

QUALITY OF LIFE AMONG THAI OLDER PERSONS: A SITUATIONAL ANALYSIS OF CHAI NAT PROVINCE IN CENTRAL REGION OF THAILAND

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Abstract

The ultimate goal of strategic plan in Chai Nat Province is to improve quality of life among Thai older persons. Chai Nat Province as agriculture community is approaching aged society before other provinces in Thailand. The increasing number of aging population is very challenging for Thai government and its alliance to enhance the life quality of this population and the sustainable development of the country. The objective of this descriptive research was to study quality of life among Thai older persons in Chai Nat Province, central region of Thailand. The samples comprised of 628 Thai older persons who were randomly selected from all 8 districts area of Chai Nat province using multi-stage sampling method. Data were collected using demographic data form and the World Health Organization Quality of Life Scale for Thai versions (WHOQOL-BREF-THAI). Percentage, mean, standard deviation, independence t-test and F-test were used for data analysis.

The results of the study revealed that the overall quality of life among Thai older persons in Chai Nat Province was at moderate level (mean = 93.72, S.D. = 13.92). Regarding the dimension of quality of life, physical, psychological, and social relation were at moderate level (mean = 24.57, 21.55, 10.63, S.D. = 3.86, 3.52, 2.30 respectively). Whereas the environmental dimension was at high level (mean = 29.67, S.D. = 4.95). When comparing the quality of life by age (early age, middle age, old age), gender, educational level (non-educated and educated), income (sufficiency and insufficiency) and living area (urban, semi-rural, rural), it was found that the overall quality of life of Thai older persons were significantly different by age and living areas. Thai older persons living in semi-rural community had higher level of quality of life than those living in urban and rural

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community. However, the quality of life of Thai older persons was not significantly different by gender, educational level (non-educated and educated), income (sufficiency and insufficiency).

The results of this study suggested that the quality of life among Thai older persons, especially the dimension of physical, psychological, and social relation should be enhanced. The older persons who lived in rural and urban community should be priority for quality of life improvement implementation.

Key word: Quality of Life, Thai Older Persons, Chainat province

INTRODUCTION

Demographic trend is a major risk and challenge affecting the quality of life among the older persons. The structure of older persons population is completely changed over a period of 15 - 20 years. Currently, Thailand is suffering among the most rapid rates of population ageing in the developing world. An increase in Thai older population has been concerned that it will affect many sectors especially in the impact of the social and public health sectors. Patterns of health and illness of aging people have been transformed into chronic diseases requiring increased long-term care. This affects their quality of life and limitation of daily living in society.

Thailand has undergone rapid change in its aging society since the beginning of 2007, especially in Chai Nat Province completely faced with the effects of high attendance, starting in 2018. Chi Nat Province has the fastest aging population in Thailand, and there has been an annual upward trend in older persons people relating to the national trend. The population of the elder in Chai Nat was 26,406 males and 35,615 females, in total 66,574 persons (data on March 20th, 2017). An average of the older persons in Chai Nat is annually growth, and the older persons index has risen. The majority of Thai older persons have lived in District of Muang, Sankhaburi and Sapphaya respectively. Most of them are between 60 and 70 years old. Those people still have the potential to work and participate in social activities (Chainat Social Development and Human Security Provincial Office, 2017).

The numerous literature reviews related to the studies of the life quality among Thai older people in many provinces in the central region of Thailand illustrated that the quality of life Thai older persons was at the moderate to high level. The study conducted by Kwanarat Sutthirakul et.al (2016) showed that the older persons living in five regions of Thailand including: in the Central region (Chonburi and Suphan Buri Provinces), the North region (Chiang Mai and Nakhon Sawan Provinces), the Northeastern region (Nakhon Ratchasima and Khon Kaen Provinces), the Southern region (Nakhon Si Thammarat and Songkhla Provinces), Bangkok and Nonthaburi Province also had moderate level of overall quality of life (83.5%). Studies in Phra Nakhon Si Ayutthaya (Sodsong, 2018) and Lop Buri (Sa-ngiam&Wichaingoen, 2018) found that the older persons had moderate level of overall quality of life. A study of Thai older person's quality of life living in 10 Provinces consisting of Bangkok, Chainat, Nonthaburi, Pathum Thani, Ayutthaya, Lopburi, Saraburi, Singburi, Angthong and Suphan Buri that found was in the high level (Ngammeerith et al., 2018).

