



## **CHAPTER V**

### **CONCLUSION, DISCUSSION AND RECOMMENDATIONS**

The objective of data analysis and descriptive research at the certain point of time on the Prevalence and Determinants of Hypertension among elderly in Dinudom Sub district, Lumtap District, Krabi Province is to find the Prevalence among elderly in Dinudom Sub district, Lumtap District, Krabi Province. The Study Population was 360 elderly respondents. Data Collection was held during April-May 2004 and the research tool referred as questionnaire. The Summary, Discussion and Suggestion are as follow:

#### **5.1 Conclusion**

##### **Part 1 General information and personal information of the Sample**

From the Study Population of 360 respondents, the majority were male of 51.7% between 60 and 69 years old which was considered as 55.8% of the study population. 71.1% were married, 63.3% had primary education, 70% were literacy, 96.2% were farmer, 98.9% had sufficient income and 60% earned the income from the descendant. Furthermore, 73.3% of the immediate family did not have Hypertension in the record of a person's current and past illnesses. 79.2% of the respondents had the recent illness within two weeks. 59.5% had at least 1-2 chronic diseases. 6.4% had hearing impairments that had the duration more than six months and mostly found in the respondents who had chronic disability. 83.9% of the

respondents had the disease, health problem and chronic disability that lasted more than six months which did not effect toward their ability to work or perform daily activities. 79.2% of the respondents had the recent illness within two weeks. 14% of the respondents who had the recent health problem or the illness in two weeks encountered with only one illness. 3.9% had the health problem or the illness which associated with accident or injury. 3.1% of the health problem or the illness in the elderly respondents associated with accident caused by household accident. 44.4% of the respondents had the past risk behaviors which developed Hypertension such behaviors referred as eating foods that were high salt, high fat and cholesterol, drinking alcohol, and smoking. 6.9% of the respondents had no risk behaviors to develop Hypertension. 61.1% of the respondents exercised in regular basic by Aerobic (41.1% of all the respondents who exercised). 38.6% of the elderly respondents were lacked of exercise. 67.2% of the respondents were aware of Hypertension while 32.8% had no knowledge about Hypertension. Only 8.3% of the family member experienced with Tsunami disaster confrontation in their own family. In accordance with the blood pressure measurement in the respondents, 49.2% had normal Systolic, 33.6% were considered for Pre-hypertension, 13.9% were Stage 1 Hypertension and 3.3% were Stage 2 Hypertension. This is consistent with Prasert Assantachai's study which concludes that the older people are, the more likely they have to experience high blood pressure. The result also included Diastolic measurement in the respondents which 58.1% were normal, 21.4% were considered for Pre-hypertension, 17.5% were Stage 1 Hypertension and 3.1% were Stage 2 Hypertension. The measurement of both Systolic and Diastolic found that 26.4% had normal blood

pressure levels, 40.6% were considered for Pre-hypertension, 28% were Stage 1 Hypertension and 5% were Stage 2 Hypertension.

## **Part 2 The evaluation of potential of the elderly in performing Basic Activities of Daily Living.**

In regard to, the capability of elderly in performing Basic Activities of Daily Living, there were 5 activities identified by the respondents that they were able to perform by themselves (Independent). Those activities were feeding, grooming, mobility in household, dressing up, and bathing which represented 99.7% of the respondents. Bedding transfer and mobility in household were the activities that required supervision and represented 0.3% of the respondents. 0.6% of the respondents specified that toilet use, stair use, bowel and bladder were the activities required support from care taker. In the mean time, feeding, grooming, bedding transfer, and dressing up were also indentified by 0.3% of the respondents as the activities required help from care taker. Bathing was the activity identified by 0.3% of the respondents that they were unable to perform this activity by themselves and entirely depended on the care taker to support them.

## **Part 3 Operational Efficiency of Instrumental Activity of Daily Living.**

In respect to the capability of elderly in performing Instrumental Activity of Daily Living, mobility out off the household, house keeping work, and managing finance were the activities that 99.7% of the respondents were able to perform by themselves (Independent). Cooking and traveling by vehicles represented 99.2% and 97.2% respectively of the respondents who were able to perform by themselves

(Independent). Traveling by vehicles was also identified by 2.8% of the respondents as the activities that required supervision. 0.3% of the respondents specified that mobility out off the household and cooking were the activities required support from supervision. In the mean time, cooking was the activity identified by 0.6% of the respondents that they were unable to perform the activity and entirely depended on the care taker to support them. Other activities that also entirely depended on the care taker were house keeping work, and managing finance resulted from 0.3% of the respondents.

