough leisure time to relax from your work ($\bar{X} = 4.32$), You could earn good income from your occupation ($\bar{X} = 4.31$), and You try to develop yourself by continuous learning in order to acquire new skills at all time ($\bar{X} = 4.27$), respectively.



Table 14 Opinions on Family Life Quality for Daily Family Life of Rubber Farmers in Buriram Province

Family Life Quality for Daily Family Life	\bar{X}	S.D.	Level of Agreement
1. You are initiative, creative, and know to create joyful atmosphere in the family all the time.	4.14	0.93	Mostly
2. You know to observe, follow, question, and worry one another all the time.	4.23	0.95	Mostly
3. You know how to help each other to do housework such as cooking, washing, and cleaning.	4.18	0.93	Mostly
4. You feel intimacy and love with each other and know how to encourage and share the burdens together all the time.	4.24	0.91	Mostly
Overall	4.20	0.81	Mostly

According to the Table 14, the rubber farmers have expressed their opinions on Family Life Quality for Daily Family Life at mostly agree level for every item and the first 3 items ranked from high to low mean are You feel intimacy and love with each other and know how to encourage and share the burdens together all the time ($\bar{X} = 4.24$), You know to observe, follow, question, and worry one another all the time ($\bar{X} = 4.23$), and You know how to help each other to do housework such as cooking, washing, and cleaning ($\bar{X} = 4.18$), respectively.



Table 15 Opinions on Family Life Quality for Family Interaction of Rubber Farmers in Buriram Province

Family Life Quality for Family Interaction	\bar{X}	S.D.	Level of Agreement
1. You know how to talk with each other and find solutions when the problems occur.	4.19	0.91	Mostly
2. You have chance to express your opinions and make decisions together in the family.	4.23	0.89	Mostly
3. You know how to accept, forgive, and support each other all the time.	4.20	0.82	Mostly
4. You know how to get helps from and give helps to other members of the family.	4.24	0.86	Mostly
Overall	4.22	0.73	Mostly

According to the Table 15, the rubber farmers have expressed their opinions on Family Life Quality for Family Interaction at mostly agree level for every item and the first 3 items ranked from high to low mean are You know how to get helps from and give helps to other members of the family ($\bar{X} = 4.24$), You have chance to express your opinions and make decisions together in the family ($\bar{X} = 4.23$), and You know how to accept, forgive, and support each other all the time ($\bar{X} = 4.20$), respectively.



Table 16 Opinions on Family Life Quality for Financial Well-Being of Rubber Farmers in Buriram Province

Family Life Quality for Financial Well-Being	\bar{X}	S.D.	Level of Agreement
1. You have enough income to support family's expenditure all the time.	4.14	0.86	Mostly
2. You have savings to cope with future needs and potential emergency cases.	4.12	0.90	Mostly
3. You have financial stability because of your careful planning associated with efficient use of your money both in consumption and investment.	4.08	0.91	Mostly
4. You have good financial condition which could find happiness to you and your family.	4.14	1.07	Mostly
Overall	4.12	0.84	Mostly

According to the Table 16, the rubber farmers have expressed their opinions on Family Life Quality for Financial Well-Being at mostly agree level for every item and the first 3 items ranked from high to low mean are You have enough income to support family's expenditure all the time ($\bar{X} = 4.14$), You have good financial condition which could find happiness to you and your family ($\bar{X} = 4.14$), and You have savings to cope with future needs and potential emergency cases ($\bar{X} = 4.12$), respectively.



Section 4: Comparison of opinions on Implementing Sufficiency Economy of rubber farmers in Buriram province who have the different Experience of Rubber Growing, Numbers of Family Member, Size of Rubber Plantation, and Monthly Average Income as presented in the Table 17.

4.1 Experience of Rubber Growing

Table 17 Comparison of Opinions on Implementing Sufficiency Economy Philosophy for Overall of Rubber Farmers in Buriram Province Who Have the Different Experience of Rubber Growing (ANOVA)

Implementing Sufficiency Economy Philosophy	Source of Variance	df	SS	MS	F	p-value
Overall	Between Group	3	1.375	0.458	2.163	0.094
	Within Group	202	42.784	0.212		
	Total	205	44.159			

According to the Table 17, the rubber farmers who have the different Experience of Rubber Growing have expressed their opinions on Implementing Sufficiency Economy Philosophy for overall indifferently ($p > 0.05$).



Table 18 Comparison of Opinions on Implementing Sufficiency Economy Philosophy for Each Variable of Rubber Farmers in Buriram Province Who Have the Different Experience of Rubber Growing (MANOVA)

Testing Statistics	Implementing Sufficiency Economy Philosophy	Hypothesis df	Error df	F	p-value
Pillai's Trace	3 Variables	9	606.000	0.813	0.604
Wilks' Lambda	3 Variables	9	486.000	0.814	0.604
Hotelling's Trace	3 Variables	9	596.000	0.814	0.603
Roy's Largest Root	3 Variables	3	202.000	2.250	0.084

According to the Table 18, the rubber farmers who have the different Experience of Rubber Growing have expressed their opinions on Implementing Sufficiency Economy Philosophy for each variable which are Moderation, Reasonableness, and Self-Immunity indifferently ($p > 0.05$).



4.2 Numbers of Family Member

Table 19 Comparison of Opinions on Implementing Sufficiency Economy Philosophy for Overall of Rubber Farmers in Buriram Province Who Have the Different Numbers of Family Member (ANOVA)

Implementing Sufficiency Economy Philosophy	Source of Variance	df	SS	MS	F	p-value
Overall	Between Group	3	0.873	0.291	1.357	0.257
	Within Group	202	43.286	0.214		
	Total	205	44.159			

According to the Table 19, the rubber farmers who have the different Numbers of Family Member have expressed their opinions on Implementing Sufficiency Economy Philosophy for overall indifferently ($p > 0.05$).



Table 20 Comparison of Opinions on Implementing Sufficiency Economy Philosophy for Each Variable of Rubber Farmers in Buriram Province Who Have the Different Numbers of Family Member (MANOVA)

Testing Statistics	Implementing Sufficiency Economy Philosophy	Hypothesis df	Error df	F	p-value
Pillai's Trace	3 Variables	9	606.000	0.871	0.551
Wilks' Lambda	3 Variables	9	486.000	0.866	0.555
Hotelling's Trace	3 Variables	9	596.000	0.862	0.559
Roy's Largest Root	3 Variables	3	202.000	1.644	0.180

According to the Table 20, the rubber farmers who have the different Numbers of Family Member have expressed their opinions on Implementing Sufficiency Economy Philosophy for each variable which are Moderation, Reasonableness, and Self-Immunity indifferently ($p > 0.05$).



4.3 Size of Rubber Plantation

Table 21 Comparison of Opinions on Implementing Sufficiency Economy Philosophy for Overall of Rubber Farmers in Buriram Province Who Have the Different Size of Rubber Plantation (ANOVA)

Implementing Sufficiency Economy Philosophy	Source of Variance	df	SS	MS	F	p-value
Overall	Between Group	3	0.713	0.238	1.105	0.348
	Within Group	202	43.445	0.215		
	Total	205	44.159			

According to the Table 21, the rubber farmers who have the different Size of Rubber Plantation have expressed their opinions on Implementing Sufficiency Economy Philosophy for overall indifferently ($p > 0.05$).

Table 22 Comparison of Opinions on Implementing Sufficiency Economy Philosophy of Rubber Farmers in Buriram Province Who Have the Different Size of Rubber Plantation as Part (MANOVA)

Testing Statistics	Implementing Sufficiency Economy Philosophy	Hypothesis df	Error df	F	p-value
Pillai's Trace	3 Variables	9	606.000	0.974	0.461
Wilks' Lambda	3 Variables	9	486.000	0.974	0.461
Hotelling's Trace	3 Variables	9	596.000	0.973	0.461
Roy's Largest Root	3 Variables	3	202.000	2.462	0.064

According to the Table 22, the rubber farmers who have the different Size of Rubber Plantation have expressed their opinions on Implementing Sufficiency Economy



Philosophy for each variable which are Moderation, Reasonableness, and Self-Immunity indifferently ($p > 0.05$).

4.4 Monthly Average Income

Table 23 Comparison of Opinions on Implementing Sufficiency Economy Philosophy for Overall of Rubber Farmers in Buriram Province Who Have the Different Monthly Average Income (ANOVA)

Implementing Sufficiency Economy Philosophy	Source of Variance	df	SS	MS	F	p-value
Overall	Between Group	3	1.508	0.503	2.381	0.071
	Within Group	202	42.651	0.211		
	Total	205	44.159			

According to the Table 23, the rubber farmers who have the different Monthly Average Income have expressed their opinions on Implementing Sufficiency Economy Philosophy for overall indifferently ($p > 0.05$)

Table 24 Comparison of Opinions on Implementing Sufficiency Economy Philosophy for Each Variable of Rubber Farmers in Buriram Province Who Have the Different Monthly Average Income (MANOVA)

Testing Statistics	Implementing Sufficiency Economy Philosophy	Hypothesis df	Error df	F	p-value
Pillai's Trace	3 Variables	9	606.000	1.683	0.090
Wilks' Lambda	3 Variables	9	486.000	1.697	0.087
Hotelling's Trace	3 Variables	9	596.000	1.705	0.085
Roy's Largest Root	3 Variables	3	202.000	4.345	0.005*

* represents statistical significance at 5% level



According to the Table 24, the rubber farmers who have the different Monthly Average Income have expressed their opinions on Implementing Sufficiency Economy Philosophy for each variable which are Moderation, Reasonableness, and Self-Immunity indifferently ($p > 0.05$).

Section 5: Comparison of opinions on Family Life Quality of rubber farmers in Buriram province who have the different Experience of Rubber Growing, Number of Family Member, Size of Rubber Plantation, and Monthly Average Income as presented in the Table 31.

5.1 Experience of Rubber Growing

Table 25 Comparison of Opinions on Family Life Quality for Overall of Rubber Farmers in Buriram Province Who Have the Different Experience of Rubber Growing (ANOVA)

Family Life Quality	Source of Variance	df	SS	MS	F	p-value
Overall	Between Group	3	2.835	0.945	2.298	0.079
	Within Group	202	83.080	0.411		
	Total	205	85.915			

According to the Table 25, the rubber farmers who have the different Experience of Rubber Growing have expressed their opinions on Family Life Quality for overall indifferently ($p > 0.05$).



Table 26 Comparison of Opinions on Family Life Quality for Each Variable of Rubber Farmers in Buriram Province Who Have the Different Experience of Rubber Growing (MANOVA)

Testing Statistics	Family Life Quality	Hypothesis df	Error df	F	p-value
Pillai's Trace	6 Variables	18	597.000	1.780	0.024*
Wilks' Lambda	6 Variables	18	557.685	1.774	0.025*
Hotelling's Trace	6 Variables	18	587.000	1.766	0.026*
Roy's Largest Root	6 Variables	6	199.000	2.874	0.010*

* represents statistical significance at 5% level

According to the Table 26, the rubber farmers who have the different Experience of Rubber Growing have expressed their opinions on Family Life Quality for each variable which are Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being differently at the statistically significant at the 5% level of significance.

The result of univariate tests illustrates that the rubber farmers who have the different Experience of Rubber Growing have expressed their opinions on Family Life Quality for each variable which are Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being indifferently ($p > 0.008$) (Table 48 in Appendix D).



5.2 Numbers of Family Member

Table 27 Comparison of Opinions on Family Life Quality for Overall of Rubber Farmers in Buriram Province Who Have the Different Numbers of Family Member (ANOVA)

Family Life Quality	Source of Variance	df	SS	MS	F	p-value
Overall	Between Group	3	0.762	0.254	0.602	0.614
	Within Group	202	85.153	0.422		
	Total	205	85.915			

According to the Table 27, the rubber farmers who have the different Numbers of Family Member have expressed their opinions on Family Life Quality for overall indifferently ($p > 0.05$).

Table 28 Comparison of Opinions on Family Life Quality for Each Variable of Rubber Farmers in Buriram Province Who Have the Different Numbers of Family Member (MANOVA)

Testing Statistics	Family Life Quality	Hypothesis df	Error df	F	p-value
Pillai's Trace	6 Variables	18	597.000	0.777	0.728
Wilks' Lambda	6 Variables	18	557.000	0.772	0.734
Hotelling's Trace	6 Variables	18	587.000	0.768	0.739
Roy's Largest Root	6 Variables	6	199.000	1.149	0.335

According to the Table 28, the rubber farmers who have the different Numbers of Family Member have expressed their opinions on Family Life Quality for each variable which are Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being indifferently ($p > 0.05$).



5.3 Size of Rubber Plantation

Table 29 Comparison of Opinions on Family Life Quality for Overall of Rubber Farmers in Buriram Province Who Have the Different Size of Rubber Plantation (ANOVA)

Family Life Quality	Source of Variance	df	SS	MS	F	p-value
Overall	Between Group	3	1.026	0.342	0.814	0.488
	Within Group	202	84.889	0.420		
	Total	205	85.915			

According to the Table 29, the rubber farmers who have the different Size of Rubber Plantation have expressed their opinions on Family Life Quality for overall indifferently ($p > 0.05$).

Table 30 Comparison of Opinions on Family Life Quality for Each Variable of Rubber Farmers in Buriram Province Who Have the Different Size of Rubber Plantation (MANOVA)

Testing Statistics	Family Life Quality	Hypothesis df	Error df	F	p-value
Pillai's Trace	6 Variables	18	597.000	1.166	0.284
Wilks' Lambda	6 Variables	18	557.685	1.162	0.289
Hotelling's Trace	6 Variables	18	587.000	1.156	0.293
Roy's Largest Root	6 Variables	6	199.000	1.717	0.119

According to the Table 30, the rubber farmers who have the different Size of Rubber Plantation have expressed their opinions on Family Life Quality for each variable which are Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being indifferently ($p > 0.05$).