The present study found that the quality of life among Thai older persons in Chai Nat province had been conducted in some areas such as Tambol Nong Noi, Wat Sing District. This study illustrated that their quality of life, overall and other four parts, was at the high level (Thanwa Buamee, 2016). Nevertheless, data on the quality of life of Thai older persons in other provincial areas and in different communities are still insufficient to bring about proper planning for the quality of life in the context of the real situation.

However, finding a way to improve the quality of life of the older persons is an important goal of measuring good values of self-esteem, family, community, society among them. This is to provide the older persons with the honor and dignity of the family, community, society and nation (Chainat Social Development and Human Security Provincial Office, 2017). The older persons in Chai Nat also need to be promoted from families, communities, government agencies and private organizations treating them with dignity and prestige. The results of the study will be used for determining the appropriate performance in the context in order to improve older persons quality of life and strengthen potential elder in local Chai Nat Province.

RESEARCH OBJECTIVES

The main purposes of this study to better understand the quality of life among Thai older persons are:

1. To study the level of overall quality of life and subdimensions including the level of physical, mental, social relationship, and spiritual health among Thai older persons in Chai Nat Province
2. To compare the level of overall quality of life among Thai older persons in Chai Nat province by age, gender, education level, income and living areas.
- 3.

RESEARCH QUESTIONS

1. What are the overall and individual parts of quality of life among the older persons in all areas of Chai Nat Province?
2. What are the different of overall of quality of life among the older persons in Chai Nat Province by age, gender, education level, income and living areas?

SCOPE OF THE RESEARCH

This cross-sectional study was conducted with 628 Thai older persons aged 60 years old and above, who lived communities at eight districts of Chai Nat Province, Thailand. The data were collected during May 15 to August 31, 2018.

RESEARCH FRAMEWORK

The World Health Organization (WHO) quality of life was adopted as the research framework. The quality of life means life satisfaction which is the personal perceptions related to well-being, feeling the peace of life, happiness and satisfaction in life, physical, mental, emotional, and social in the context of cultures, values, individual goals and environment. These factors lead to the difference in personal perceptions. When people perceive good quality of life, it will affect future well-being, a good life and a good relationship in the family (Lukkarinen &

Hentinen, 1997; WHO, 1996). The perceived quality of life of the older persons is a guideline for home care planning to appropriately promote older persons quality of life.

This research applied the quality of life concept to health status which is a broad assessment. This includes individual perception of general health status and life satisfaction. The assessment does not focus on disease or illness but puts a great emphasis on the role of physical, mental, emotional, and social functions. It can be applied to all types of people including the older persons. This study comprised two concepts as follows: 1) The older persons quality of life consisting of physical aspect, psychological aspect, social relation aspect and environmental aspect and 2) The overall quality of life indicators. This assessment is based on the WHOQOI-BREF-THAI (Mahatnirankul et.al, 1997)

METHODOLOGY

This study was a descriptive research design using quantitative data collection. The quantitative approach is to examine quality of life and factors affecting quality of life among the older persons in Chai Nat Province. Target population of this study was 43,090 Thai older persons who were 60 years old or over, either female or male, lived with communities all areas within eight districts of Chai Nat Province located in central region of Thailand.

The sample size of this study was calculated by using the Taro Yamane table considering 95% confidence interval, 80% power of test, ($\alpha = .05$). 640 qualified samples were selected by multi-stage sampling. The selection process is as follows: 1) randomize two representative subdistricts in each districts among urban, semi-rural and rural districts; 2) within each subdistrict, randomize two representative villages from the 8 selected villages comprising 32 villages each in urban, semi-rural and rural areas; 3) randomly estimated the number of subjects using a ratio of sample in each village based on the database of Thai older persons in Chai Nat Province in Year 2017; 4) randomly qualified subjects who met the following inclusion criteria: age 60 or older, living in the community of urban, semi-rural and rural areas of Chai Nat Province, having ability to self-reliance and performing basic daily activities themselves who were randomly divided into three groups: social group, home group, and bedridden group, being able to understand and communicate in the Thai language, and willingness to participants in this study. As a result, the total sample consisted of 628.