According to the comparison of disability in performing between Basic Activities of Daily Living and Instrumental Activity of Daily Living of the elderly respondents found that the respondents were able to keep up with Basic Activities of Daily Living better than Instrumental Activity of Daily Living. Furthermore, as shown in Table 13, the respondents with the disability condition were able to perform Basic Activities of Daily Living as well as Instrumental Activity of Daily Living.

#### **Part 4 The study of the relationship between Prevalence and Determinants of Hypertension among elderly in Dinudom Sub district**

The study of Hypertension among elderly found that male developed Hypertension more than female. Male represented 35.5% of the respondents who developed Hypertension more than female of 30.5% of the respondents. This is inconsistent with Chalao Mahawichien's study which reveals that the hypertension prevalence among women is higher than men. However, it is in line with Donphichid Laorakpongse's study which reports similar hypertension prevalence rates among men and women.

In term of age, late aged elderly (75 or over years old) had more potential in developing Hypertension than early aged elderly (60-74 years old). 40.0% of late aged elderly respondents developed Hypertension while only 30.7% of early aged elderly respondents developed Hypertension.

The respondents who were single/ widowed/ divorced/ separated tended to develop Hypertension more than those who married. It represented 33.3% of the respondents who were single/ widowed/ divorced/ separated had hypertension and 31.4% of the elderly respondents who married had Hypertension. In regard to education background, the educated respondents develop Hypertension less than the uneducated respondents. 31.1% of the educated respondents develop Hypertension whereas 36.8% of the uneducated respondents develop Hypertension.

The elderly respondents who were merchant/government worker had the significant higher potential in developing Hypertension than those who were farmer. 57.1% of merchant/government worker developed Hypertension and only 31.8% of farmer developed Hypertension.

Income Sufficiency also played a potential part in developing Hypertension. The respondents who had sufficiency income develop Hypertension than the respondents who had insufficiency income which were 33.1% and 25% for sufficiency income and insufficiency income respectively.

Genetic heritable record was part of the study that the respondents who did not have the immediate family member (genetic) experience Hypertension tended to develop Hypertension more than that the respondents who had the immediate family member (genetic) experience Hypertension. 34.4% of the respondents who did not have the immediate family member (genetic) experience Hypertension, developed

Hypertension themselves, while compared with 32.6% of the elderly respondents who had the immediate family member (genetic) experience Hypertension.

The study of Life-style found that the respondents who did not smoke in the past behavior could have the potential in developing Hypertension more than the respondents smoked in the past behavior. 35.6% of the respondents who did not smoke in the past behavior had Hypertension while only 29.1% of the elderly respondents who smoked in the past behavior developed Hypertension.

The respondents who had the past behavior of drinking could less develop Hypertension than the respondents who did not drink in the past behavior. 35.2% of the elderly respondents who did not drink alcohol in the past behavior had Hypertension while only 26.9% of the respondents who drank in the past behavior developed Hypertension.

The respondents who had high salt consumption in the past behavior could develop Hypertension more than the respondents who did not have high salt consumption. 36.5% of the respondents who had high salt consumption developed Hypertension. 23.7% of the respondents who did not have high salt consumption developed Hypertension. It is brought to the attention of the significant statistic level at  $p < 0.05$ . Table 15 was also shown that the respondents who had high fat consumption in the past behavior could develop Hypertension more than the respondents who did not have high fat consumption. 34.5% of the respondents who had high fat consumption developed Hypertension. 29.3% of the respondents who did not have high fat consumption developed Hypertension.

Hypertension in the elderly respondents who did not smoke in the present behavior and those who smoked are likely similar. 33.3% of the respondents who did

not smoke in the present behavior had Hypertension while approximately 32.4% of the respondents who smoked in the present behavior developed Hypertension.

From the research about alcohol drinking, the respondents who had the present behavior of drinking could significantly less develop Hypertension than the respondents who did not drink in the present behavior. 34.9% of the respondents who did not drink alcohol in the present behavior had Hypertension while only 24.2% of the respondents who drank in the present behavior developed Hypertension.