5.4 Monthly Average Income

Table 31 Comparison of Opinions on Family Life Quality for Overall of Rubber Farmers in Buriram Province Who Have the Different Monthly Average Income (ANOVA)

Family Life Quality	Source of Variance	df	SS	MS	F	p-value
Overall	Between Group	3	5.132	1.711	4.277	0.006*
	Within Group	202	80.783	0.400		
	Total	205	85.915			

* represents statistical significance at 5% level

According to the Table 31, the rubber farmers who have the different Monthly Average Income have expressed their opinions on Family Life Quality for overall differently at the statistically significant at the 5% level of significance. Thus, we need to make pairwise comparison of mean difference.

According to the pairwise comparison of mean difference, the rubber farmers who have Monthly Average Income Lower than 10,000 Baht and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for Overall stronger than More than 30,000 Baht (Table 49 in Appendix D).

Table 32 Comparison of Opinions on Family Life Quality for Each Variable of Rubber Farmers in Buriram Province Who Have the Different Monthly Average Income (MANOVA)

Testing Statistics	Family Life Quality	Hypothesis df	Error df	F	p-value
Pillai's Trace	6 Variables	18	597.000	1.711	0.034*
Wilks' Lambda	6 Variables	18	557.685	1.734	0.030*
Hotelling's Trace	6 Variables	18	587.000	1.755	0.027*
Roy's Largest Root	6 Variables	6	199.000	4.091	0.001*

* represents statistical significance at 5% level



According to the Table 32, the rubber farmers who have the different Monthly Average Income have expressed their opinions on Family Life Quality for each variable which are Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being differently at the statistically significant at the 5% level of significance.

The result of univariate tests illustrates that the rubber farmers who have the different Monthly Average Income have expressed their opinions on Family Life Quality for Health and Daily Family Life differently at the statistically significant at the 0.8% level of significance (Table 50 in Appendix D). Thus, we need to make pairwise comparison of mean difference.

According to the pairwise comparison of mean difference, the rubber farmers who have Monthly Average Income Lower than 10,000 Baht, 10,001 – 20,000 Baht, and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for Health stronger than More than 30,000 Baht (Table 51 in Appendix D).

The rubber farmers who have Monthly Average Income Lower than 10,000 Baht and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for Daily Family Life stronger than More than 30,000 Baht (Table 52 in Appendix D).

Section 6: Correlation analysis, multiple regression analysis, and predicting equation building of Implementing Sufficiency Economy Philosophy and Family Life Quality of rubber farmers in Buriram province, the researcher has conducted correlation analysis, multiple regression analysis, and predicting equation building through the following hypotheses:

H₁: Implementing Sufficiency Economy Philosophy for Moderation has relationships with and effects on Family Life Quality of rubber farmers in Buriram province.

H₂ : Implementing Sufficiency Economy Philosophy for Reasonableness has relationships with and effects on Family Life Quality of rubber farmers in Buriram province.

H₃ : Implementing Sufficiency Economy Philosophy for Self-Immunity has relationships with and effects on Family Life Quality of rubber farmers in Buriram province.



Results of Multiple Correlation Analysis and Predicting Equation Building

Table 33 Correlation Analysis of Implementing Sufficiency Economy Philosophy and Family Life Quality for Overall of Rubber Farmers in Buriram Province

Variables	FLQ	SEM	SER	SES	VIF
\bar{X}	4.23	4.38	4.35	4.40	
S.D.	0.64	0.56	0.53	0.52	
FLQ		0.641*	0.695*	0.650*	
SEM			0.592*	0.481*	1.548
SER				0.744*	2.666
SES					2.253

* represents statistical significance at 5% level

According to the Table 33, each independent variable is correlated each other that might cause multicollinearity problem. Therefore, the researcher has tested the multicollinearity by using VIF value of the independent variable of Implementing Sufficiency Economy Philosophy that has value from 1.548 – 2.666 which is less than 10. Thus, it illustrates that the independent variables are correlated each other at the level that does not cause multicollinearity problem (Black, 2006: 585)

According to the coefficient of correlation, each independent variable of Implementing Sufficiency Economy Philosophy is correlated with dependent variable of Family Life Quality for overall at the statistically significant at the 5% level of significance. The coefficient of correlation is between 0.641 - 0.695 and the researcher has analyzed multiple regressions and built equation to predict Family Life Quality for overall as follows:

$$FLQ = -0.473 + 0.385SEM + 0.361SER + 0.329SES$$

According to the equation, the researcher could predict Family Life Quality for overall (FLQ) at the statistically significant at the 5% level of significance ($F = 99.110$; $p = 0.000$) and the coefficient of adjusted forecasting ($AdjR^2$) equals to 0.589 (Table



34). Then, the researcher has tested the relationship between each independent variable of Implementing Sufficiency Economy Philosophy and dependent variable of Family Life Quality for overall (FLQ) in the Table 34.

Table 34 Regression Analysis of Family Life Quality for Overall of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy	Family Life Quality for Overall		t	p-value
	Coefficient of Determination	Standard Error		
Constant (a)	-0.473	0.277	-1.710	0.089
Moderation (SEM)	0.385	0.064	6.035	0.000*
Reasonableness (SER)	0.361	0.088	4.087	0.000*
Self-Immunity (SES)	0.329	0.083	3.955	0.000*

F = 99.110 p = 0.000 AdjR² = 0.589

* represents statistical significance at 5% level

According to the Table 34, Implementing Sufficiency Economy Philosophy for Moderation (SEM), Reasonableness (SER), and Self-Immunity (SES) is positively correlated with Family Life Quality for overall (FLQ) at the statistically significant at the 5% level of significance. Therefore, we accept the hypotheses 1, 2, and 3.



Table 35 Correlation Analysis of Implementing Sufficiency Economy Philosophy and Family Life Quality for Health of Rubber Farmers in Buriram Province

Variables	FLH	SEM	SER	SES	VIF
\bar{X}	4.29	4.38	4.35	4.40	
S.D.	0.73	0.56	0.53	0.52	
FLH		0.619*	0.682*	0.612*	
SEM			0.592*	0.481*	1.548
SER				0.744*	2.666
SES					2.253

* represents statistical significance at 5% level

According to the Table 35, each independent variable is correlated each other that might cause multicollinearity problem. Therefore, the researcher has tested the multicollinearity by using VIF value of the independent variable of Implementing Sufficiency Economy Philosophy that has value from 1.548 – 2.666 which is less than 10. Thus, it illustrates that the independent variables are correlated each other at the level that does not cause multicollinearity problem (Black, 2006: 585)

According to the coefficient of correlation, each independent variable of Implementing Sufficiency Economy Philosophy is correlated with dependent variable of Family Life Quality for Health at the statistically significant at the 5% level of significance. The coefficient of correlation is between 0.612 - 0.682 and the researcher has analyzed multiple regressions and built equation to predict Family Life Quality for Health as follows:

$$FLH = -0.849 + 0.416SEM + 0.468SER + 0.292SES$$

According to the equation, the researcher could predict Family Life Quality for Health (FLH) at the statistically significant at the 5% level of significance ($F = 83.887$; $p = 0.000$) and the coefficient of adjusted forecasting ($AdjR^2$) equals to 0.548 (Table 36). Then, the researcher has tested the relationship between each independent variable of Implementing Sufficiency Economy Philosophy and dependent variable of Family Life Quality for Health (FLH) in the Table 36:



Table 36 Regression Analysis of Family Life Quality for Health of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy	Family Life Quality for Health		t	p-value
	Coefficient of Determination	Standard Error		
Constant (a)	-0.849	0.331	-2.562	0.011*
Moderation (SEM)	0.416	0.076	5.450	0.000*
Reasonableness (SER)	0.468	0.106	4.424	0.000*
Self-Immunity (SES)	0.292	0.100	2.934	0.004*

F = 83.887 p = 0.000 AdjR² = 0.548

* represents statistical significance at 5% level

According to the Table 36, Implementing Sufficiency Economy Philosophy for Moderation (SEM), Reasonableness (SER), and Self-Immunity (SES) is positively correlated with Family Life Quality for Health (FLH) at the statistically significant at the 5% level of significance. Therefore, we accept the hypotheses 1, 2, and 3.

Table 37 Correlation Analysis of Implementing Sufficiency Economy Philosophy and Family Life Quality for Environmental Well-Being of Rubber Farmers in Buriram Province

Variables	FLE	SEM	SER	SES	VIF
\bar{X}	4.27	4.38	4.35	4.40	
S.D.	0.62	0.56	0.53	0.52	
FLE		0.534*	0.557*	0.538*	
SEM			0.592*	0.481*	1.548
SER				0.744*	2.666
SES					2.253

* represents statistical significance at 5% level



According to the Table 37, each independent variable is correlated each other that might cause multicollinearity problem. Therefore, the researcher has tested the multicollinearity by using VIF value of the independent variable of Implementing Sufficiency Economy Philosophy that has value from 1.548 – 2.666 which is less than 10. Thus, it illustrates that the independent variables are correlated each other at the level that does not cause multicollinearity problem (Black, 2006: 585)

According to the coefficient of correlation, each independent variable of Implementing Sufficiency Economy Philosophy is correlated with dependent variable of Family Life Quality for Environmental Well-Being at the statistically significant at the 5% level of significance. The coefficient of correlation is between 0.534 - 0.557 and the researcher has analyzed multiple regressions and built equation to predict Family Life Quality for Environmental Well-Being as follows:

$$FLE = 0.497 + 0.332SEM + 0.226SER + 0.302SES$$

According to the equation, the researcher could predict Family Life Quality for Environmental Well-Being (FLE) at the statistically significant at the 5% level of significance ($F = 45.311$; $p = 0.000$) and the coefficient of adjusted forecasting ($AdjR^2$) equals to 0.393 (Table 38). Then, the researcher has tested the relationship between each independent variable of Implementing Sufficiency Economy Philosophy and dependent variable of Family Life Quality for Environmental Well-Being (FLE) in the Table 38:



Table 38 Regression Analysis of Family Life Quality for Environmental Well-Being of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy	Family Life Quality for Environmental Well-Being		t	p-value
	Coefficient of Determination	Standard Error		
Constant (a)	0.497	0.327	1.521	0.130
Moderation (SEM)	0.332	0.075	4.420	0.000*
Reasonableness (SER)	0.226	0.104	2.169	0.031*
Self-Immunity (SES)	0.302	0.098	3.076	0.002*
F = 45.311 p = 0.000 AdjR ² = 0.393				

* represents statistical significance at 5% level

According to the Table 38, Implementing Sufficiency Economy Philosophy for Moderation (SEM), Reasonableness (SER), and Self-Immunity (SES) is positively correlated with Family Life Quality for Environmental Well-Being (FLE) at the statistically significant at the 5% level of significance. Therefore, we accept the hypotheses 1, 2, and 3.

Table 39 Correlation Analysis of Implementing Sufficiency Economy Philosophy and Family Life Quality for Productivity of Rubber Farmers in Buriram Province

Variables	FLP	SEM	SER	SES	VIF
\bar{X}	4.29	4.38	4.35	4.40	
S.D.	0.78	0.56	0.53	0.52	
FLP		0.629*	0.617*	0.582*	
SEM			0.592*	0.481*	1.548
SER				0.744*	2.666
SES					2.253

* represents statistical significance at 5% level



According to the Table 39, each independent variable is correlated each other that might cause multicollinearity problem. Therefore, the researcher has tested the multicollinearity by using VIF value of the independent variable of Implementing Sufficiency Economy Philosophy that has value from 1.548 – 2.666 which is less than 10. Thus, it illustrates that the independent variables are correlated each other at the level that does not cause multicollinearity problem (Black, 2006: 585)

According to the coefficient of correlation, each independent variable of Implementing Sufficiency Economy Philosophy is correlated with dependent variable of Family Life Quality for Productivity at the statistically significant at the 5% level of significance. The coefficient of correlation is between 0.582 - 0.629 and the researcher has analyzed multiple regressions and built equation to predict Family Life Quality for Productivity as follows:

$$FLP = -1.027 + 0.545SEM + 0.545SER + 0.362SES$$

According to the equation, the researcher could predict Family Life Quality for Productivity (FLP) at the statistically significant at the 5% level of significance ($F = 71.055$; $p = 0.000$) and the coefficient of adjusted forecasting ($AdjR^2$) equals to 0.506 (Table 40). Then, the researcher has tested the relationship between each independent variable of Implementing Sufficiency Economy Philosophy and dependent variable of Family Life Quality for Productivity (FLP) in the Table 40:



Table 40 Regression Analysis of Family Life Quality for Productivity of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy	Family Life Quality for Productivity		t	p-value
	Coefficient of Determination	Standard Error		
Constant (a)	-1.027	0.370	-2.772	0.006*
Moderation (SEM)	0.545	0.085	6.395	0.000*
Reasonableness (SER)	0.545	0.118	2.594	0.010*
Self-Immunity (SES)	0.362	0.111	3.253	0.001*

F = 71.055 p = 0.000 AdjR² = 0.506

* represents statistical significance at 5% level

According to the Table 40, Implementing Sufficiency Economy Philosophy for Moderation (SEM), Reasonableness (SER), and Self-Immunity (SES) is positively correlated with Family Life Quality for Productivity (FLP) at the statistically significant at the 5% level of significance. Therefore, we accept the hypotheses 1, 2, and 3.