MATERIALS

The research instruments used in this study consisted of demographic data form and WHOQOI-BREF-THAI. The demographic data form was developed by the researchers. The 15 open-ended questions were collected demographic characteristics by including age, gender, race, religion, educational level, marital status, health status, perceived income adequacy, medical insurance, underlying diseases and treatment, living area. To measure the quality of life among older persons were used the generic instrument World Health Organization Quality of Life-

BREF (WHOQOL-BREF-THAI) developed by Suwat Mahatnirunkul et.al (2007). This questionnaire consisted of 2 parts as follows: 1) perceived objective of health comprising of 24 items which constituted four dimensions of quality of life related health, including: physical (seven items), psychological (six items), social relationship (third items) and environmental (eight items); 2) self-report subjective including two item questions in both item 1 and item 26. There are 26 questions of the WHOQOL-BREF-THAI comprised of 23 positive questions and three negative questions. Each item is rated as five levels: an extreme amount (5), very much (4), a moderate amount (3), a little (2) and not at all (1). Each dimension was calculated by summation of their specific items. The overall score is between 26 and 130 points which are divided into three levels, whereby a score of: 25 to 60 (poor); 61 to 95 (moderate); and, 96 to 160 (good). Higher score corresponding to a better quality of life in each dimension. This instrument was reviewed and suggested by three experts. The Content Validity Index of was 0.65 for originally and 0.82 for this study. Then the instruments were revised according to the experts' suggestions. 30 participants were tested for reliability which the Cronbach's alpha coefficient of this scale was 0.89 for testing and 0.95 for the 628 sample if this study.

Data Collection and Ethical considerations

The data collection was conducted in the home of older persons by researchers and 10 research assistants between May 15 and August 31, 2018 in Chai Nat province of Thailand. The protocol of this study was approved by the Ethics Committee at Boromarajonani College of Nursing Chai Nat (No. BCNC-03/2018). The research assistants were trained for collecting reliable data. The permission from Chai Nat Provincial Public Health Office and District Public Health Offices was obtained for collecting data in those areas. Researchers followed guidelines for working with participants. All participants were explained with a summary brief of the study and its aim. They then decided whether to participate in the study. The volunteer participants were asked to sign a consent form, and could withdraw from this study at any time without giving any reason. A written informed consent was taken from the eligible participants after explaining the whole protocol of study. For participants who could not read or write, the researcher and research assistants read the consent form to them and used their thumbprints instead of signatures. Data were confidential and anonymous. The findings will be published in academic and professional journals. The process of data collection was started with gathering Thai older persons from name lists in each study in Chai Nat province and selecting qualified participants by simple random sampling. The participants were invited to participate in the study and asked also to sign a consent form. Prior to the beginning of the interviewed was classified their physical function to assess basic activity daily living by instrument (Modified Barthel Activities of Daily Living Index for Thai persons: BAI). After getting informed consent, an interviewed questionnaire was used to collect the data in the data collection date. The

researchers and research assistants collected the personal data in the demographic data form. During the interview session, the researchers or research assistants read each item to participant and let them choose the response by themselves without any additional clarification. Each participant was interviewed approximately 45-80 minutes for comprehensive all answers.

DATA ANALYSIS

The analysis of quantitative variables using inferential statistic were calculated in Microsoft Excel software by frequency, percentage, mean and standard deviation. Independent t-test and F-test were used to compare differences scores between the independent variables including gender, age, educational level, disease condition, perceived income adequacy, living status and the total score of quality of life in Thai older persons.

RESULTS

Participants were predominantly female (67.00%). Half of them (50.32%) were lived from urban areas, while 33.44% were lived in rural area. Ages ranged from 60 to 99 years, with a mean of 71.16 (SD =7.95). Majority of age group was early old age (60-69 years) (50.32%). All participants are Buddhists. Most participants had educated (86.94%), and had completed only elementary school (43.46%). Nearly half of the participants (45.22%) were divorced, and married (26.11%). With regard to health status, most participants (65.45%) had health problem with medical treatment. Regarding the common disease, most of participants had high blood pressure (68.13%) and diabetes mellitus (26.76%). Most with the disease problem has been consistently treatment (92.46%). Nearly half of the participants (40.45%) of had sufficient for living but no for saving sufficient for living. The dataset of demographic characteristics of participants are shown all variables listed in Table 1.