Another study of salt consumption found that the respondents who had high salt consumption in the present behavior could develop Hypertension more than the respondents who did not have high salt consumption. 37.4% of the respondents who had high salt consumption in the present behavior developed Hypertension. 27.3% of the respondents who did not have high salt consumption developed Hypertension. The respondents who had high fat consumption in the present behavior could develop Hypertension more than the respondents who did not have high fat consumption. 35.5% of the respondents who had high fat consumption developed Hypertension and 30.1% of the elderly respondents who did not have high fat consumption developed Hypertension.

Referring to the Body Mass Index, the respondents who had normal Body Mass Index had more tendencies in developing Hypertension than the respondents who had Body Mass Index over the normal level. 35.1% of the respondents who had normal Body Mass Index developed Hypertension whereas 30.3% of the respondents who had Body Mass Index over the normal level experience Hypertension. The tendencies of Hypertension development in the respondents who had regular exercise and lacked of exercise were nearly the same. 32.7% of the respondents who had

regular exercise could develop Hypertension and 33.6% of the respondents who lacked of exercise could develop Hypertension.

In relation to Basic Activities of Daily Living performance, the elderly respondents who had the disability conditions developed Hypertension more than those who did not have the disability conditions. 100% of the respondents who had the disability conditions developed Hypertension while only 32.9% of the respondents who did not have the disability conditions developed Hypertension. The respondents who had the duration of health problem more than six months or within only two weeks could have the similar likelihood in developing Hypertension.

## **5.2 Discussion**

### **Part 1 General information and personal information of the Sample**

From the Study Population, the numbers of male respondents were closed to the numbers of female respondents between 60 and 69 years old which represented almost half of the elderly respondents. It was expected that the elderly population of the overall population structure would increase in the future. More than 50% of the respondents were married which promoted the opportunity to exchange the aging experience. Most of the respondents were not educated enough. Even they were literacy but mostly only had primary school. The majority of the respondents was doing agriculture for living and had sufficient income. Some of the respondents earned the income from the descendant.

In consideration of Hypertension, the study found that most of the respondents had the chronic disease which had the duration more than six months with at least 1-2 chronic diseases. This result was corresponding to the study of Thailand Health



Research Institute in 1998 which indicated that chronic diseases in the elderly population were 69.3%. The study also found that 5% of the National elderly population had serious physical disability which required around the clock care. The top ten accidents which caused the long term disability were hemiplegia, eye disease or blindness, runner's knee, Hypertension, arms and legs weakness, deaf or stone deaf, and diabetes.

Minority of the study population were handicapped, deaf or stone deaf for more than six months. They had showed that the disability were not influence with their work or daily routine activity. Due to a regression of health in elderly respondents, there were the recent illnesses developed within two weeks. However, there was the household accident from time to time. This result was corresponding to the study of Thailand Health Research Institute in 1998 which indicated that 6.8% of the National elderly population had the accidents. 32.7% of the accidents were the household accident. Secondly, 22.3% of the accidents were the transportation accident. 21.8% of the accidents were the work place accident.

Previously, the risk behaviors developed Hypertension in the respondents were eating foods that were high salt, high fat and cholesterol, drinking alcohol, and smoking. Only a small number of the respondents did not have the risk behaviors. As a result of previous health condition of the study population in the early age, they might consider themselves healthy and led to lack of health awareness. This result was corresponding to the study of Visuttitum (1999) which indicated that quality of life among Thai elderly in Nakornsawan Province in term of health concern were healthy without any handicapped condition. The study solely found that the elderly who were 71 or over had the first level of multiple system organ failure. There were

the needs for health services. On one hand, the risk behaviors for male were drinking alcohol and smoking while female were the frequency of pain relief intake. On the other hand, the elderly also maintained their health with Aerobic and exercise. Only one third of the study population lacked of exercise. This result was corresponding to the study of Nualjinda et al. (1991) which concluded that the psychological and physical need of the National elderly population were different from other age. In regard to the Physical need, other than carbohydrate which required in their meal, the elderly also needed to have vegetable, fruit, health drink such as juice, tea, coffee, meat, and seafood, small amount of fat from time to time. The alcohol drink was not requested as part of the meal. The study also found that two third of the study population were educated about Hypertension. According to the blood pressure measurement in the study population, half of the study population had the normal level of blood pressure. One third had Pre-hypertension. Stage 1-2 Hypertension was not significant among the study population. 50% of the respondents had normal Diastolic with Pre-hypertension and Stage 1-2 Hypertension was not significant. One fifth of the elderly who had the normal level of Systolic and Diastolic with Pre-hypertension were as high as 50% of the respondents. Only one tenth of the respondents had the family member experienced with Tsunami disaster confrontation in their own family.