Table 41 Correlation Analysis of Implementing Sufficiency Economy Philosophy and Family Life Quality for Daily Family Life of Rubber Farmers in Buriram Province

Variables	FLD	SEM	SER	SES	VIF
\bar{X}	4.20	4.38	4.35	4.40	
S.D.	0.81	0.56	0.53	0.52	
FLD		0.529*	0.584*	0.548*	
SEM			0.592*	0.481*	1.548
SER				0.744*	2.666
SES					2.253

* represents statistical significance at 5% level



According to the Table 41, each independent variable is correlated each other that might cause multicollinearity problem. Therefore, the researcher has tested the multicollinearity by using VIF value of the independent variable of Implementing Sufficiency Economy Philosophy that has value from 1.548 – 2.666 which is less than 10. Thus, it illustrated that the independent variables are correlated each other at the level that does not cause multicollinearity problem (Black, 2006: 585)

According to the coefficient of correlation, each independent variable of Implementing Sufficiency Economy Philosophy is correlated with dependent variable of Family Life Quality for Daily Family Life at the statistically significant at the 5% level of significance. The coefficient of correlation is between 0.529 - 0.584 and the researcher has analyzed multiple regressions and built equation to predict Family Life Quality for Daily Family Life as follows:

$$FLD = -0.733 + 0.384SEM + 0.388SER + 0.355SES$$

According to the equation, the researcher could predict Family Life Quality for Daily Family Life (FLD) at the statistically significant at the 5% level of significance ($F = 48.039$; $p = 0.000$) and the coefficient of adjusted forecasting ($AdjR^2$) equals to 0.408 (Table 42). Then, the researcher has tested the relationship between each independent variable of Implementing Sufficiency Economy Philosophy and dependent variable of Family Life Quality for Daily Family Life (FLD) in the Table 42:



Table 42 Regression Analysis of Family Life Quality for Daily Family Life of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy	Family Life Quality for Daily Family Life		t	p-value
	Coefficient of Determination	Standard Error		
Constant (a)	-0.733	0.417	-1.759	0.080
Moderation (SEM)	0.384	0.096	4.000	0.000*
Reasonableness (SER)	0.388	0.133	2.917	0.004*
Self-Immunity (SES)	0.355	0.125	2.832	0.005*

F = 48.039 p = 0.000 AdjR² = 0.408

* represents statistical significance at 5% level

According to the Table 42, Implementing Sufficiency Economy Philosophy for Moderation (SEM), Reasonableness (SER), and Self-Immunity (SES) is positively correlated with Family Life Quality for Daily Family Life (FLD) at the statistically significant at the 5% level of significance. Therefore, we accept the hypotheses 1, 2, and 3.

Table 43 Correlation Analysis of Implementing Sufficiency Economy Philosophy and Family Life Quality for Family Interaction of Rubber Farmers in Buriram Province

Variables	FLI	SEM	SER	SES	VIF
\bar{X}	4.22	4.38	4.35	4.40	
S.D.	0.73	0.56	0.53	0.52	
FLI		0.443*	0.602*	0.574*	
SEM			0.592*	0.481*	1.548
SER				0.744*	2.666
SES					2.253

* represents statistical significance at 5% level



According to the Table 43, each independent variable is correlated each other that might cause multicollinearity problem. Therefore, the researcher has tested the multicollinearity by using VIF value of the independent variable of Implementing Sufficiency Economy Philosophy that has value from 1.548 – 2.666 which is less than 10. Thus, it illustrates that the independent variables are correlated each other at the level that does not cause multicollinearity problem (Black, 2006: 585)

According to the coefficient of correlation, each independent variable of Implementing Sufficiency Economy Philosophy is correlated with dependent variable of Family Life Quality for Family Interaction at the statistically significant at the 5% level of significance. The coefficient of correlation is between 0.443 - 0.602 and the researcher has analyzed multiple regressions and built equation to predict Family Life Quality for Family Interaction as follows:

$$FLI = -0.002 + 0.514SER + 0.295SES$$

According to the equation, the researcher could predict Family Life Quality for Family Interaction (FLI) at the statistically significant at the 5% level of significance ($F = 43.791$; $p = 0.000$) and the coefficient of adjusted forecasting ($AdjR^2$) equals to 0.385 (Table 44). Then, the researcher has tested the relationship between each independent variable of Implementing Sufficiency Economy Philosophy and dependent variable of Family Life Quality for Family Interaction (FLI) in the Table 44:



Table 44 Regression Analysis of Family Life Quality for Family Interaction of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy	Family Life Quality for Family Interaction		t	p-value
	Coefficient of Determination	Standard Error		
Constant (a)	-0.002	0.384	-0.006	0.995
Moderation (SEM)	0.156	0.088	1.767	0.079
Reasonableness (SER)	0.514	0.123	4.189	0.000*
Self-Immunity (SES)	0.295	0.115	2.558	0.011*

F = 43.791 p = 0.000 AdjR² = 0.385

* represents statistical significance at 5% level

According to the Table 44, Implementing Sufficiency Economy Philosophy for Reasonableness (SER) and Self-Immunity (SES) is positively correlated with Family Life Quality for Family Interaction (FLI) at the statistically significant at the 5% level of significance. Therefore, we accept the hypotheses 2 and 3. However, Implementing Sufficiency Economy Philosophy for Moderation is not correlated with Family Life Quality for Family Interaction (FLI).

Then, the researcher took Implementing Sufficiency Economy Philosophy for Reasonableness (SER) and Self-Immunity (SES) to build predicting equation of Family Life Quality for Family Interaction (FLI). The coefficient of adjusted forecasting equals to 0.379 (Table 53 in Appendix E) and the new equation is:

$$FLI = 0.238 + 0.600SER + 0.311SES$$



Table 45 Correlation Analysis of Implementing Sufficiency Economy Philosophy and Family Life Quality for Financial Well-Being of Rubber Farmers in Buriram Province

Variables	FLF	SEM	SER	SES	VIF
\bar{X}	4.12	4.38	4.35	4.40	
S.D.	0.84	0.56	0.53	0.52	
FLF		0.526*	0.525*	0.505*	
SEM			0.592*	0.481*	1.548
SER				0.744*	2.666
SES					2.253

* represents statistical significance at 5% level

According to the Table 45, each independent variable is correlated each other that might cause multicollinearity problem. Therefore, the researcher has tested the multicollinearity by using VIF value of the independent variable Of Implementing Sufficiency Economy Philosophy that has value from 1.548 – 2.666 which is less than 10. Thus, it illustrates that the independent variables are correlated each other at the level that does not cause multicollinearity problem (Black, 2006: 585)

According to the coefficient of correlation, each independent variable of Implementing Sufficiency Economy Philosophy is correlated with dependent variable of Family Life Quality for Financial Well-Being at the statistically significant at the 5% level of significance. The coefficient of correlation is between 0.505 - 0.526 and the researcher has analyzed multiple regressions and built equation to predict Family Life Quality for Financial Well-Being as follows:

$$FLF = -0.727 + 0.474SEM + 0.368SES$$

According to the equation, the researcher could predict Family Life Quality for Financial Well-Being (FLF) at the statistically significant at the 5% level of significance ($F = 39.557$; $p = 0.000$) and the coefficient of adjusted forecasting ($AdjR^2$) equals to 0.361 (Table 46). Then, the researcher has tested the relationship between each



CHAPTER V

CONCLUSION, DISCUSSION, AND RECOMMENDATION

In the research of “Relationships between Implementing Sufficiency Economy Philosophy and Family Life Quality of Rubber Farmers in Buriram Province”, the researcher has presented the agenda as follows:

1. Purposes of the Research
2. Conclusion
3. Discussion
4. Recommendation

Purposes of the Research

The purposes of the research are:

1. To investigate the implementing sufficiency economy philosophy of rubber farmers in Buriram province,
2. To examine the family life quality of rubber farmers in Buriram province,
3. To test the relationships between implementing sufficiency economy and family life quality of rubber farmers in Buriram province,
4. To test the effects of implementing sufficiency economy philosophy on family life quality of rubber farmers in Buriram province,
5. To compare the implementing sufficiency economy philosophy of rubber farmers in Buriram province who have the different experience of rubber growing, numbers of family member, size of rubber plantation, and monthly average income, and
6. To compare the family life quality of rubber farmers in Buriram province who have the different experience of rubber growing, numbers of family member, size of rubber plantation, and monthly average income



Conclusion

In the research of “Relationships between Implementing Sufficiency Economy Philosophy and Family Life Quality of Rubber Farmers in Buriram Province”, the researcher has summarized the results as follows:

1. Most of rubber farmers in Buriram province are Male, More than 50 years old, Married, Education Level Lower than high school, Experience of Rubber Growing 5 – 10 years, Numbers of Family Member 4 – 5 people, Size of Rubber Plantation 31 – 50 Rai, and Monthly Average Income More than 30,000 Baht.

2. The rubber farmers have expressed their opinions on Implementing Sufficiency Economy Philosophy for overall and for each variable at mostly agree level. For Moderation, the rubber farmers have aimed at leading their life by sticking to sufficiency and economizing, they are confident that their family has earned enough income from rubber growing which made their family proud to be the rubber farmers, they adhere that their main goal of rubber growing is to earn enough to have decent living standard not to emphasize on profit maximization, they adhere with only necessary consumption rather than luxurious and extravagant consumption, and understand that balancing their work and life is a good way to get real happiness. For Reasonableness, the rubber farmers have realized that their decision making concerning with all factors involved and careful anticipation of outcomes is important to their work performance, they believe that careful planning on monthly expenditure does not make their family indebted and creates some savings for their family, they aim at rubber growing with careful planning on their own existing resources in the most efficient and effective way, they emphasize on rubber growing which does not cause any environmental problems such as pollution and makes this kind of agriculture to be acceptable in their community, and they understand that leading life based on consciousness about their own social context is better than imitating from the globalization trend. For Self-Immunity, the rubber farmers are confident that readiness for coping with any change causing from internal factors such as cost or labor change is important to their work performance, they believe that readiness for coping with any change causing from external factors such as economic or political change is important to their work performance, they emphasize on network building among rubber farmers



in their community which benefits everyone rather than competing each other for self-interest, they realize that being not underestimate any situation which might affect their rubber growing is important to their work performance, and they aim at managing risks by estimating the likely impacts that might affect their living standard and try to find the best solution to cope with those risks.

3. The rubber farmers have expressed their opinions on Family Life Quality for overall and for each variable at mostly agree level. For Health, the rubber farmers have strong physical health free from any illness and have enough energy to take care other members of your family, they have strong mental health, stable feeling, and fresh, cheerful, and joyful sentiment free from any stress, they are provided good health care in their area where they live, they eat proper and five-group nutritious food, and they do exercise regularly. For Environmental Well-Being, the rubber farmers live in a house which has enough space, fresh air, and safety, they attended a safety school which induced enthusiasm to access proper education, they work in a safety place which facilitates their working without any obstacle, they have good and friendly neighbors who are willing to help you at all time, and they live in a society where there is good infrastructure and facilities from the past until now. For Productivity, the rubber farmers could earn good income from their occupation, they have tried to develop the mself by continuous learning in order to acquire new skills at all time, they have obtained proper education that they expect that they will get suitable and high-paid job in the future, and they know how to balance between work and life and have enough leisure time to relax from their work. For Daily Family Life, the rubber farmers are initiative, creative, and know to create joyful atmosphere in the family all the time, they know to observe, follow, question, and worry one another all the time, they know how to help each other to do housework such as cooking, washing, and cleaning, and they feel intimacy and love with each other and know how to encourage and share the burdens together all the time. For Family Interaction, the rubber farmers know how to talk with each other and find solutions when the problems occur, they have chance to express their opinions and make decisions together in the family, they know how to accept, forgive, and support each other all the time, and they know how to get helps from and give helps to other members of the family. For Financial Well-Being, the rubber farmers have enough income to support family's expenditure all the time, they have savings to cope with



future needs and potential emergency cases, they have financial stability because of their careful planning associated with efficient use of their money both in consumption and investment, and they have good financial condition which could find happiness to them and their family.

4. The rubber farmers who have the different Experience of Rubber Growing, Numbers of Family Member, Size of Rubber Plantation, and Monthly Average Income have expressed their opinions on Implementing Sufficiency Economy Philosophy for overall and for each variable indifferently.

5. The rubber farmers who have Monthly Average Income Lower than 10,000 Baht and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for overall stronger than More than 30,000 Baht. The rubber farmers who have Monthly Average Income Lower than 10,000 Baht, 10,001 – 20,000 Baht, and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for Health stronger than More than 30,000 Baht. The rubber farmers who have Monthly Average Income Lower than 10,000 Baht and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for Daily Family Life stronger than More than 30,000 Baht.

The rubber farmers who have the different Experience of Rubber Growing, Numbers of Family Member, and Size of Rubber Plantation have expressed their opinions on Family Life Quality for overall and for each variable indifferently.

6. Implementing Sufficiency Economy Philosophy is positively correlated with Family Life Quality of rubber farmers in Buriram province and the variables that predicted Family Life Quality for overall (FLQ) are Moderation (SEM), Reasonableness (SER), and Self-Immunity (SES) as shown in the following equation:

$$FLQ = -0.473 + 0.385SEM + 0.361SER + 0.329SES$$

The following equations are the equations for predicting family life quality for each variable:

1. Health

$$FLH = -0.849 + 0.416SEM + 0.468SER + 0.292SES$$

2. Environmental Well-Being

$$FLE = 0.497 + 0.332SEM + 0.226SER + 0.302SES$$



3. Productivity

$$FLP = -1.027 + 0.545SEM + 0.545SER + 0.362SES$$

4. Daily Family Life

$$FLD = -0.733 + 0.384SEM + 0.388SER + 0.355SES$$

5. Family Interaction

$$FLI = 0.238 + 0.600SER + 0.311SES$$

6. Financial Well-Being

$$FLF = -0.624 + 0.550SEM + 0.530SES$$

Discussion

In the research of “Relationships between Implementing Sufficiency Economy Philosophy and Family Life Quality of Rubber Farmers in Buriram Province”, the researcher has discussed the results as follows:

1. The rubber farmers have expressed their opinions on Implementing Sufficiency Economy Philosophy for overall and for every variable which are Moderation, Reasonableness, and Self-Immunity at mostly agree level. Since now modern development and globalization have caused changes in all aspects of society, people must be competent to stay in this capitalized world. Implementing sufficiency economy philosophy is one of the best ways to live in current modern society because this will help people lead their lives at sufficiency level, have careful planning on their daily activities, and know how to cope with changes and manage risks efficiently. Significantly, people will be able to rely on themselves and conduct their lives and pursue their destiny with dignity. Therefore, implementing sufficiency economy philosophy is a new guideline for everyone to conduct their lives through middle path in order to have high family life quality. This is consistent with the finding of Kittivongprateep (2007: Abstract) which showed that the employees had the moderate level of perception of sufficiency economy philosophy, moderate level of quality of work life, and moderate level of work happiness. Quality of work life and work happiness had a meaningful correlation at significant level of .05. The employees who had different genders, ages, and salaries did not have different quality of work life. The employees who had different genders had different levels of work happiness at significant level of .05.



