

The Relationship of Herbal Medicine Consumption Habits with Quality of Life Among Farmers with Chronic Diseases

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ABSTRACT

Chronic diseases can occur due to unhealthy lifestyle changes that disrupt daily activities and decrease quality of life. This study aims to analyse the relationship of herbal medicine consumption habits with quality of life among farmers with chronic diseases. This study is an observational analytic study with cross-sectional approach. The study was conducted in Marga Agung Village, Jati Agung District, South Lampung in May-October 2024. The variables used were herbal medicine consumption habits and quality of life. Sampling technique using simple random sampling of 42 farmers. The sample inclusion criteria in this study include aged 25-65 years, able to read and write, and willing to be respondents. The exclusion criteria in this study include households who have a history of complicated diseases. The independent variables in this study is herbal medicine consumption habits and dependent variable is quality of life. Herbal medicine consumption habits was measured using a questionnaire and quality of life was measured using the WHOQOL-BREF questionnaire, which has 4 domains consisting of physical health, psychological health, social relationships, and family environment. The collected data was then edited, coded, processed, and cleaned. Data analysis using the Chi-Square test. There is a relationship between the herbal medicine consumption habit and quality of life in the psychological ($p=0,049$) and environmental domains ($p=0,049$), but it is not related to the physical ($p=1,000$) and social dimensions (0,708).

Keywords: Consumption, farmers, herbal medicine, quality of life.

INTRODUCTION

Quality of life is one of the important factors in human life. This is related to morbidity and mortality. Quality of life is a multidimensional concept that includes physical, psychological, social and environmental dimensions related to a person's condition, health disorders, diseases and therapy. One of the efforts that can be made to maintain health and is one way to treat a disease is by consuming herbal medicine (Pane et al., 2021).

Herbal medicine is a medicine that comes from plants that are processed or extracted in such a way that they become powder, pills or liquids that do not use chemicals in the process. As is known, herbal medicine can cure diseases with minimal side effects because it is made from natural ingredients, unlike synthetic drugs that can cause side effects either directly or after a long time. Herbal medicines are a mixture of many active ingredients. There are 3 types of herbal medicines, namely: herbal medicine, standardized herbal medicine and phytopharmaceuticals (Muslimah, 2024).

Consuming herbal medicine that is sufficient according to needs can provide benefits for the body. Herbal medicine is a traditional medicine that is important for maintaining health and recovering from disease disorders. Herbal medicine is a traditional medicine that is cheap, easy to use and affordable. Herbal medicine also has minimal effects compared to chemical drugs or synthetic drugs (Shinkai et al., 2024).

World Health Organization (WHO) reports that 70-80% of the world's population relies on herbal sources as their main medicine. The use of herbal medicine is not only popular among individuals, but also among primary health

care providers in developing countries (Perwitasari et al., 2016).

Research conducted by the World Health Organization (WHO) in several countries such as Asia, Africa, and America uses herbal medicine to treat diseases as a second alternative treatment. Even in Africa, herbal medicine for primary treatment has been used by almost 80% of the population. Indonesia has more than 400 ethnicities and sub-ethnicities spread throughout Indonesia. The use of traditional medicine in several regions such as Java, Sunda, Manado, Kalimantan, and various other regions is a hereditary heritage that is further developed through scientific testing (Adiyasa & Meiyanti, 2021).

In recent years, the use of herbal medicines among the general public has increased dramatically. Many reports indicate that herbal medicines are often taken in conjunction with conventional therapies. Although herbal medicines are generally considered safe when used alone at recommended doses and times, there is increasing evidence of drug-herbal interactions that can cause serious side effects or failure of therapy with conventional medicines, from the results of studies there are negative side effects of the use of herbal medicines in conjunction with conventional drugs such as bleeding tendencies caused by ginkgo and aspirin interactions (Han et al., 2022).

Although traditional medicine is popular among the community, most of them only have limited knowledge about the various types of traditional medicine and their properties. When viewed in terms of safety and benefits, the use of traditional medicine can support people's quality of life (Lee et al., 2023).

Previous studies have found that there is a relationship between herbal medicine consumption habit and quality of

life, although the results vary. Some studies found a positive correlation, especially in pregnant women (Peltzer & Pengpid, 2019), while other studies did not find a significant relationship (Yin et al., 2013). These differences in results may be due to the type of herbal medicine used, frequency of consumption, and individual health factors (Asiimwe et al., 2023). Regular consumption of herbal medicine can help maintain health (Shinkai et al., 2024). However, its effectiveness and impact on quality of life can vary. This research is important to conduct, because it aims to prove the relationship between herbal medicine consumption habit and quality of life in Indonesia, especially in Lampung.

Based on the description of the background of the problem above, the researcher wants to conduct a study about the relationship between herbal medicine consumption habits and quality of life in farmers.