Table 1 Distribution and Frequency of Demographic Characteristics of the Study Sample according to living area (n = 628)

Demographic Characteristics	All area n (%)	Urban n (%)	Semi-rural n (%)	Rural n (%)
Gender				
Female	421 (67.00)	70 (15.15)	217 (34.55)	134 (21.34)
Male	207(33.00)	38 (6.05)	86 (13.69)	83 (13.32)
Age (in years)				
Early age (60-69)	316 (50.32)	32 (5.10)	167 (26.59)	117 (18.63)
Middle age (70-79)	210 (33.44)	48 (7.64)	90 (14.33)	72 (11.46)
Old age (80 and over)	102 (16.24)	28 (4.46)	46 (7.32)	28 (4.46)
Rang (years)	60-99	60-99	60-95	60-95
Mean ± S.D.	71.16 ±7.95	74.54 ±8.84	70.60 ±7.69	70.26 ±7.95
Educational level				
No formal education	82 (12.29)	19 (3.03)	31 (4.94)	32 (5.10)
Educated	546 (86.94)	89 (14.17)	272 (43.31)	185 (29.46)
Elementary school (grade 1-6)	488 (43.46)	79 (12.58)	231 (36.78)	178 (28.34)
High school (grade 7-12)	36 (33.62)	9 (1.43)	22 (3.50)	5 (0.80)
Diploma	14 (2.12)	1 (0.16)	11 (1.75)	2 (0.32)
Bachelor degree	8 (0.86)	0	8 (1.27)	0
Marital Status				
Single	43 (6.80)	6 (0.96)	27 (4.30)	10 (1.59)
Married and living separate	32 (5.10)	6 (0.96)	12 (1.91)	14 (2.23)
Married	164(26.11)	39 (6.21)	48 (7.64)	77 (12.26)
Widowed	31 (4.94)	9 (1.43)	11 (1.75)	11 (1.75)
Divorced	284 (45.22)	44 (7.01)	161 (25.64)	79 (12.58)
Separated	74 (11.78)	4 (0.64)	44 (7.01)	26 (4.14)
Health status				
None	217(34.55)	39 (6.21)	82 (13.06)	96 (15.29)
Comorbidity condition (disease)	411(65.45)	69 (10.99)	221 (35.19)	121 (19.27)
- Hypertension	280(68.13)	53 (12.90)	149 (36.01)	79 (19.22)
- Diabetes mellitus type II	110(26.76)	11 (2.68)	48 (11.68)	51 (12.41)
- Hypercholesterol	86 (20.92)	11 (2.68)	41 (9.98)	34 (8.27)

Demographic Characteristics	All area n (%)	Urban n (%)	Semi-rural n (%)	Rural n (%)
Perceived income adequacy				
Sufficient for living and saving	189(30.10)	40 (6.37)	62 (9.87)	87 (18.85)
Sufficient for living but no for saving	254(40.45)	43 (6.85)	130 (20.70)	81 (12.90)
Insufficient but no dept	185(29.46)	25 (3.98)	111 (17.68)	49 (7.80)
Living status	628 (100.00)	108 (17.20)	303 (48.25)	217 (34.55)
Living alone	69 (10.99)	35 (5.51)	20 (3.18)	14 (2.23)
Living with spouse	164(26.11)	39 (6.21)	48 (7.64)	77 (12.26)
Living with relative	415(65.45)	34 (5.41)	235 (37.42)	126 (20.06)

The results showed that the overall quality of life scores of the study participants ranged from 35 to 126 with a mean of 93.72 (SD= 13.91). The overall quality of life scores and subdimension of quality of life related health including the scores related health of physical, psychological, social relationship were at a moderate level, whereas environmental dimension score was at good level. Regarding score distribution for overall quality of life, 49.32% of the participants were in the good level group and only 1.59% were in the poor level group. Considering score distribution for subdimensions of quality of life, most participants reported a good level in environmental (53.34%), but reported a moderate level in physical (65.76%), psychological (53.98%), social relationship (53.18%) (see Table 2)