## **Part 2 The evaluation of potential of the elderly in performing Basic Activities of Daily Living**

In respect to the capability level of elderly in performing Basic Activities of Daily Living, almost all of the respondents were able to perform five Basic Activities of Daily Living by themselves (Independent) due to the willing of self support by the elderly. Those five Basic Activities of Daily Living referred as feeding, grooming, mobility in household, dressing up, and bathing. Only a small number of the respondents needed the support for the activities such as bedding transfer and mobility in household. The activities such as toilet use, stair use, bowel, bladder, feeding, grooming, mobility in household, and dressing up were identified by the merely number of the respondents that require the support from care taker. As a matter of fact, the elderly who were in the regression of health required the physical strength to perform such activities. This result was corresponding to the study of Visuttitum (1999) which studied quality of life among Thai elderly in Nakornsawan Province in term of time and daily routine both in self support and family support. The study found that Thai elderly in Nakornsawan Province deepened upon others in family. Unfortunately, the family structure was changed to single family which hardly found the support for the elderly. Additionally, bathing was identified by the merely number of the respondents that they were unable to perform the activity and entirely depended on the care taker to support them. This result was corresponding to the study of Thailand Health Research Institute in 1998 which indicated that 5% of the National elderly population who were 80 and over with serious physical disability essentially required around the clock care. This result was also corresponding to the study of Nualjinda et al. (1991) which concluded that the psychological and physical need of

the National elderly population were different from other age. The elderly needed the support from others on dressing up, meals, bedding, and physical health check.

### **Part 3 Operational Efficiency of Instrumental Activity of Daily Living.**

In respect to the capability of elderly in performing Instrumental Activity of Daily Living, most of the elderly respondents were able to perform by themselves (Independent). Such activities referred to mobility out off the household, house keeping work, and managing finance, cooking, and traveling by vehicles. Some of the respondents required support on traveling by vehicles, walking, mobility out off the household, cooking. A small number of the respondents were unable to cook, perform house keeping work, and managing finance.

In respect to the comparison of disability in performing between Basic Activities of Daily Living and Instrumental Activity of Daily Living of the elderly respondents found that the respondents were able to keep up with Basic Activities of Daily Living better than Instrumental Activity of Daily Living. The respondents with the disability condition were able to perform Basic Activities of Daily Living as well as Instrumental Activity of Daily Living.

Due to the regression of health, it affected the mobility and activities performance of the respondents. The activities that they used to be able to perform, they will no longer perform. The respondents try to maintain the ability to perform the activities by themselves even they were no longer continuously perform because of the limitation of the physical strength and current health condition. Some activities caused pain which limited the ability to perform by the respondents. The physical condition will determine the ability of the respondents on performing the Basic

Activities of Daily Living. This result was also corresponding to the study of Nualjinda et al. (1991) which concluded the psychological and physical need of the National elderly population. The study summarized the strategy for quality of life development in the National elderly population that the elderly should be sufficiently provided all their psychological and physical needs. In contrast to the study by Siripanit (1999) on the Functional Disability of Thai elderly, the diseases which caused the Functional Disability in elderly may not always led to the disability in elderly. Another study from The Research Institute of Public Health Systems (1995) also apposed the study of Nualjinda et al. (1991) on long term Functional Disability. The study found that there were 19% of the National elderly population was under chronic impairment more than six months. The degree of Functional Disability intensity came with age. The study indicated that 5% of the elderly who were 80 and over had the high Functional Disability intensity which required around the clock care.

#### **Part 4 The study of the relationship between Prevalence and Determinants of Hypertension among elderly in Dinudom Sub district**

The study of Hypertension among elderly found that male developed Hypertension more than female. However, the ratio was likely similar between male and female because both male and female had the same level of the regression of health even under the different risk factors. Almost 50% of the late aged elderly (75 or over years old) had more potential in developing Hypertension than early aged elderly (60-74 years old). Only one third of the early aged elderly developed Hypertension. As the matter of fact that, the late aged elderly develop higher regression of health than the early aged elderly.