The employees who had different ages and salaries did not have different level of work happiness. The employees who had different perception of sufficiency economy philosophy had different levels of quality of work life at significant level of .05 and the employees who had different perception of sufficiency economy philosophy had different levels of work happiness at significant level of .05. It is also consistent with the findings of Poolsawat (2008 : Abstract) which showed that the application of the sufficiency economy philosophy with business management of small and medium enterprises (SMEs) in Pathumthani province was at a high level in the following respective aspects: moderation, reasonableness, the need for good immunity and moral principles. However, the application of the sufficiency economy philosophy in the aspect of knowledge was at a moderate level. Having studied business operation results of small and medium enterprises (SMEs) in Pathumthani province, it was following respective aspect: environmental capital and physical capital. However, business operation results in aspects of human capital and social capital were at a moderate level. Having compared between organization characters and business operation results of SMEs, it was found business operation results at the entrepreneurs with different knowledge of the sufficiency economy philosophy were also significantly different at the .05 level. In addition, the application of the sufficiency economy philosophy with business management significantly related to SMEs business operation results at .05 the level. It is also consistent with the findings of Leungingkasut (2008: Abstract) which showed that first, the cognitive knowledge of the sufficiency economy philosophy of people was at a high level. Considering of the cognitive knowledge level for each part, it was found that the parts of the environment conservation and the sustainable use of the natural resource, the increasing income, the reducing expense, the learning, the saving and helping each other were at a high level; second, the study of accounting of the people found that the samples did the accounts sometimes. When considering the questionnaire on each item, doing accounting of every income and expense announcing the monthly income and expense to the members of the households; training or receiving suggestions on doing households accounts doing accounting of households doing the accounts on your own, doing accounts by other members instead of you, participating in doing the accounts by other members, and following and supporting the work by, it was found that all items were answered at the moderate levels; third,



concerning the opinions of the people doing accounts, it was found that people agreed with doing the accounts but they were not sure with the aspects of there were many problems on doing the accounts and we can save money without doing the accounts; and fourth, this study found significant relationship between the cognitive knowledge of the sufficiency economy philosophy bestowed by His Majesty the King and the people doing households accounts. In general, it was found that the relationship coefficient was at 0.16 with the significant level of .01. Specifically, the cognitive knowledge of reducing expense and helping each other had significant relationship with doing the accounts at the level of 0.5, while the part of gaining income had significant relationship with doing the accounts at the level of .01. It is also consistent with the findings of Ieamvijarn (2009: Abstract) which showed that most of the retailers had knowledge and understood the philosophy of sufficiency economy at a moderate level. They agreed at a high level with the application of this philosophy as a whole and each aspect. The aspects were corporate analysis, marketing, finance, personnel, moral and social responsibility. The retailers who were different gender opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were different ages opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were different educational opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were utilizing different business models opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were of different types of business opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were of different investment schemes opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial,



personnel, moral and social responsibility showed no significant difference. The retailers who were of different durations of business operations agreed that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were different gender opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference.

2. The rubber farmers have expressed their opinions on Family Life Quality for overall and for every variable which are Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being at mostly agree level. Since now family life quality is increasing important in modern society, every family should know how to make their lives happy. People should know how to look after their health by eating proper food, doing regular exercise, and getting good healthcare system. They should live in a good house, a safety neighborhood, and good infrastructure. They should also know how to create good atmosphere within their family by caring and helping each other all the time. Learning to accept, forgive, and support one another in the family is also a part of family happiness. Financial condition is one of the most important determinants of family life quality in our modern society. This is consistent with the findings of Brown et al. (2003: 226) which showed that: first, no significant correlations were found for opportunities or initiative in the health aspect. However, level of attainment of overall family health was positively related to the level of satisfaction with this attainment; second, for the financial well-being aspect, the only positive correlation was found between measures of attainment of financial well-being and satisfaction; third, a strong positive correlation between measures of attainment and satisfaction in the family relationships aspect suggests that engaging in activities designed to foster good family relationships and satisfaction with the resulting relationships go hand in hand; fourth, attainment and satisfaction were also positively correlated in the aspect of support from others indicating that family satisfaction with the support received from others was higher if families were getting the support that they wanted; fifth, the fact that satisfaction did not correlate with any of the other three measures, nor did they correlate with each other, suggests a complexity in



understanding the role of support services in the lives of these families. Lack of support, not knowing where to find services, and the short-term nature of services, though, were consistent complaints among all the families, and these may be factors that help to explain such complexity; sixth, a positive relationship between satisfaction and attainment and between satisfaction and initiative in the spiritual and cultural beliefs aspect suggests that the high levels of satisfaction are also related to high levels of attainment and seeking that attainment; seventh, an expected positive correlation was found between the level of attainment of education and careers and the level of satisfaction indicating that families who have attained a higher level of their own career and educational expectations are more satisfied than those whose attainment in this area is low; eighth, there was also a positive correlation between the level of enjoyment and leisure attained by the families and their satisfaction with this attainment, further indicating that when they carried out the activities they enjoyed doing so; and finally, only four families were dissatisfied with their family's level of contribution to community and civic affairs. Thirteen families were "neither satisfied nor dissatisfied", 14 were "satisfied", and one family was "very satisfied". In general, careers, spiritual and cultural beliefs, and family relationships were rated highly, while support from others and support from disability related services were rated quite low. It is also consistent with the findings of Ondigi and Mugenda (2011: Abstract) which showed that the majority of the respondents who were married, had more children, had more income, had high education level, were in good health status, who were more spiritual, indicated more satisfaction with their quality of life. Therefore, this study concluded that psychosocial factors attribute greatly to the satisfaction of quality of life among Kenyans of all walks of life. In essence, the majority of Kenyan people will be happier if their health status improves to what they called good, have a circle of family or friends, stay married for a longer period of time, increase their income level, stabilize their emotional level by reducing stress related impediments, elevate their educational level, have more spiritual people, and have a precise number of children for prestige and pride. It is also consistent with the findings of Shek and Lee (2006: Abstract) which showed that parenting quality and parent-child relational quality in poor families were generally poorer than those of non-poor families and the differences were more pronounced in paternal parenting quality and father-child relational quality than in



maternal parenting quality and mother–child relational quality. Emotional quality of life of adolescents experiencing economic disadvantage was also found to be poorer than that of adolescents not experiencing economic disadvantage. However, no significant differences between the two groups were found for parental psychological control and parental control defined in terms of indigenous Chinese measures. In short, the present findings showed that in terms of family life quality defined in terms of perceived parenting quality and parent–child relational quality, the Poor Group and Non-Poor Group generally differed on both paternal variables and maternal variables (except psychological control, parental control defined in terms of indigenous Chinese concepts, and satisfaction with parental control) and the differences were consistently greater in the paternal variables than in the maternal variables.

3. The rubber farmers who have the different Monthly Average Income have expressed their opinions on Family Life Quality for overall and for each variable differently. The rubber farmers who have Monthly Average Income Lower than 10,000 Baht and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for overall stronger than More than 30,000 Baht. The rubber farmers who have Monthly Average Income Lower than 10,000 Baht, 10,001 – 20,000 Baht, and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for Health stronger than More than 30,000 Baht. The rubber farmers who have Monthly Average Income Lower than 10,000 Baht and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for Daily Family Life stronger than More than 30,000 Baht. This is consistent with the findings of Shek and Lee (2006: 13) which showed that participants in the Poor Group scored lower than participants in the Non-Poor Group in all Western measures of parental behavioral control, parent–child relational quality and emotional quality of life. For the significant interaction effects, the findings generally show that the differences between poor and non-poor adolescents on the paternal variables were greater than the related differences on maternal variables. This is also in line with the findings of Ondigi and Mugenda (2011: 7) which showed that the cross tabulation of overall quality of life and average household income was done to determine whether respondents with a higher income were satisfied with their quality of life. The results show that low income earners comprise the higher percentages of dissatisfied people



while high income earners comprising lesser percentages of the dissatisfied. The result indicates that the majority of high income earners were satisfied.

4. Implementing Sufficiency Economy Philosophy for Moderation is positively correlated with Family Life Quality for overall, Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being. The findings indicate that implementing sufficiency economy philosophy for moderation will help the rubber farmers economize their expenditure, focus on only necessary consumptions and decent living standard, balance their work life and personal life, and be proud to be the rubber farmers. Therefore, the rubber farmers will definitely have a high family life quality if they can implement sufficiency economy philosophy for moderation at strongly level. This is consistent with the findings of Poolsawat (2008: Abstract) which was found that the application of the Sufficiency Economy Philosophy with business management of Small and Medium Enterprises (SMEs) in Pathumthani Province was at a high level in the following respective aspects: moderation, reasonableness, the need for good immunity and moral principles. This is also consistent with the findings of Kittivongprateep (2007: Abstract) which were found that the employees who had different perception of sufficiency economy philosophy had different levels of quality of work life at significant level of .05 and the employees who had different perception of sufficiency economy philosophy had different levels of work happiness at significant level of .01.

5. Implementing Sufficiency Economy Philosophy for Reasonableness is positively correlated with Family Life Quality for overall, Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being. The findings illustrate that implementing sufficiency economy philosophy for reasonableness will help the rubber farmers make decisions wisely by considering all factors involved and careful anticipation of outcomes, make careful planning on monthly expenditure which does not make their family indebted and creates some savings for their family, use their own existing resources in the most efficient and effective way, prevent environmental problems such as pollution and makes this kind of agriculture to be acceptable in their community, and lead their lives based on consciousness about their own social context instead of imitating from the globalization trend. Therefore, the rubber farmers will definitely have a high family life quality if you



can implement sufficiency economy philosophy at strongly level. This is consistent with the findings of Ieamvijarn (2009: Abstract) which was found that most of the retailers in the provinces cluster number 12 of Thailand had knowledge and understood the sufficiency economy philosophy at a high level and they agreed at a high level with the application of sufficiency economy philosophy as a whole and each aspect.

6. Implementing Sufficiency Economy Philosophy for Self-Immunity is positively correlated with Family Life Quality for overall, Heath, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being. The findings indicate that implementing sufficiency economy philosophy for self-immunity will help the rubber farmers get ready to cope with changes causing from internal factors such as cost or labor change and changes causing from external factors such as economic or political change, build network among rubber farmers in their community which benefits everyone instead of competing each other for self-interest, do not underestimate any situation which might affect their rubber growing, and manage risks by estimating the likely impacts that might affect their living standard and try to find the best solution to cope with those risks. Therefore, the rubber farmers will definitely have a high family life quality if they can implement sufficiency economy philosophy at strongly level. This is consistent with the findings of Leungingkasut (2008: Abstract) which was found that the household accounting of people in the area of Nhong Pai sub-district, Muang district, UdonThani province have cognitive knowledge of the sufficiency economy philosophy at a high level and when considering of the cognitive knowledge level for each part, it was found that the parts of the environment conservation and the sustainable use of the natural resource, the increasing income, the reducing expense, the learning, and the saving and helping each other were at a high level.

Recommendation

1. Recommendations for Using the Research Results

1.1 The rubber farmers should emphasize on implementing sufficiency economy philosophy for moderation the most and then for reasonableness and self-immunity respectively to raise their family life quality. For Moderation, the rubber



farmers should pursue the decent living standard, try to economize daily expenditure, give priority to only basic needs instead of luxuries, be proud with the occupation they are doing, and balance their work life with personal life. For Reasonableness, the rubber farmers should make decision carefully by estimating all factors involved, make good financial planning, allocate the existing resources in the most effective way, create no environmental problems to the community, and live wisely and consistently with the social context independent from globalization trend. For Self-Immunity, the rubber farmers should be ready to cope with internal and external changes, build networks among rubber farmers, and manage risks efficiently.

1.2 The rubber farmers should emphasize on their family life quality for every variable. For Health, the rubber farmers should eat proper food, do regular exercise, and get good healthcare. For Environmental Well-Being, the rubber farmers should live in a suitable house, a good neighborhood, and good facilities and infrastructure. For Productivity, the rubber farmers should have good education and acquire new skills continually. For Daily Family Life, the rubber farmers should create good atmosphere and care and help each other in the family. For Family Interaction, the rubber farmers should accept, forgive, and support one another. And for Financial Well-Being, the rubber farmers should have some savings for future emergency and make investments.

1.3 The rubber farmers should enhance their level of implementing sufficiency economy philosophy and regard it as their main guideline for living and working because this will help them to raise their family life quality.

1.4 The rubber farmers should make assessment of their implementing sufficiency economy philosophy for every variable to know exactly what level they can accomplish and make improvement.

1.5 The rubber farmers should make assessment of their family life quality for every variable to know exactly what level they can accomplish and make improvement.



2. Recommendations for Future Research

2.1 The future research of relationships between implementing sufficiency economy philosophy and family life quality should be conducted at different target populations such as rice farmers, fishermen, teachers of primary school, teachers of high school, university's staffs, and many other occupations.