Table 2 Descriptive Values of Quality of Life Level of the Study Sample (n= 628)

Quality of life	Possible Score	Actual Score	Poor n (%)	Moderate n (%)	Good n (%)	Mean	S.D.	Level
Overall Quality of life	26 - 130	35 - 126	10 (1.59)	308 (49.04)	310 (49.36)	93.72	13.92	moderate
- physical	7 - 35	9 - 35	23 (3.66)	413 (65.76)	192 (30.57)	24.57	3.86	moderate
- psychological	6 - 30	7 - 30	23 (3.66)	339 (53.98)	266 (42.36)	21.55	3.52	moderate
- social relationship	3 - 15	3 - 15	66 (10.51)	334 (53.18)	228 (36.31)	10.63	2.30	moderate
- environmental	8 - 40	10 - 40	13 (2.07)	280 (44.59)	335 (53.34)	29.67	4.95	good

Note. S.D = Standard derivation

Table 3 Mean Scores for Quality of Life Overall and dimensions of the Study Sample by Age (n=628)

Quality of life level	60-69 years(n= 316)		70 and older (n= 312)		Statistic	
	Mean	±S.D.	Mean	±S.D.	t-test	P
Overall Quality of life	94.81	12.96	92.61	14.76	1.98	0.048*
- physical	24.84	3.50	24.31	4.18	1.72	0.086
- psychological	21.75	3.29	21.34	3.73	146	0.144
- social relationship	10.87	2.15	10.39	2.41	2.65	0.008*
- environmental	30.01	4.80	29.33	5.08	1.71	0.087

Note. S.D = Standard derivation, * $P < 0.05$

In Table III, those aged 60-69 years were found to make statistically significant difference in the overall quality of life score ($P=0.048$), and the dimension of social relationship ($p=0.008$). No statistically significant differences were found between the quality of life in dimension of physical health, psychological health and environment of early age group (60-69 years) and older age group (70 years and over). The average score of quality of life in early age group (60-69 years) was overall higher than older age group (70 years and over).

According to Table IV, this result showed that statistically significant differences were found among the overall quality of life of those living in urban and semi-rural and rural areas. Thai older persons living in rural community areas tended to have lower scores in the overall quality of life and in the dimension of physical health, psychological health, social relationship and environment.

Table 4 Mean Scores for Quality of Life in Overall and dimensions of the Study Sample by living area (n= 628)

Quality of life level	Urban (n= 102)		Semi-rural (n= 316)		Rural (n= 210)		Statistic	
	Mean	±S.D.	Mean	±S.D.	Mean	±S.D.	F-test	P
Overall Quality of life	94.17	±11.46	96.17	±14.06	90.08	±14.10	12.62	0.000*
- physical	24.79	±3.53	25.11	±3.93	23.71	±3.77	8.72	0.000*
- psychological	22.24	±2.90	21.85	±3.49	20.77	±3.70	8.69	0.000*
- social relationship	10.31	±1.82	11.13	±2.45	10.09	±2.15	14.90	0.000*
- environmental	29.41	±4.48	30.65	±4.99	28.43	±4.84	13.47	0.000*

Note. S.D = Standard derivation, * $P < 0.05$

Discussion

The findings can be discussed in relation to each objective of the study as follows:

The level of overall quality of life and subdimensions among Thai older persons in Chai Nat Province.

The result from this study showed that the overall quality of life in Thai older persons living in Chai Nat Province was in the moderate level. The overall quality of life level among Thai older persons living in Chai Nat Province was in the moderate level. Regarding to the proportion of quality of life level, the results illustrated that 49.36% and 49.04% of the older persons's quality of life were in the moderate and high levels respectively. This may be due to differences in participants' contexts such as age, health status, disease, culture, environment surroundings, living status, income, the ways of living and access to health services. Majority of this participants of study were in the early age group (60-69 years) and older age group (70-79 years) (50.32% and 33.44 % respectively) who may have little health related age change, whereas 16.24% was more than 80 years of age. In addition, when people get older, they will be affected by the aging process affecting their physical and mental health. The physical condition of the older persons decreases with age. In the future, when the older persons aged 70 years and older start the aging process, they may suffer from chronic diseases with pathological conditions and the degenerative conditions may be more severe. According to this study, 65.45% of the older persons had chronic illnesses and comorbidity condition who received continued treatments such as hypertension and diabetes mellitus. Those illnesses can affect their well-being and reduce the ability to perform activities in daily life. It will also affect their mental health. The limitations of the illnesses will decrease the opportunities to have activities in society. The older persons who are dependent on others may feel valueless. These factors may have a negative impact on their life satisfaction and decrease their quality of life.