The respondents who were single/ widowed/ divorced/ separated tended to have the similar level of developing Hypertension as those who married. The elderly had the same chance to develop Hypertension regardless marital status.

In regard to education background, the educated respondents developed Hypertension less than the uneducated respondents. It could express that the respondents who had education had the opportunity to access the information on health condition by reading, perceiving the information/news, and awareness of health condition.

The elderly respondents who were merchant/government worker had the significant higher potential in developing Hypertension more than those who were farmer. More than half of the elderly respondents developed Hypertension, only one third of those were farmer. The consumption behavior could respond to this result. The elderly respondents who were farmer always had vegetable consumption behavior due to the conventional life style. Most of the daily meals contained vegetable, steamed vegetable with chili paste rather than meat. The elderly respondents who were farmer had home-grown vegetable for household consumption.

The economic situation also affected the consumption and livelihood of the respondents. The respondents who had sufficiency income develop Hypertension more slightly than the respondents who had insufficiency income.

The respondents who did not have the immediate family member (genetic) experience Hypertension tended to develop Hypertension more slightly than the respondents who had the immediate family member (genetic) experience Hypertension. The genetic seems to be one of the non significant factors caused Hypertension.

Life-style found that the respondents who did not smoke in the past behavior could have the potential in developing Hypertension more slightly than the respondents smoked in the past behavior. Smoking seems to be one of the non significant factors caused Hypertension. Hypertension in the elderly respondents who did not smoke in the present behavior and those who smoked are likely similar. Other Life-style that could develop Hypertension were alcohol drinking, dietary, exercise, and stress. In the mean time, the respondents who had the past behavior of drinking could less develop Hypertension than the respondents who did not drink in the past behavior. The respondents who had the present behavior of drinking could significantly less develop Hypertension than the respondents who did not drink in the present behavior. One third of the respondents who had the present behavior of drinking develop Hypertension while only one fifth of the respondents who had the present behavior of drinking develop Hypertension. It could say that the respondents who had the present behavior of drinking and had Hypertension realized the risk factor of Hypertension and were careful of drinking due to the physician's advice. Another condition was that the study was not extended to the weekly frequency of drinking. The research disputed with the study of Nualjinda et al. (1991) which concluded the physical need of the National elderly population in term of dietary. Other than carbohydrate required in their meal, the elderly also needed to have vegetable, fruit, health drink such as juice, tea, coffee, meat, and seafood, small amount of fat from time to time. The alcohol drink was not requested as part of the meal.

The respondents who had high saturated salt consumption in the past behavior could develop Hypertension more than the respondents who did not have high salt

consumption. One third of the respondents who had high salt consumption developed Hypertension. Only one fifth of the respondents who had high salt consumption developed Hypertension. The experiment showed the relationship of the high salt consumption and Hypertension with the significant statistic level at  $p < 0.05$ .

The respondents who had high salt consumption in the present behavior could develop Hypertension more than the respondents who did not have high salt consumption. One third of the respondents who had high salt consumption developed Hypertension. Only one fifth of the respondents who did not have high salt consumption developed Hypertension.

The respondents who had high fat consumption in the past behavior could develop Hypertension more slightly than the respondents who did not have high fat consumption. Even though high fat consumption was considered as one of the risk factors caused Hypertension, the research did not specify the quality of the high fat consumption which developed Hypertension in the elderly respondents. The respondents who had high fat consumption in the present behavior could develop Hypertension more slightly than the respondents who did not have high fat consumption. It disputed to the study of Nualjinda et al. (1991) which concluded the physical need of the National elderly population in terms of dietary. Other than carbohydrate required in their meal, the elderly also needed to have vegetable, fruit, health drink such as juice, tea, coffee, meat, and seafood, small amount of fat from time to time. The alcohol drink was not requested as part of the meal.

The respondents who had normal Body Mass Index had more slightly tendencies in developing Hypertension than the respondents who had Body Mass Index over the normal level.



The tendencies of Hypertension development in the respondents who had regular exercise and lacked of exercise were nearly similar.