2.2 The future research should be conducted by determining other predictors that might have effects on family life quality so as to find out the real determinants of family life quality and obtain the most beneficial information and opinions.

2.3 Investigation should be conducted in the future research to find out the problems and obstacles that might affect implementing sufficiency economy philosophy and the solutions to those problems and obstacles should also be outlined.

2.4 Other methods of data collection should be conducted to obtain the correct data and opinions from the sample and get the most effective and efficient results.

2.5 Investigation of the sample's details should be conducted in the future research before the questionnaires were sent because the sample might move their house or the business might be bankrupt which are the serious problems for the questionnaire delivery.



CHAPTER V

CONCLUSION, DISCUSSION, AND RECOMMENDATION

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in their community which benefits everyone rather than competing each other for self-interest, they realize that being not underestimate any situation which might affect their rubber growing is important to their work performance, and they aim at managing risks by estimating the likely impacts that might affect their living standard and try to find the best solution to cope with those risks.

3. The rubber farmers have expressed their opinions on Family Life Quality for overall and for each variable at mostly agree level. For Health, the rubber farmers have strong physical health free from any illness and have enough energy to take care other members of your family, they have strong mental health, stable feeling, and fresh, cheerful, and joyful sentiment free from any stress, they are provided good health care in their area where they live, they eat proper and five-group nutritious food, and they do exercise regularly. For Environmental Well-Being, the rubber farmers live in a house which has enough space, fresh air, and safety, they attended a safety school which induced enthusiasm to access proper education, they work in a safety place which facilitates their working without any obstacle, they have good and friendly neighbors who are willing to help you at all time, and they live in a society where there is good infrastructure and facilities from the past until now. For Productivity, the rubber farmers could earn good income from their occupation, they have tried to develop the mself by continuous learning in order to acquire new skills at all time, they have obtained proper education that they expect that they will get suitable and high-paid job in the future, and they know how to balance between work and life and have enough leisure time to relax from their work. For Daily Family Life, the rubber farmers are initiative, creative, and know to create joyful atmosphere in the family all the time, they know to observe, follow, question, and worry one another all the time, they know how to help each other to do housework such as cooking, washing, and cleaning, and they feel intimacy and love with each other and know how to encourage and share the burdens together all the time. For Family Interaction, the rubber farmers know how to talk with each other and find solutions when the problems occur, they have chance to express their opinions and make decisions together in the family, they know how to accept, forgive, and support each other all the time, and they know how to get helps from and give helps to other members of the family. For Financial Well-Being, the rubber farmers have enough income to support family's expenditure all the time, they have savings to cope with



future needs and potential emergency cases, they have financial stability because of their careful planning associated with efficient use of their money both in consumption and investment, and they have good financial condition which could find happiness to them and their family.

4. The rubber farmers who have the different Experience of Rubber Growing, Numbers of Family Member, Size of Rubber Plantation, and Monthly Average Income have expressed their opinions on Implementing Sufficiency Economy Philosophy for overall and for each variable indifferently.

5. The rubber farmers who have Monthly Average Income Lower than 10,000 Baht and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for overall stronger than More than 30,000 Baht. The rubber farmers who have Monthly Average Income Lower than 10,000 Baht, 10,001 – 20,000 Baht, and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for Health stronger than More than 30,000 Baht. The rubber farmers who have Monthly Average Income Lower than 10,000 Baht and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for Daily Family Life stronger than More than 30,000 Baht.

The rubber farmers who have the different Experience of Rubber Growing, Numbers of Family Member, and Size of Rubber Plantation have expressed their opinions on Family Life Quality for overall and for each variable indifferently.

6. Implementing Sufficiency Economy Philosophy is positively correlated with Family Life Quality of rubber farmers in Buriram province and the variables that predicted Family Life Quality for overall (FLQ) are Moderation (SEM), Reasonableness (SER), and Self-Immunity (SES) as shown in the following equation:

$$FLQ = -0.473 + 0.385SEM + 0.361SER + 0.329SES$$

The following equations are the equations for predicting family life quality for each variable:

1. Health

$$FLH = -0.849 + 0.416SEM + 0.468SER + 0.292SES$$

2. Environmental Well-Being

$$FLE = 0.497 + 0.332SEM + 0.226SER + 0.302SES$$



3. Productivity

$$FLP = -1.027 + 0.545SEM + 0.545SER + 0.362SES$$

4. Daily Family Life

$$FLD = -0.733 + 0.384SEM + 0.388SER + 0.355SES$$

5. Family Interaction

$$FLI = 0.238 + 0.600SER + 0.311SES$$

6. Financial Well-Being

$$FLF = -0.624 + 0.550SEM + 0.530SES$$

Discussion

In the research of “Relationships between Implementing Sufficiency Economy Philosophy and Family Life Quality of Rubber Farmers in Buriram Province”, the researcher has discussed the results as follows:

1. The rubber farmers have expressed their opinions on Implementing Sufficiency Economy Philosophy for overall and for every variable which are Moderation, Reasonableness, and Self-Immunity at mostly agree level. Since now modern development and globalization have caused changes in all aspects of society, people must be competent to stay in this capitalized world. Implementing sufficiency economy philosophy is one of the best ways to live in current modern society because this will help people lead their lives at sufficiency level, have careful planning on their daily activities, and know how to cope with changes and manage risks efficiently. Significantly, people will be able to rely on themselves and conduct their lives and pursue their destiny with dignity. Therefore, implementing sufficiency economy philosophy is a new guideline for everyone to conduct their lives through middle path in order to have high family life quality. This is consistent with the finding of Kittivongprateep (2007: Abstract) which showed that the employees had the moderate level of perception of sufficiency economy philosophy, moderate level of quality of work life, and moderate level of work happiness. Quality of work life and work happiness had a meaningful correlation at significant level of .05. The employees who had different genders, ages, and salaries did not have different quality of work life. The employees who had different genders had different levels of work happiness at significant level of .05.



The employees who had different ages and salaries did not have different level of work happiness. The employees who had different perception of sufficiency economy philosophy had different levels of quality of work life at significant level of .05 and the employees who had different perception of sufficiency economy philosophy had different levels of work happiness at significant level of .05. It is also consistent with the findings of Poolsawat (2008 : Abstract) which showed that the application of the sufficiency economy philosophy with business management of small and medium enterprises (SMEs) in Pathumthani province was at a high level in the following respective aspects: moderation, reasonableness, the need for good immunity and moral principles. However, the application of the sufficiency economy philosophy in the aspect of knowledge was at a moderate level. Having studied business operation results of small and medium enterprises (SMEs) in Pathumthani province, it was following respective aspect: environmental capital and physical capital. However, business operation results in aspects of human capital and social capital were at a moderate level. Having compared between organization characters and business operation results of SMEs, it was found business operation results at the entrepreneurs with different knowledge of the sufficiency economy philosophy were also significantly different at the .05 level. In addition, the application of the sufficiency economy philosophy with business management significantly related to SMEs business operation results at .05 the level. It is also consistent with the findings of Leungingkasut (2008: Abstract) which showed that first, the cognitive knowledge of the sufficiency economy philosophy of people was at a high level. Considering of the cognitive knowledge level for each part, it was found that the parts of the environment conservation and the sustainable use of the natural resource, the increasing income, the reducing expense, the learning, the saving and helping each other were at a high level; second, the study of accounting of the people found that the samples did the accounts sometimes. When considering the questionnaire on each item, doing accounting of every income and expense announcing the monthly income and expense to the members of the households; training or receiving suggestions on doing households accounts doing accounting of households doing the accounts on your own, doing accounts by other members instead of you, participating in doing the accounts by other members, and following and supporting the work by, it was found that all items were answered at the moderate levels; third,



concerning the opinions of the people doing accounts, it was found that people agreed with doing the accounts but they were not sure with the aspects of there were many problems on doing the accounts and we can save money without doing the accounts; and fourth, this study found significant relationship between the cognitive knowledge of the sufficiency economy philosophy bestowed by His Majesty the King and the people doing households accounts. In general, it was found that the relationship coefficient was at 0.16 with the significant level of .01. Specifically, the cognitive knowledge of reducing expense and helping each other had significant relationship with doing the accounts at the level of 0.5, while the part of gaining income had significant relationship with doing the accounts at the level of .01. It is also consistent with the findings of Ieamvijarn (2009: Abstract) which showed that most of the retailers had knowledge and understood the philosophy of sufficiency economy at a moderate level. They agreed at a high level with the application of this philosophy as a whole and each aspect. The aspects were corporate analysis, marketing, finance, personnel, moral and social responsibility. The retailers who were different gender opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were different ages opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were different educational opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were utilizing different business models opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were of different types of business opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were of different investment schemes opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial,



personnel, moral and social responsibility showed no significant difference. The retailers who were of different durations of business operations agreed that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference. The retailers who were different gender opined that the application of the sufficiency economy philosophy as a whole and aspects related to corporate analysis, marketing, financial, personnel, moral and social responsibility showed no significant difference.

2. The rubber farmers have expressed their opinions on Family Life Quality for overall and for every variable which are Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being at mostly agree level. Since now family life quality is increasing important in modern society, every family should know how to make their lives happy. People should know how to look after their health by eating proper food, doing regular exercise, and getting good healthcare system. They should live in a good house, a safety neighborhood, and good infrastructure. They should also know how to create good atmosphere within their family by caring and helping each other all the time. Learning to accept, forgive, and support one another in the family is also a part of family happiness. Financial condition is one of the most important determinants of family life quality in our modern society. This is consistent with the findings of Brown et al. (2003: 226) which showed that: first, no significant correlations were found for opportunities or initiative in the health aspect. However, level of attainment of overall family health was positively related to the level of satisfaction with this attainment; second, for the financial well-being aspect, the only positive correlation was found between measures of attainment of financial well-being and satisfaction; third, a strong positive correlation between measures of attainment and satisfaction in the family relationships aspect suggests that engaging in activities designed to foster good family relationships and satisfaction with the resulting relationships go hand in hand; fourth, attainment and satisfaction were also positively correlated in the aspect of support from others indicating that family satisfaction with the support received from others was higher if families were getting the support that they wanted; fifth, the fact that satisfaction did not correlate with any of the other three measures, nor did they correlate with each other, suggests a complexity in



understanding the role of support services in the lives of these families. Lack of support, not knowing where to find services, and the short-term nature of services, though, were consistent complaints among all the families, and these may be factors that help to explain such complexity; sixth, a positive relationship between satisfaction and attainment and between satisfaction and initiative in the spiritual and cultural beliefs aspect suggests that the high levels of satisfaction are also related to high levels of attainment and seeking that attainment; seventh, an expected positive correlation was found between the level of attainment of education and careers and the level of satisfaction indicating that families who have attained a higher level of their own career and educational expectations are more satisfied than those whose attainment in this area is low; eighth, there was also a positive correlation between the level of enjoyment and leisure attained by the families and their satisfaction with this attainment, further indicating that when they carried out the activities they enjoyed doing so; and finally, only four families were dissatisfied with their family's level of contribution to community and civic affairs. Thirteen families were "neither satisfied nor dissatisfied", 14 were "satisfied", and one family was "very satisfied". In general, careers, spiritual and cultural beliefs, and family relationships were rated highly, while support from others and support from disability related services were rated quite low. It is also consistent with the findings of Ondigi and Mugenda (2011: Abstract) which showed that the majority of the respondents who were married, had more children, had more income, had high education level, were in good health status, who were more spiritual, indicated more satisfaction with their quality of life. Therefore, this study concluded that psychosocial factors attribute greatly to the satisfaction of quality of life among Kenyans of all walks of life. In essence, the majority of Kenyan people will be happier if their health status improves to what they called good, have a circle of family or friends, stay married for a longer period of time, increase their income level, stabilize their emotional level by reducing stress related impediments, elevate their educational level, have more spiritual people, and have a precise number of children for prestige and pride. It is also consistent with the findings of Shek and Lee (2006: Abstract) which showed that parenting quality and parent-child relational quality in poor families were generally poorer than those of non-poor families and the differences were more pronounced in paternal parenting quality and father-child relational quality than in



maternal parenting quality and mother–child relational quality. Emotional quality of life of adolescents experiencing economic disadvantage was also found to be poorer than that of adolescents not experiencing economic disadvantage. However, no significant differences between the two groups were found for parental psychological control and parental control defined in terms of indigenous Chinese measures. In short, the present findings showed that in terms of family life quality defined in terms of perceived parenting quality and parent–child relational quality, the Poor Group and Non-Poor Group generally differed on both paternal variables and maternal variables (except psychological control, parental control defined in terms of indigenous Chinese concepts, and satisfaction with parental control) and the differences were consistently greater in the paternal variables than in the maternal variables.

3. The rubber farmers who have the different Monthly Average Income have expressed their opinions on Family Life Quality for overall and for each variable differently. The rubber farmers who have Monthly Average Income Lower than 10,000 Baht and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for overall stronger than More than 30,000 Baht. The rubber farmers who have Monthly Average Income Lower than 10,000 Baht, 10,001 – 20,000 Baht, and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for Health stronger than More than 30,000 Baht. The rubber farmers who have Monthly Average Income Lower than 10,000 Baht and 20,001 – 30,000 Baht have expressed their opinions on Family Life Quality for Daily Family Life stronger than More than 30,000 Baht. This is consistent with the findings of Shek and Lee (2006: 13) which showed that participants in the Poor Group scored lower than participants in the Non-Poor Group in all Western measures of parental behavioral control, parent–child relational quality and emotional quality of life. For the significant interaction effects, the findings generally show that the differences between poor and non-poor adolescents on the paternal variables were greater than the related differences on maternal variables. This is also in line with the findings of Ondigi and Mugenda (2011: 7) which showed that the cross tabulation of overall quality of life and average household income was done to determine whether respondents with a higher income were satisfied with their quality of life. The results show that low income earners comprise the higher percentages of dissatisfied people



while high income earners comprising lesser percentages of the dissatisfied. The result indicates that the majority of high income earners were satisfied.