There has been consistent with several quality of life studies conducted in Thailand collected by the WHOQOL-BREF-THAI. Various studies organized in many provinces in the central region of Thailand illustrated that the older persons in Phra Nakhon Si Ayutthaya (Sodsong, 2018) and Lop Buri (Sa-ngiam&Wichaingoen, 2018) had moderate level of overall quality of life. The study conducted by Kwanarat Sutthirakul et.al (2016) showed that the older persons living in five regions of Thailand: the Central region (Chonburi and Suphan Buri Provinces), the North region (Chiang Mai and Nakhon Sawan Provinces), the Northeastern region (Nakhon Ratchasima and Khon Kaen Provinces), the Southern region (Nakhon Si Thammarat and Songkhla Provinces), Bangkok and Nonthaburi Province also had moderate level of overall quality of life (83.5 percent). Suthisukon et.al (2016) found that the older the older persons got the lower they had quality of life. The quality of life among the older persons living in the North Thailand was in the moderate level such as in Laplae district, Uttaradit Province (Tanjung, 2014), Bang Mun Nak District, Phichit province (Wuttigarn et.al., 2017) and 48.5

percent of the older persons in Sukhothai Province (Saengngoen et.al, 2018). In addition, the study in Laem Chabang municipality, Sriracha district, Chonburi Province reported that the quality of life of the older persons was in the moderate level (Rungnapha Rrivichairat, 2015). However, the older persons's quality of life living in 10 Provinces consisting of Bangkok, Chainat, Nonthaburi, Pathum Thani, Ayutthaya, Lopburi, Saraburi, Singburi, Angthong and Suphan Buri was in the high level (Ngammeerith et al., 2018). This result indicated that quality of life among Thai older persons in Chai Nat Province was at moderate level. Therefore to promote better quality of life for Thai older persons in Chai Nat Province, health professionals and local government organizations at all levels should focus on integrating essential activities of holistic health care for patients and family members. Creating activities and methods to promote the quality of life in the overall and individual aspects including the adaptation to the context, condition and health status of the older persons is important to improve their quality of life in Chai Nat Province.

According to the quality of life among Thai older persons in Chai Nat Province in dimensions of physical, psychological, social relationship were at moderate levels, but environmental was at good level. The findings illustrated the difference among the level of the older person's quality of life. This may relate to the contextual differences, educational levels, self-awareness, the ability to do daily life activities, the severity of chronic illnesses and access to health and social services. This will be explained that physical problems caused by degeneration conditions and chronic illnesses affected their lifestyle of the older persons. The older persons could adapt themselves to their health conditions when they had self-assessment for enhancing their self-esteem and satisfaction. According to this study, 65.45% of all older people suffered from hypertension and diabetes mellitus, 68.13% and 26.76% respectively. Especially, Thai older person had sufficient for living but no for saving (40.45%) and 29.46% insufficient but no dept. These may have a negative effect on the perception of the older person's quality of life. There has been consistent with many studies in many provinces. For example, Sodsong (2018) found that social relation, environmental, psychological, physical aspects of the older persons in Phra Nakhon Si Ayutthaya were in the moderate levels. The study in Bang Mun Nak District, Phichit province presented that psychological, social relation, environmental aspects were also in the moderate levels, and the physical aspect was in the low level (Wuttigarn et al., 2017). Several studies illustrated in the same way as the older persons's quality of life related to all aspects which were in the moderate level. Suthisukon et al. (2016) found that the older persons in 10 provinces had the quality of life in social relation, psychological and physical aspects were in the moderate level, and older people in the later age had lower quality of life than older people in their early age. Therefore, relevant agencies should seek ways to empower the older person's families and construct their community networks, particularly in the older persons who had chronic health conditions, dependence and low quality of life.