METHODS

This study is an observational analytical quantitative study with a cross-sectional approach. This research was submitted to the Medical Research Ethics Committee of the University of Lampung with the number 3466/UN26.18/PP.05.02.00/2024. This study analyse the relationship between herbal medicine consumption habits and quality of life in farmers. It was conducted in Marga Agung Village, Jati Agung District, South Lampung, for six months from May to October 2024. The population of this study is all households in Marga Agung Village, totalling 4,395 households and 42 samples calculated using the Slovin formula with a degree of error of 0.05. This study used simple random sampling. The inclusion criteria in this study include aged 25-65 years old, able to read and write, and willing to be respondents. The exclusion criteria in this study include households who have a history of complicated diseases. The independent variable in this study is herbal medicine consumption habits and dependent variable is quality of life.

Herbal medicine consumption habits was measured using a questionnaire and quality of life was measured using the WHOQOL-BREF questionnaire, which has 4 domains consisting of physical health, psychological health, social relationships, and family environment. The collected data was then edited, coded, processed, and cleaned. Data analysis using the Chi-Square test.

RESULTS AND DISCUSSION

The research results present univariate analysis in the form of percentages and bivariate analysis using the Chi-Square test as follows.

Table 1 . Characteristics of Respondents

Characteristics	n	%
Age		
<35 years	12	28.6
>35 years	30	71.4
Gender		
Male	18	42.9
Female	24	57.1
Education		
High	3	7.1
Middle	36	85.8

Characteristics	n	%
Low	3	7.1
Chronic diseases		
Diabetes	3	7.1
Hypertension	36	85.8
Total	42	100.0

Source: primary data (n=42)

The research results found that most respondents were aged >35 years (71.4%), female (57.1%), middle education (85.8%) and hypertension (85.8%).

Based on the previous studies, the average age of onset of chronic disease is around 44-45 years in the 45-54 age group. The elderly aged 65 and above, are also very susceptible to chronic disease. In fact, most adults over 65 have one or more chronic conditions (Prihartono et al., 2022), (Shinkai et al., 2024).

Men and women are equally at risk for chronic diseases, but there are differences in the types of diseases that are more common and their prevalence (Susanto et al., 2023). In general, men are at higher risk for heart disease, cancer, and respiratory diseases such as chronic obstructive pulmonary disease. In contrast, women are at higher risk for diabetes and autoimmune diseases. Women are more susceptible to chronic diseases due to several factors. Smaller lung airways increase the risk of chronic obstructive pulmonary disease. In addition, hormonal factors such as earlier menstruation, later menopause, and first pregnancy at a later age also contribute to chronic diseases (Han et al., 2022).

Low education is often related with an increased risk of chronic diseases. Individuals with low levels of education tend to be more susceptible to various chronic diseases such as diabetes, hypertension, heart disease, and various other diseases due to several factors, including lack of knowledge about healthy lifestyles, access to better health services, and adequate social support (Muslimah, 2024).

Table 2 . Herbal Medicine Consumption Habit and Quality of Life

Variables	n	%
Herbal Medicine Consumption Habit		
Yes	9	21.4
No	33	78.6
Physical domain		
Good	27	64.3
Bad	15	35.7
Psychological domain		
Good	15	35.7
Bad	27	64.3
Social domain		
Good	24	57.1
Bad	18	42.9
Environmental domain		
Good	15	35.7
Bad	27	64.3

Source: primary data (n=42)

The results of the study found that most respondents did not have the habit of herbal medicine consumption (78.6%), and good quality of life in the physical (64.3%) and social (57.1%), bad quality of life on psychological (64.3%), and environmental domains (64.3%).

The lack of interest of the community, especially the younger generation, to drink herbal medicine is caused by several factors, one of which is the lack of knowledge about the benefits and how to use herbal medicine properly (Bruni et al., 2021). In addition, negative perceptions of herbal medicine, such as its bad taste and the impression of being an old-fashioned drink, are also obstacles (Muslimah, 2024).

A good quality of life of farmers with chronic diseases can be achieved through a comprehensive approach, including increasing knowledge, health support, and lifestyle changes (Vaezi et al., 2021). Better knowledge about preventing chronic diseases, such as hypertension and diabetes, is essential. In addition, adequate health support, including access to medical services and health insurance, also plays an important role in improving their quality of life. Lifestyle changes, such as a healthy diet, regular exercise, and avoiding smoking, can help prevent or manage chronic diseases (Asiimwe et al., 2023).

Bad quality of life of farmers with chronic diseases can occur due to various factors, including the physical and mental impact of the disease, as well as unhealthy lifestyles that can worsen the condition of the disease. Chronic diseases such as hypertension, diabetes, and obesity can cause a significant decrease in quality of life, both in physical, psychological, and social aspects (Adiyasa & Meiyanti, 2021).

Table 3 . The Relationship Between Herbal Medicine Consumption Habits and Physical Domain

Herbal Medicine Consumption Habit	Physical Domain		p-value
	Good n (%)	Bad n (%)	
No	21 (63.6)	12 (36.4)	1.000
Yes	6 (66.7)	3 (33.3)	
Total	27 (64.3)	15 (35.7)	

Source: primary data (n=42)

The analysis found that most of the quality of life in the good physical domain were those who consumed herbal medicine (66.7%), while the quality of life in the bad physical domain were those who did not consume herbal medicine (36.4%). There was no relationship between herbal medicine consumption and quality of life in the physical domain ($p=1,000$).