4. Implementing Sufficiency Economy Philosophy for Moderation is positively correlated with Family Life Quality for overall, Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being. The findings indicate that implementing sufficiency economy philosophy for moderation will help the rubber farmers economize their expenditure, focus on only necessary consumptions and decent living standard, balance their work life and personal life, and be proud to be the rubber farmers. Therefore, the rubber farmers will definitely have a high family life quality if they can implement sufficiency economy philosophy for moderation at strongly level. This is consistent with the findings of Poolsawat (2008: Abstract) which was found that the application of the Sufficiency Economy Philosophy with business management of Small and Medium Enterprises (SMEs) in Pathumthani Province was at a high level in the following respective aspects: moderation, reasonableness, the need for good immunity and moral principles. This is also consistent with the findings of Kittivongprateep (2007: Abstract) which were found that the employees who had different perception of sufficiency economy philosophy had different levels of quality of work life at significant level of .05 and the employees who had different perception of sufficiency economy philosophy had different levels of work happiness at significant level of .01.

5. Implementing Sufficiency Economy Philosophy for Reasonableness is positively correlated with Family Life Quality for overall, Health, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being. The findings illustrate that implementing sufficiency economy philosophy for reasonableness will help the rubber farmers make decisions wisely by considering all factors involved and careful anticipation of outcomes, make careful planning on monthly expenditure which does not make their family indebted and creates some savings for their family, use their own existing resources in the most efficient and effective way, prevent environmental problems such as pollution and makes this kind of agriculture to be acceptable in their community, and lead their lives based on consciousness about their own social context instead of imitating from the globalization trend. Therefore, the rubber farmers will definitely have a high family life quality if you



can implement sufficiency economy philosophy at strongly level. This is consistent with the findings of Ieamvijarn (2009: Abstract) which was found that most of the retailers in the provinces cluster number 12 of Thailand had knowledge and understood the sufficiency economy philosophy at a high level and they agreed at a high level with the application of sufficiency economy philosophy as a whole and each aspect.

6. Implementing Sufficiency Economy Philosophy for Self-Immunity is positively correlated with Family Life Quality for overall, Heath, Environmental Well-Being, Productivity, Daily Family Life, Family Interaction, and Financial Well-Being. The findings indicate that implementing sufficiency economy philosophy for self-immunity will help the rubber farmers get ready to cope with changes causing from internal factors such as cost or labor change and changes causing from external factors such as economic or political change, build network among rubber farmers in their community which benefits everyone instead of competing each other for self-interest, do not underestimate any situation which might affect their rubber growing, and manage risks by estimating the likely impacts that might affect their living standard and try to find the best solution to cope with those risks. Therefore, the rubber farmers will definitely have a high family life quality if they can implement sufficiency economy philosophy at strongly level. This is consistent with the findings of Leungingkasut (2008: Abstract) which was found that the household accounting of people in the area of Nhong Pai sub-district, Muang district, UdonThani province have cognitive knowledge of the sufficiency economy philosophy at a high level and when considering of the cognitive knowledge level for each part, it was found that the parts of the environment conservation and the sustainable use of the natural resource, the increasing income, the reducing expense, the learning, and the saving and helping each other were at a high level.

Recommendation

1. Recommendations for Using the Research Results

1.1 The rubber farmers should emphasize on implementing sufficiency economy philosophy for moderation the most and then for reasonableness and self-immunity respectively to raise their family life quality. For Moderation, the rubber



farmers should pursue the decent living standard, try to economize daily expenditure, give priority to only basic needs instead of luxuries, be proud with the occupation they are doing, and balance their work life with personal life. For Reasonableness, the rubber farmers should make decision carefully by estimating all factors involved, make good financial planning, allocate the existing resources in the most effective way, create no environmental problems to the community, and live wisely and consistently with the social context independent from globalization trend. For Self-Immunity, the rubber farmers should be ready to cope with internal and external changes, build networks among rubber farmers, and manage risks efficiently.

1.2 The rubber farmers should emphasize on their family life quality for every variable. For Health, the rubber farmers should eat proper food, do regular exercise, and get good healthcare. For Environmental Well-Being, the rubber farmers should live in a suitable house, a good neighborhood, and good facilities and infrastructure. For Productivity, the rubber farmers should have good education and acquire new skills continually. For Daily Family Life, the rubber farmers should create good atmosphere and care and help each other in the family. For Family Interaction, the rubber farmers should accept, forgive, and support one another. And for Financial Well-Being, the rubber farmers should have some savings for future emergency and make investments.

1.3 The rubber farmers should enhance their level of implementing sufficiency economy philosophy and regard it as their main guideline for living and working because this will help them to raise their family life quality.

1.4 The rubber farmers should make assessment of their implementing sufficiency economy philosophy for every variable to know exactly what level they can accomplish and make improvement.

1.5 The rubber farmers should make assessment of their family life quality for every variable to know exactly what level they can accomplish and make improvement.



2. Recommendations for Future Research

2.1 The future research of relationships between implementing sufficiency economy philosophy and family life quality should be conducted at different target populations such as rice farmers, fishermen, teachers of primary school, teachers of high school, university's staffs, and many other occupations.

2.2 The future research should be conducted by determining other predictors that might have effects on family life quality so as to find out the real determinants of family life quality and obtain the most beneficial information and opinions.

2.3 Investigation should be conducted in the future research to find out the problems and obstacles that might affect implementing sufficiency economy philosophy and the solutions to those problems and obstacles should also be outlined.

2.4 Other methods of data collection should be conducted to obtain the correct data and opinions from the sample and get the most effective and efficient results.

2.5 Investigation of the sample's details should be conducted in the future research before the questionnaires were sent because the sample might move their house or the business might be bankrupt which are the serious problems for the questionnaire delivery.



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independent variable of Implementing Sufficiency Economy Philosophy and dependent variable of Family Life Quality for Financial Well-Being (FLF) in the Table 46:

Table 46 Regression Analysis of Family Life Quality for Financial Well-Being of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy	Family Life Quality for Financial Well-Being		t	p-value
	Coefficient of Determination	Standard Error		
Constant (a)	-0.727	0.451	-1.613	0.108
Moderation (SEM)	0.474	0.104	4.569	0.000*
Reasonableness (SER)	0.264	0.144	1.837	0.068
Self-Immunity (SES)	0.368	0.135	2.718	0.007*

F = 39.557 p = 0.000 AdjR² = 0.361

* represents statistical significance at 5% level

According to the Table 46, Implementing Sufficiency Economy Philosophy for Moderation (SEM) and Self-Immunity (SES) is positively correlated with Family Life Quality for Financial Well-Being (FLF) at the statistically significant at the 5% level of significance. Therefore, we accept the hypotheses 1 and 3. However, Implementing Sufficiency Economy Philosophy for Reasonableness is not correlated with Family Life Quality for Financial Well-Being (FLF).

Then, the researcher took Implementing Sufficiency Economy Philosophy for Moderation (SEM) and Self-Immunity (SES) to build predicting equation of Family Life Quality for Financial Well-Being (FLF). The coefficient of adjusted forecasting equals to 0.353 (Table 54 in Appendix E) and the new equation is

$$FLF = -0.624 + 0.550SEM + 0.530SES$$



APPENDICES



Appendix A
Questionnaire of English Version



QUESTIONNAIRE

Research Topic: RELATIONSHIPS BETWEEN IMPLEMENTING SUFFICIENCY ECONOMY PHILOSOPHY AND FAMILY LIFE QUALITY OF RUBBER FARMERS IN BURIRAM PROVINCE

Instruction:

1. The questionnaire is divided into three sections as follows:
 - a. Section 1: General information of household heads of rubber farmers in Buriram province consisting of 8 questions
 - b. Section 2: Opinions on implementing sufficiency economy philosophy of rubber farmers in Buriram province consisting of 15 questions
 - c. Section 3: Opinions on family life quality of rubber farmers consisting of 26 questions
2. Please fill in the questionnaire completely and accurately so as to make this research valid and beneficial because your answers are very important to the data analysis.
3. Your data will be kept secretly and the research results will be presented on overall image only.
4. If you have any question concerning with this questionnaire, please contact Mr. Sochhath Ngo at the following address: Room 202, Karawet Dormitory of Mahasarakham University, T. Tlat, A. MuangMahasarakham 44000, or via mobile number: 082-498-9890 and Email: sochhath@gmail.com.

Sincerely yours,

Mr. Sochhath Ngo
Master of Business Economics
Mahasarakham Business School
Mahasarakham University



Section 1: General information of rubber farmers in Buriram province

Please tick (√) in the brackets on the correct answers for you

1. Sex

 Male Female

2. Age

 Less than 30 years old 30 – 40 years old 41 – 50 years old More than 50 years old

3. Status

 Single Married Separated Divorced

4. Educational Level

 Lower than High School High School Bachelor's Degree

5. Experience of Rubber Growing

 Less than 5 years 5 – 10 years 10 – 15 years More than 15 years

6. Numbers of Family Member

 Less than 4 members 4 – 5 members 6 – 7 members More than 7 members

5. Size of Rubber Plantation

 Less than 10 Rai 10 – 30 Rai 31 – 50 Rai More than 50 Rai

7. Monthly Average Income

 Lower than 10,000 Baht 10,000 – 20,000 Baht 20,000 – 30,000 Baht Higher than 30,000 Baht

Section 2: Opinions on implementing sufficiency economy philosophy of rubber farmers in Buriram province Please tick (√) in the blank on the suitable answers for you

Implementing Sufficiency Economy Philosophy	Level of Agreement				
	Strongly Agree	Mostly Agree	Somehow Agree	Slightly Disagree	Strongly Disagree
<u>Moderation</u>					
1. You aim at leading your life by sticking to sufficiency and economizing.					
2. You are confident that your family has earned enough income from rubber growing which makes your family proud to be the rubber farmers.					
3. You adhere that your main goal of rubber growing is to earn enough to have decent living standard not to emphasize on profit maximization.					
4. You adhere with only necessary consumption rather than luxurious and extravagant consumption.					
5. You understand that balancing your work and life is a good way to get real happiness.					
<u>Reasonableness</u>					
6. You realized that decision making concerning with all factors involved and careful anticipation of outcomes is important to your work performance.					



Implementing Sufficiency Economy Philosophy	Level of Agreement				
	Strongly Agree	Mostly Agree	Somehow Agree	Slightly Disagree	Strongly Disagree
7. You believe that careful planning on monthly expenditure does not make your family indebted and creates some savings for your family.					
8. You aim at rubber growing with careful planning on your own existing resources in the most efficient and effective way.					
9. You emphasize on rubber growing which does not cause any environmental problems such as pollution and makes this kind of agriculture to be acceptable in your community.					
10. You understand that leading life based on consciousness about your own social context is better than imitating from the globalization trend.					
<u>Self-Immunity</u> 11. You are confident that readiness for coping with any change causing from internal factors such as cost or labor change is important to your work performance.					
12. You believe that readiness for coping with any change causing from external factors such as economic or political change is important to your work performance.					



Implementing Sufficiency Economy Philosophy	Level of Agreement				
	Strongly Agree	Mostly Agree	Somehow Agree	Slightly Disagree	Strongly Disagree
13. You emphasize on network building among rubber farmers in your community which benefits everyone rather than competing each other for self-interest.					
14. You realize that being not underestimate any situation which might affect your rubber growing is important to your work performance.					
15. You aim at managing risks by estimating the likely impacts that might affect your living standard and try to find the best solution to cope with those risks.					



Section 3: Opinions on family life quality of rubber farmers in Buriram province

Please tick (√) in the blank on the suitable answers for you

Family Life Quality	Level of Agreement				
	Strongly Agree	Mostly Agree	Somehow Agree	Slightly Disagree	Strongly Disagree
<u>Health</u>					
1. You have strong physical health free from any illness and have enough energy to take care other members of your family.					
2. You have strong mental health, stable feeling, and fresh, cheerful, and joyful sentiment free from any stress.					
3. You are provided good health care in your area where you live.					
4. You eat proper and five-group nutritious food.					
5. You do exercise regularly.					
<u>Environmental Well-Being</u>					
6. You live in a house which has enough space, fresh air, and safety.					
7. You attended a safety school which induced enthusiasm to access proper education.					
8. You work in a safety place which facilitates working without any obstacle.					



Family Life Quality	Level of Agreement				
	Strongly Agree	Mostly Agree	Somehow Agree	Slightly Disagree	Strongly Disagree
9. You have good and friendly neighbors who are willing to help you at all time.					
10. You live in a society where there is good infrastructure and facilities from the past until now.					
<u>Productivity</u>					
11. You could earn good income from your occupation.					
12. You try to develop yourself by continuous learning in order to acquire new skills at all time.					
13. You obtain proper education that you expect that you will get suitable and high-paid job in the future.					
14. You know how to balance between work and life and have enough leisure time to relax from your work.					
<u>Daily Family Life</u>					
15. You are initiative, creative, and know to create joyful atmosphere in the family all the time.					
16. You know to observe, follow, question, and worry one another all the time.					



Family Life Quality	Level of Agreement				
	Strongly Agree	Mostly Agree	Somehow Agree	Slightly Disagree	Strongly Disagree
17. You know how to help each other to do housework such as cooking, washing, and cleaning.					
18. You feel intimacy and love with each other and know how to encourage and share the burdens together all the time.					
<u>Family Interaction</u>					
19. You know how to talk with each other and find solutions when the problems occur.					
20. You have chance to express your opinions and make decisions together in the family.					
21. You know how to accept, forgive, and support each other all the time.					
22. You know how to get helps from and give helps to other members of the family.					
<u>Financial Well-Being</u>					
23. You have enough income to support family's expenditure all the time.					
24. You have savings to cope with future needs and potential emergency cases.					