For the environmental dimension, the older persons in Chai Nat Province had good quality of life. This found that they are happy to live in the community environment with agricultural contexts. The older persons can adapt to live in the environment which will result in self-perception and life satisfaction. It can be said that the environmental aspect may impact on their lifestyle and satisfaction. This may be because 93.95% of the older persons were still able to perform their daily activities independently and 70.80% of them had good awareness of their life satisfaction with the environment. The community environment in the areas of Chai Nat Province continues to be a rural society with an agricultural lifestyle that makes the older persons remain a secure environment. They are satisfied with living in original surroundings. Although most of area in Chai nat province of central region Thailand is agricultural, the social and economic developments have changed the economy rapidly to modern agricultural. Possible consistent with the Maslow's hierarchy of needs stated that all human beings need safety as the individuals seek the safety of environment and others (Maslow, 1974). The finding consistent with the previous study by Nattawat Khantat (2014), the quality of life of the older persons in the Clinic Development Center was in the high level. However, the findings were not consistent with several studies found that the environmental aspect of the older persons' quality of life was in the moderate level such as the studies in Rayong Province (Vongsarn, 2007), in Nontha Buri Province (Chayang, 2009) and in Chon Buri Province (Nuttadara Na-Ratch, 2012). This can be explained that the environmental conditions in Chai Nat Province are small located in central Thailand. The conspicuous feature of Chai Nat's terrain is generally flat land, with three main rivers flowing through every area. This leads to be a common agricultural route. 80 percent of all people in Chai Nat Province are farmers. They then have a simple way of life. (Office of Social Development and Human Security, Chai Nat Province, 2017). It can be said that older people in Chai Nat Province have higher perceptions of their life satisfaction with the higher environmental aspect.

IMPLICATIONS OF THE DATA

Based on the results of this study, implications for health care service, nursing administration, and nursing research are present as follow:

1. Implications for health care services:

The findings of this study provide valuable information for health care service in community setting. Nurses should be aware of the assessment of quality of life in each dimension and integrate resources in the community for enhancing quality of life in dimension of environment through created necessary activities to improve the older person's quality of life of older persons people in the area of Chai Nat province. All relevant agencies, especially health professionals and local government organizations at all levels, should collaborate on holistic health care for patients and their family members. Shared information could be used for promoting the quality of life, both overall and individual aspects. Empowering family members

and developing community networks are to support the vulnerable older persons suffering from chronic illnesses, dependence and low quality of life.

2. Nursing administrations

Since The findings of this study revealed that the overall quality of life of Thai older persons were significantly different by age and living areas. Health care providers and policy makers should therefore consider different age and locations when addressing quality of life in Thai older persons. The service systems and activities of enhancing the quality of life should be adjusted according to the context of older persons society changing. It is in order to encourage older people to have better quality of life, covering all aspects of quality of life. This study suggests the necessary guidelines for improving the quality of life among the older persons in Chai Nat Province. Developmental Studies should be suitable for integrating working process of health professionals to improve the quality of life among the older persons, especially in the Quality of Life Development Committee of the older persons at the district level. This is the driving force behind Thailand's policy to improve the quality of life for all age groups in the Chai Nat Province. The lessons should also be tracked in order to evaluate the effectiveness of the developed models.

3. Nursing Research

3.1. The further studies should focus on affecting factors of the quality of life among the older persons in all areas of Chai Nat Province, urban, suburban and rural communities. The findings are also useful for designing interventions to improve quality of life in the growing population of older persons, especially located in rural, semirural and urban context. The quality of life among adults who are coming to retirement age should be studied in order to prepare for aging process. This will lead to the improvement of the quality of life in all age groups.

3.2. Qualitative research should be conducted for gathering in-depth information of older persons people's perceptions. This can be the plans of improving their quality of life of the older persons as they needs.

3.3. A longitudinal design should be carried out to determine. The quality of life of the older persons should be monitored in all areas every 6 months, 1 year, and 3 years for supporting their well-being.

Conclusion

The findings showed that overall quality of life perceived by Thai older persons living in Chai Nat Province was in the moderate level. For each dimension, the quality of life in dimension of social relationship, psychological and physical were in the moderate level. The environmental dimension was in the high level. The differences of aged and living areas lead to different levels of Thai older person's quality of life.

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