In relation to Basic Activities of Daily Living performance, the elderly respondents who had the disability conditions developed Hypertension more than those who did not have the Disability Conditions. All of the respondents who had the disability conditions developed Hypertension while only one third of the respondents who did not have the disability conditions developed Hypertension. Hypertension affected directly toward Basic Activities of Daily Living performance such as walking, and exercise. This result was corresponding to the study of Thailand Health Research Institute in 1998 which indicated that chronic diseases in the elderly population were 19% of the National elderly population. The degree of Functional Disability intensity came with age. The study also found that 5% of the National elderly population had serious physical disability which required around the clock care. It was contrast to the study of Siripanit (1999) on the Functional Disability of Thai elderly that the diseases which caused the Functional Disability in elderly may not always led to the disability in elderly. The respondents who had the duration of health problem more than six months or within two weeks could have the similar likelihood in developing Hypertension.

### **5.3 Recommendations**

#### **Past 1 Recommendations from this study**

This study which examined the hypertension prevalence and factors among the elderly residing in Din Udom sub-district, Lamtub district, Krabi province found that most of the elderly with hypertension were in the late seventies (age over 75 years)

and among the research populations, the majority of them were aged between 60-74 years and individuals at high risk of developing hypertension were also in this age group. There fore, public health personnel should seek strategies to control and prevent the incidence of hypertension and other subsequent illnesses among the elderly and involve caregivers and relatives of the elderly in the process. It would bring the caregivers, relatives and the elderly closer and create supportive and understanding atmosphere which results in good physical and mental health of the elderly and their quality of life improvement. Strategies for research and general populations are presented as follows;

## **1. Research populations**

### **1.1 Research populations with diagnosis of normal blood pressure**

- They should be educated on prevention and care of possible illnesses with emphasis on hypertension.
- Findings of this study should be presented in the meeting of District Health Coordinating Committee and utilized as the health and hypertension screening practice with patients aged over 15 years.
- In case of patients at high risk of developing hypertension, they should be educated and advised on prevention of hypertension and related illnesses.
- Awareness raising campaigns should be conducted and the campaigns should focus on illnesses which could happen to the elderly including hypertension and other subsequent illnesses.

## 1.2 Research populations with diagnosis of high blood pressure

- Follow-up appointments should be arranged for them to have blood pressure screening once a month to prevent the development of other related illnesses; such as, paralyze, heart diseases, liver diseases, atherosclerosis, heart failure, etc.
- Home visits should be organized and implemented. Public health personnel should visit the elderly at high risk of developing hypertension to give advice and information for their caregivers, relatives and also the elderly themselves about how to take care of the elderly, prevention of over 6 month chronic illnesses or new subsequent illnesses and domestic and non-domestic accident precautions.

## 2. General populations

2.1 Health and community related information and materials should be provided and developed as learning resources (community learning center) for local people and it could be one of channels to pass on local wisdoms to the next generation.

2.2 Findings should be shared with Tambon Administrative Organizations (TAOs) and used in the local planning. A Community Learning Center should be proposed to TAOs for the set up as a learning place for local people and as a common area for the elderly to organize activities. This would make local people realize the importance of care for the elderly and become cooperative.

2.3 Campaigns and activities should be conducted on the 13th of April which is Thailand's Elderly Day and also on the 1st of October which is declared by

United Nations as the World's Elderly Day, therefore community organizations, caregivers and families with elderly members are aware of the importance of the elderly and they will become more involved in the health care of the elderly.

2.4 People of all age groups (children, adults and the elderly) should be well-prepared before entering the elderly years, therefore they grow older with good quality of life and health security and become skilled individuals with high productivity.

2.5 Social systems and mechanisms should be established to create and facilitate supportive atmospheres for the healthy aging society.

2.6 Families and communities should be strengthened, therefore they can handle problems of the elderly.

2.7 Social, cultural and physical atmospheres should be managed appropriately for the healthy aging society.

2.8 Opportunities for capacity development should be given to the elderly, therefore they can maximize their capacities to the fullest.

## **Past 2 Recommendations for future studies**

1. Future studies should focus on the hypertension prevalence of the elderly in the whole district or province, therefore findings represent all of the elderly populations and can be used as the baseline data in developing interventions at the provincial level.

2. Safe exercise and proper time duration for the elderly should be investigated to prevent accidents and illnesses among the elderly.

3. Studies on capacity building of community and family leaders for behavior change and monitoring food consumption to prevent hypertension, health problems and subsequent chronic illnesses should be conducted.

4. Opinions of representatives of organizations in communities, caregivers and families of the elderly towards health services and welfares for the elderly should be explored.