Family Life Quality	Level of Agreement				
	Strongly Agree	Mostly Agree	Somehow Agree	Slightly Disagree	Strongly Disagree
25. You have financial stability because of your careful planning associated with efficient use of your money both in consumption and investment.					
26. You have good financial condition which could find happiness to you and your family.					



Appendix B
Questionnaire of Thai Version



แบบสอบถาม
การวิจัยเรื่องความสัมพันธ์ระหว่างการประยุกต์ใช้ปรัชญาเศรษฐกิจพอเพียงกับ
คุณภาพชีวิตครอบครัวของเกษตรกรยางพาราในจังหวัดบุรีรัมย์

.....

คำชี้แจง

1. แบบสอบถามนี้แบ่งออกเป็น 3 ตอน ดังนี้
 ตอนที่ 1 ข้อมูลทั่วไปของเกษตรกรยางพาราในจังหวัดบุรีรัมย์ จำนวน 8 ข้อ
 ตอนที่ 2 ความคิดเห็นเกี่ยวกับการประยุกต์ใช้ปรัชญาเศรษฐกิจพอเพียงของเกษตรกรยางพาราในจังหวัดบุรีรัมย์ จำนวน 15 ข้อ
 ตอนที่ 3 ความคิดเห็นเกี่ยวกับคุณภาพชีวิตครอบครัวของเกษตรกรยางพาราในจังหวัดบุรีรัมย์ จำนวน 26 ข้อ
2. การตอบแบบสอบถามนี้ คำตอบของท่านมีความสำคัญอย่างยิ่งในการวิเคราะห์ข้อมูลในการวิจัย กรุณาตอบคำถามให้ครบทุกข้อ ทุกตอน เพื่อให้การวิจัยครั้งนี้มีความเที่ยงตรงและเกิดประโยชน์อย่างแท้จริง โปรดตอบแบบสอบถามตามความเป็นจริง
3. ข้อมูลที่ท่านตอบแบบสอบถามนี้จะถูกเก็บเป็นความลับ การนำเสนอผลการวิจัยจะนำเสนอในภาพรวมเท่านั้น
4. หากท่านมีข้อสงสัย หรือปัญหาประการใดเกี่ยวกับแบบสอบถามชุดนี้ โปรดติดต่อข้าพเจ้านายสุชาติ เภา ที่อยู่เลขที่ 202 หอพักการระเวก มหาวิทยาลัยมหาสารคาม ตำบลตลาด อำเภอเมือง จังหวัดมหาสารคาม 44000 หมายเลขโทรศัพท์ 082-498-9890 และ /หรือ Email: sochhath@gmail.com

ขอขอบพระคุณที่ให้ข้อมูลไว้ ณ โอกาสนี้

(นายสุชาติ เภา)

นิสิตปริญญาโท หลักสูตรเศรษฐศาสตรมหาบัณฑิต
 คณะการบัญชีและการจัดการ มหาวิทยาลัยมหาสารคาม



ตอนที่ 1 ข้อมูลทั่วไปของเกษตรกรยางพาราในจังหวัดบุรีรัมย์

กรุณาตอบคำถามต่อไปนี้ โดยทำเครื่องหมาย (✓) ลงในช่องว่างหน้าข้อความตามความเป็นจริง

1. เพศ

() ชาย () หญิง

2. อายุ

() น้อยกว่า 30 ปี () 30 – 40 ปี
() 41 – 50 ปี () มากกว่า 50 ปี

3. สถานภาพ

() โสด () สมรส
() แยกกันอยู่ () หม้าย / หย่าร้าง

4. ระดับการศึกษา

() ต่ำกว่ามัธยมศึกษาตอนปลาย () มัธยมศึกษาตอนปลาย
() ปริญญาตรี

5. ประสบการณ์ในการทำสวนยางพารา

() น้อยกว่า 5 ปี () 5 – 10 ปี
() 11 – 15 ปี () มากกว่า 15 ปี

6. จำนวนสมาชิกในครอบครัว

() น้อยกว่า 4 คน () 4 – 5 คน
() 6 – 7 คน () มากกว่า 7 คน

7. ขนาดของสวนยางพารา

() น้อยกว่า 10 ไร่ () 10 – 30 ไร่
() 31 – 50 ไร่ () มากกว่า 50 ไร่

8. รายได้เฉลี่ยต่อเดือน

() ต่ำกว่า 10,000 บาท () 10,000 – 20,000 บาท
() 20,001 – 30,000 บาท () มากกว่า 30,000 บาท



ตอนที่ 2 ความคิดเห็นเกี่ยวกับการประยุกต์ใช้ปรัชญาเศรษฐกิจพอเพียงของเกษตรกร
 ยางพาราในจังหวัดบุรีรัมย์
 กรุณาตอบคำถามต่อไปนี้ โดยทำเครื่องหมาย (✓) ตามความเป็นจริง

การประยุกต์ใช้ปรัชญาเศรษฐกิจพอเพียง	ระดับความคิดเห็น				
	มากที่สุด	มาก	ปานกลาง	น้อย	น้อยที่สุด
ด้านความพอประมาณ 1. ท่านมุ่งมั่นในการดำเนินชีวิตโดยยึดหลักกับความพอเพียงและความประหยัด เป็นสิ่งที่มีความสำคัญต่อชีวิตครอบครัวของท่าน					
2. ท่านเชื่อมั่นว่าครอบครัวมีรายได้เพียงพอจากการปลูกยางพารา ซึ่งส่งผลให้ครอบครัวมีความพึงพอใจในอาชีพเกษตรกร					
3. ท่านยึดมั่นเสมอว่าความเป็นอยู่ที่เหมาะสมเป็นเป้าหมายหลักในการปลูกยางพารา ไม่ใช่การมุ่งเน้นกำไรเพื่อความร่ำรวย					
4. ท่านยึดมั่นกับการบริโภค และการใช้สิ่งของที่จำเป็นต่อความต้องการพื้นฐานของครอบครัวมากกว่าการใช้สิ่งของที่หรูหรา สิ้นเปลือง					
5. ท่านเข้าใจดีว่าการรู้จักใช้ชีวิตให้สมดุลระหว่างชีวิตการทำงาน และชีวิตส่วนตัว เป็นแนวทางที่ดีที่สามารถนำไปสู่ความสุขที่แท้จริงได้					



ตอนที่ 2 (ต่อ)

การประยุกต์ใช้ปรัชญาเศรษฐกิจพอเพียง	ระดับความคิดเห็น				
	มากที่สุด	มาก	ปานกลาง	น้อย	น้อยที่สุด
ด้านความมีเหตุผล 6. ท่านตระหนักดีว่าการตัดสินใจโดยคำนึงถึงทุกปัจจัยที่เกี่ยวข้องและการคาดการณ์ผลที่ได้รับอย่างระมัดระวัง เป็นสิ่งที่มีความสำคัญต่อผลการดำเนินงาน					
7. ท่านเชื่อว่าการวางแผนการใช้จ่ายรายเดือนในครอบครัวอย่างรอบคอบ ทำให้ไม่เกิดหนี้สินหรือการใช้จ่ายที่ทับซ้อน และมีเงินเหลือใช้อย่างเพียงพอ					
8. ท่านมุ่งมั่นในการปลูกยางพารา โดยมีการวางแผนอย่างรอบคอบเกี่ยวกับการใช้ทรัพยากรที่มีอยู่ เพื่อให้เกิดประสิทธิภาพ และประโยชน์สูงสุด					
9. ท่านให้ความสำคัญกับการปลูกยางพาราที่ไม่ก่อให้เกิดปัญหาสิ่งแวดล้อมใดๆ เช่น มลพิษต่างๆ ในชุมชน ซึ่งส่งผลให้สามารถทำการเกษตรดังกล่าว อยู่ในสังคมได้เป็นอย่างดี					
10. ท่านเข้าใจดีว่าการดำเนินชีวิตบนพื้นฐานการมีสติ อยู่เสมอ โดยคำนึงถึงบริบทสังคมของตนเองเป็นหลัก ดีกว่าการหลงไหลตามกระแสของโลกาภิวัตน์					



ตอนที่ 2 (ต่อ)

การประยุกต์ใช้ปรัชญาเศรษฐกิจพอเพียง	ระดับความคิดเห็น				
	มากที่สุด	มาก	ปานกลาง	น้อย	น้อยที่สุด
ด้านการมีภูมิคุ้มกันที่ดี					
11. ท่านเชื่อมั่นว่าการเตรียมความพร้อมในการรับมือกับการเปลี่ยนแปลงต่างๆ ที่เกิดขึ้นจากปัจจัยภายใน เช่น การเปลี่ยนแปลงทางด้านต้นทุน หรือด้านแรงงาน เป็นสิ่งที่มีความสำคัญต่อผลการดำเนินงาน					
12. ท่านเชื่อว่าการเตรียมความพร้อมในการรับมือกับการเปลี่ยนแปลงต่างๆ ที่เกิดขึ้นจากปัจจัยภายนอก เช่น การเปลี่ยนแปลงทางการเมือง หรือด้านเศรษฐกิจ เป็นสิ่งที่มีความสำคัญต่อผลการดำเนินงาน					
13. ท่านให้ความสำคัญกับการสร้างเครือข่ายระหว่างเกษตรกรยางพาราในชุมชนเดียวกัน ซึ่งก่อให้เกิดประโยชน์โดยรวมมากกว่าการแข่งขันกัน เพื่อผลประโยชน์ของตนเองเพียงอย่างเดียว					
14. ท่านตระหนักดีว่าการไม่ประมาทต่อสถานการณ์ต่างๆ ที่อาจจะส่งผลกระทบต่อความปลอดภัยของยางพารา เป็นสิ่งที่มีความสำคัญต่อผลการดำเนินงาน					
15. ท่านมุ่งมั่นในการจัดการกับความเสี่ยงต่างๆ โดยทำการประเมินเกี่ยวกับผลกระทบที่อาจจะเกิดขึ้น ซึ่งส่งผลเสียหายต่อความเป็นอยู่ของครอบครัว และพยายามหาวิธีแก้ไขปัญหาคriticalที่สุด เพื่อรับมือกับความเสียดังกล่าวนั้นอยู่เสมอ					



ตอนที่ 3 ความคิดเห็นเกี่ยวกับคุณภาพชีวิตครอบครัวของเกษตรกรยางพาราในจังหวัดบุรีรัมย์
กรุณาตอบคำถามต่อไปนี้ โดยทำเครื่องหมาย (✓) ตามความเป็นจริง

คุณภาพชีวิตครอบครัว	ระดับความคิดเห็น				
	มากที่สุด	มาก	ปานกลาง	น้อย	น้อยที่สุด
ด้านสุขภาพ					
1. ท่านมีสุขภาพทางกายแข็งแรง ปราศจากโรคภัยไข้เจ็บต่างๆ และมีพลังงานเหลือเฟือในการดูแลสมาชิกครอบครัวคนอื่นได้เป็นอย่างดี					
2. ท่านมีสุขภาพทางจิตใจดี แข็งแรง อารมณ์มั่นคง มีความรู้สึกสดชื่น ร่าเริง สนุกสนาน อยู่เสมอ โดยปราศจากความเครียดต่างๆ ได้					
3. ท่านได้รับการดูแลทางการแพทย์ที่มีคุณภาพ เป็นอย่างดีในพื้นที่ที่ท่านอาศัยอยู่					
4. ท่านได้รับประทานอาหารครบตามหลัก 5 หมู่ของหลักโภชนาการอย่างถูกต้อง					
5. ท่านได้ทำการออกกำลังกายอย่างสม่ำเสมอ					
ด้านสภาพแวดล้อม					
6. ท่านอาศัยอยู่ในบ้านที่มีพื้นที่ใช้สอยอย่างเพียงพอ มีอากาศบริสุทธิ์ และมีความปลอดภัยดี					
7. ท่านได้เข้าโรงเรียนที่มีความปลอดภัยและมีการส่งเสริมให้เกิดความกระตือรือร้นในการได้รับการศึกษาที่ดี					
8. ท่านได้ทำงานในสถานที่ที่มีความปลอดภัย และเอื้อในการทำงานอย่างไม่มีอุปสรรคใดๆ					
9. ท่านมีเพื่อนบ้านที่ดีที่เอื้อเฟื้อเผื่อแผ่ เป็นมิตร และพร้อมช่วยเหลือท่านอยู่ตลอดเวลา					
10. ท่านอยู่อาศัยในสังคมที่มีสาธารณูปโภค และการอำนวยความสะดวกที่ดี จากอดีตจนถึงปัจจุบัน					



ตอนที่ 3 (ต่อ)

คุณภาพชีวิตครอบครัว	ระดับความคิดเห็น				
	มากที่สุด	มาก	ปานกลาง	น้อย	น้อยที่สุด
ด้านผลิตภาพ					
11. ท่านสามารถสร้างรายได้ที่ดีพอ จากงานอาชีพที่ตัวเองกำลังทำอยู่					
12. ท่านได้พยายามพัฒนาตนเอง โดยการศึกษาเรียนรู้เพิ่มเติมอย่างต่อเนื่อง เพื่อเพิ่มทักษะให้กับตัวเองตลอดเวลา					
13. ท่านได้รับการศึกษาอย่างเพียงพอ ซึ่งคาดหวังว่าจะได้รับงานอาชีพและรายได้ที่ดีในอนาคต					
14. ท่านรู้จักใช้ชีวิตทำงานและชีวิตครอบครัว อย่างสมดุลกัน โดยมีเวลาพักผ่อนหย่อนใจอย่างเพียงพอ จากการทำงาน					
ด้านชีวิตประจำวันของครอบครัว					
15. ท่านรู้จักริเริ่ม สร้างสรรค์ และสร้างบรรยากาศ สนุกสนานให้เกิดขึ้นภายในครอบครัวอยู่ตลอดเวลา					
16. ท่านรู้จักสังเกต ติดตาม ถาม และ แสดงความห่วงใยซึ่งกันและกันอยู่เสมอ					
17. ท่านรู้จักช่วยเหลือกันในการทำกิจกรรมบ้านต่างๆ เช่น ทำอาหาร ซักผ้า และทำความสะอาดบ้าน เป็นต้น					
18. ท่านมีความรู้สึกสนิทสนมกัน รักกัน รู้จักให้ กำลังใจและแบ่งภาระกันเป็นประจำ					



ตอนที่ 3 (ต่อ)

คุณภาพชีวิตครอบครัว	ระดับความคิดเห็น				
	มากที่สุด	มาก	ปานกลาง	น้อย	น้อยที่สุด
ด้านความสัมพันธ์ในครอบครัว					
19. ท่านรู้จักพูดคุยปรึกษาหารือกัน และหาวิธีแก้ปัญหาอยู่เสมอ เมื่อมีปัญหาใดๆ เกิดขึ้น					
20. ท่านได้มีโอกาสในการแสดงความคิดเห็น และตัดสินใจต่างๆ ร่วมกันภายในครอบครัวได้เป็นอย่างดี					
21. ท่านรู้จักยอมรับกัน ให้อภัยซึ่งกันและกัน และสนับสนุนกันอยู่ตลอดเวลา					
22. ท่านรู้จักขอความช่วยเหลือจากสมาชิกอื่น และรู้จักให้ความช่วยเหลือแก่สมาชิกอื่นเช่นกัน					
ด้านการเงิน					
23. ท่านมีรายได้เพียงพอสำหรับการใช้จ่ายต่างๆ ภายในครอบครัวเป็นประจำ					
24. ท่านมีเงินเก็บเพื่อรับมือกับความต้องการ หรือเหตุฉุกเฉินที่อาจจะเกิดขึ้นในอนาคตได้เป็นอย่างดี					
25. ท่านมีความมั่นคงทางการเงิน โดยได้วางแผนอย่างรอบคอบเกี่ยวกับการใช้เงินอย่างมีประสิทธิภาพ ไม่ว่าจะเป็นการใช้เงินเพื่อใช้จ่าย หรือ การใช้เงินเพื่อการลงทุน					
26. ท่านมีสภาพทางการเงินในปัจจุบัน ซึ่งสามารถแสวงหาความสุขให้กับท่าน และครอบครัวได้ตามสมควร					



Appendix C
Quality of Instrument



Table 47 Discriminant Power and Reliability of the Questionnaire

Variables and Items	Discriminant Power (r)	Reliability
1. Implementing Sufficiency Economy Philosophy		
1.1 Moderation		
1	0.839	
2	0.782	
3	0.822	
4	0.657	
5	0.660	
Total		0.807
1.2 Reasonableness		
6	0.671	
7	0.728	
8	0.789	
9	0.657	
10	0.711	
Total		0.757
1.3 Self-Immunity		
11	0.616	
12	0.661	
13	0.808	
14	0.776	
15	0.737	
Total		0.771



Table 47 (Continued)

Variables and Items	Discriminant Power (r)	Reliability
2. Family Life Quality		
2.1 Health		
1	0.875	
2	0.835	
3	0.887	
4	0.854	
5	0.844	
Total		0.909
2.2 Environmental Well-Being		
6	0.594	
7	0.814	
8	0.796	
9	0.783	
10	0.806	
Total		0.818
2.3 Productivity		
11	0.721	
12	0.792	
13	0.791	
14	0.845	
Total		0.899
2.4 Daily Family Life		
15	0.790	
16	0.794	
17	0.782	
18	0.763	
Total		0.889



Table 47 (Continued)

Variables and Items	Discriminant Power (r)	Reliability
2.5 Family Interaction		
19	0.753	
20	0.675	
21	0.643	
22	0.736	
Total		0.858
2.6 Financial Well-Being		
23	0.776	
24	0.796	
25	0.776	
26	0.859	
Total		0.917



Appendix D
Pairwise Comparison of Mean Difference



Table 48 Comparison of Opinions on Family Life Quality for Each Variable of the Rubber Farmers in Buriram Province Who Have the Different Experience of Rubber Growing

Univariate Tests						
Dependent Variable		SS	df	Ms	F	p
1. Health	Contrast	4.094	3	1.365	2.559	0.056
	Error	107.725	202	0.533		
2. Environmental Well-Being	Contrast	3.275	3	1.092	2.837	0.039
	Error	77.730	202	0.385		
3. Productivity	Contrast	3.616	3	1.205	1.959	0.121
	Error	124.281	202	0.615		
4. Daily Family Life	Contrast	2.975	3	0.992	1.518	0.211
	Error	131.915	202	0.653		
5. Family Interaction	Contrast	3.697	3	1.232	2.332	0.075
	Error	106.753	202	0.528		
6. Financial Well-Being	Contrast	3.678	3	1.226	1.737	0.161
	Error	142.540	202	0.706		

* represents statistical significance at 0.8% level

Table 49 Pairwise Comparison of Mean Difference of Family Life Quality for Overall of the Rubber Farmers in Buriram Province Who Have the Different Monthly Average Income

Monthly Average Income		More than 30,000 Baht	10,000 – 20,000 Baht	20,001 – 30,000 Baht	Lower than 10,000 Baht
	X	4.03	4.29	4.34	4.46
More than 30,000 Baht	4.03	-	0.023*	0.006*	0.004*
10,000 – 20,000 Baht	4.29		-	0.712	0.289
20,001 – 30,000 Baht	4.34			-	0.433
Lower than 10,000 Baht	4.46				-

* represents statistical significance at 5% level



Table 50 Comparison of Opinions on Family Life Quality for Each Variable of the Rubber Farmers in Buriram Province Who Have the Different Monthly Average Income

Univariate Tests						
Dependent Variable		SS	df	MS	F	p
1. Health	Contrast	10.068	3	3.356	6.662	0.000*
	Error	101.751	202	0.504		
2. Environmental Well-Being	Contrast	4.247	3	1.416	3.725	0.012
	Error	76.758	202	0.380		
3. Productivity	Contrast	5.930	3	1.977	3.273	0.022
	Error	121.968	202	0.604		
4. Daily Family Life	Contrast	8.630	3	2.877	4.603	0.004*
	Error	126.259	202	0.625		
5. Family Interaction	Contrast	2.015	3	0.672	1.251	0.292
	Error	108.435	202	0.537		
6. Financial Well-Being	Contrast	3.648	3	1.216	1.723	0.163
	Error	142.570	202	0.706		

* represents statistical significance at 0.8% level



Table 51 Pairwise Comparison of Mean Difference of Family Life Quality for Health of the Rubber Farmers in Buriram Province Who Have the Different Monthly Average Income

Monthly Average Income		More than 30,000 Baht	20,001 – 30,000 Baht	10,000 – 20,000 Baht	Lower than 10,000 Baht
	X	4.01	4.39	4.42	4.64
More than 30,000 Baht	4.01	-	0.003*	0.002*	0.000*
20,001 – 30,000 Baht	4.39		-	0.844	0.154
10,000 – 20,000 Baht	4.42			-	0.213
Lower than 10,000 Baht	4.64				-

* represents statistical significance at 0.8% level

Table 52 Pairwise Comparison of Mean Difference of Family Life Quality for Daily Family Life of the Rubber Farmers in Buriram Province Who Have the Different Monthly Average Income

Monthly Average Income		More than 30,000 Baht	10,000 – 20,000 Baht	20,001 – 30,000 Baht	Lower than 10,000 Baht
	X	3.93	4.25	4.37	4.46
More than 30,000 Baht	3.93	-	0.029	0.002*	0.005*
10,000 – 20,000 Baht	4.25		-	0.432	0.289
20,001 – 30,000 Baht	4.37			-	0.663
Lower than 10,000 Baht	4.46				-

* represents statistical significance at 0.8% level



Appendix E
Multiple Regression Analysis



Table 53 Multiple Regression Analysis of Implementing Sufficiency Economy Philosophy and Family Life Quality for Family Interaction of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy	Family Life Quality for Family Interaction		t	p-value
	Coefficient of Determination	Standard Error		
Constant (a)	0.238	0.361	0.659	0.511
Reasonableness (SER)	0.600	0.113	5.312	0.000*
Self-Immunity (SES)	0.311	0.116	2.685	0.008*
F = 63.460 p = 0.000 AdjR ² = 0.379				

Table 54 Multiple Regression Analysis of Implementing Sufficiency Economy Philosophy and Family Life Quality for Financial Well-Being of Rubber Farmers in Buriram Province

Implementing Sufficiency Economy Philosophy	Family Life Quality for Financial Well-Being		t	p-value
	Coefficient of Determination	Standard Error		
Constant (a)	-0.624	0.450	-1.387	0.167
Moderation (SEM)	0.550	0.096	5.752	0.000*
Self-Immunity (SES)	0.530	0.104	5.118	0.000*
F = 56.983 p = 0.000 AdjR ² = 0.353				



Appendix F
Cover Letter





ที่ ศธ 0530.10/4.4.26

คณะกรรมการบัญชีและการจัดการ
มหาวิทยาลัยมหาสารคาม
อำเภอกันทรวิชัย
จังหวัดมหาสารคาม
44150

13 กันยายน 2556

เรื่อง ขอความอนุเคราะห์กรอกแบบสอบถาม

เรียน เกษตรกรผู้ปลูกยางพาราในเขตจังหวัดบุรีรัมย์

ด้วย นายสุชาติ เภา นิสิตระดับปริญญาโท คณะการบัญชีและการจัดการ มหาวิทยาลัยมหาสารคาม กำลังศึกษาและทำวิทยานิพนธ์ เรื่อง "ความสัมพันธ์ระหว่างการประยุกต์ใช้ปรัชญาเศรษฐกิจพอเพียงกับคุณภาพชีวิตครอบครัวของเกษตรกรยางพาราในจังหวัดบุรีรัมย์" ซึ่งเป็นส่วนหนึ่งของการจัดทำวิทยานิพนธ์ หลักสูตรเศรษฐศาสตรมหาบัณฑิต (ศ.ม.) และในการศึกษาครั้งนี้ได้เน้นให้นักศึกษาข้อมูลด้วยตนเอง ดังนั้นเพื่อให้การจัดทำวิทยานิพนธ์เป็นไปด้วยความเรียบร้อยและบรรลุวัตถุประสงค์ คณะการบัญชีและการจัดการ มหาวิทยาลัยมหาสารคาม จึงใคร่ขออนุญาตให้ นายสุชาติ เภา ได้ศึกษาและเก็บรวบรวมในรายละเอียดตามแบบสอบถามที่แนบมาพร้อมนี้

คณะกรรมการบัญชีและการจัดการ มหาวิทยาลัยมหาสารคาม หวังเป็นอย่างยิ่งว่าจะได้รับความอนุเคราะห์จากท่านในการให้ข้อมูลในครั้งนี้เป็นอย่างยิ่ง และขอขอบคุณมา ณ โอกาสนี้

ขอแสดงความนับถือ

(อาจารย์ธีระพล ศิริบุษยา)

รองคณบดีฝ่ายพัฒนานิสิตและอาคารสถานที่ รักษาการแทน

คณบดีคณะการบัญชีและการจัดการ

มหาวิทยาลัยมหาสารคาม

คณะกรรมการบัญชีและการจัดการ งานบัณฑิตศึกษา

โทรศัพท์ (043) 754333 ต่อ 3410



Appendix G
Expert Letter





บันทึกข้อความ

หน่วยงาน คณะการบัญชีและการจัดการ มหาวิทยาลัยมหาสารคาม โทรศัพท์ 043-754333-3431 Fax 043-754422

ที่ ศธ.0530.10/

วันที่ 13 สิงหาคม 2556

เรื่อง ขอเรียนเชิญเป็นผู้เชี่ยวชาญตรวจสอบเครื่องมือวิจัย

เรียน รองศาสตราจารย์ ดร.ปทุภักข์ อุตสาหกรรมกิจ

ด้วย นายสุชาติ เภา นิสิตระดับปริญญาโท หลักสูตรเศรษฐศาสตรมหาบัณฑิต (ศ.ม.) คณะการบัญชีและการจัดการ มหาวิทยาลัยมหาสารคาม กำลังศึกษาวิทยานิพนธ์ เรื่อง “ความสัมพันธ์ระหว่างการประยุกต์ใช้ปรัชญาเศรษฐกิจพอเพียงกับคุณภาพชีวิตครอบครัวของเกษตรกรรายพาราในจังหวัดบุรีรัมย์” ซึ่งเป็นส่วนหนึ่งของการศึกษาตามหลักสูตรเศรษฐศาสตรมหาบัณฑิต ดังนั้นเพื่อให้การดำเนินการเป็นไปด้วยความเรียบร้อยและบรรลุตามวัตถุประสงค์ คณะการบัญชีและการจัดการ มหาวิทยาลัยมหาสารคาม จึงใคร่ขอความอนุเคราะห์จากท่านเป็นผู้เชี่ยวชาญตรวจสอบเครื่องมือวิจัยและข้อเสนอแนะเพื่อนำข้อมูลที่ได้ไปดำเนินการทำวิทยานิพนธ์ต่อไปตามเอกสารแนบท้าย

จึงเรียนมาเพื่อโปรดพิจารณา

(ผู้ช่วยศาสตราจารย์ ดร.การณีย์ ประทุม)

รองคณบดีฝ่ายบัณฑิตศึกษาและวิจัย

รองศาสตราจารย์ ดร.ปทุภักข์ อุตสาหกรรมกิจ

คณบดีคณะการบัญชีและการจัดการ

มหาวิทยาลัยมหาสารคาม

13 ส.ค. 2556



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