Quality of life in the physical dimension in farmers is a state in which all organs and body systems function well, so that individuals can carry out daily activities comfortably and without pain or complaints. This involves physical fitness, strength, and flexibility of the body (Pane et al., 2021). Drinking herbal medicine regularly can provide benefits for physical health, such as maintaining endurance, helping to overcome minor health problems, and supporting overall health. However, the effects can vary depending on the type of herbal medicine, dosage, and individual health conditions. Herbal medicine made from rhizomes such as turmeric can increase endurance. Curcumin in turmeric have anti-inflammatory that contribute to increasing endurance. Herbal medicines have various contents that can affect smooth blood circulation and prevent blood clots. The effect

can increase body fitness which can improve quality of life (Peltzer & Pengpid, 2019).

Research shows that consuming traditional herbal medicine can improve physical health. Several studies have shown that herbal medicine, especially those containing ingredients such as temulawak, can increase endurance and immunity (Salm et al., 2023). Further research is needed to understand the impact and effectiveness of herbal medicine in more detail on various aspects of physical health (Mumtazah et al., 2023).

Table 4 . The Relationship Between Herbal Medicine Consumption Habits and Psychological Domain

Herbal Medicine Consumption Habit	Psychological Domain		p-value
	Good n (%)	Bad n (%)	
No	9 (27.3)	24 (72.7)	0.049
Yes	6 (66.7)	3 (33.3)	
Total	15 (35.7)	27 (64.3)	

Source: primary data (n=42)

The analysis found that most of the quality of life in the good psychological domain were those who consumed herbal medicine (66.7%), while the quality of life in the bad psychological domain were those who did not consume herbal medicine (72.7%). There was a relationship between herbal medicine consumption and quality of life in the psychological domain ($p=0.049$).

Quality of life in the psychological dimension refers to the overall condition of a person's mental, psychological, and emotional aspects. It focuses on health promotion, disease prevention, and treatment. It includes an understanding of how a person's thoughts, feelings, and behaviors interact with physical and mental health. Good psychological health is essential to overall well-being (Perwitasari et al., 2016).

Drinking herbal medicine, in addition to being beneficial for physical health, can also improve psychological quality of life. The culture of drinking herbal medicine in Indonesia is not only related to maintaining physical health, but also to emotional and mental aspects. Research shows that consuming herbal medicine can have a positive effect on mood, reduce stress, and improve sleep quality (Han et al., 2022).

Based on the previous studies, research on drinking herbal medicine shows that regular consumption of herbal medicine can improve physical health, which in turn can have a positive impact on psychological health. The studies show that people feel fresher and fitter after consuming herbal medicine (Rodriguez-Fragoso et al., 2008). Further research is needed to specifically measure the direct impact of herbal medicine on psychological health, such as stress reduction or improved mood. The public's understanding of herbal medicine, which is often related with healing physical illnesses, needs to be expanded to include potential benefits for mental well-being (Tang et al., 2016).

Table 5 . The Relationship Between Herbal Medicine Consumption Habits and Social Domain

Herbal Medicine Consumption Habit	Social Domain		p-value
	Good n (%)	Bad n (%)	
No	18 (54.5)	15 (45.5)	0.708
Yes	6 (66.7)	3 (33.3)	
Total	24 (57.1)	18 (42.9)	

Source: primary data (n=42)

The analysis found that most of the quality of life in the good social domain were those who consumed herbal medicine (66.7%), while the quality of life in the bad social domain were those who did not consume herbal medicine (45.5%). There was no relationship between herbal medicine consumption and quality of life in the social domain ($p=0.708$).

Quality of life in the social dimension is a person's ability to interact positively and meaningfully with others, the environment, and the community. This includes healthy relationships and the ability to communicate effectively. Social health also involves the ability to form good relationships (Arsa et al., 2023). In other words, it is an aspect of well-being that focuses on the interpersonal relationships and social interactions of individuals. Drinking herbal medicine, as part of culture and tradition, can have an impact on the quality of social life, both directly and indirectly (Bouquoufi et al., 2023).

Research shows that consuming herbal medicine can improve physical health, such as increasing the body's immunity, which can indirectly impact social health (Wojewódzka-Wiewiórska et al., 2020). Other studies also indicate public acceptance of herbal medicine as an alternative treatment, especially among the lower middle class. Improved physical health can improve social participation and quality of life. However, specific information on how herbal medicine consumption directly affects social health (e.g., social interaction, social support) is still limited and requires further research (Sumngern et al., 2011).

Table 6 . The Relationship Between Herbal Medicine Consumption Habits and Environmental Domain

Herbal Medicine Consumption Habit	Environmental Domain		p-value
	Good n (%)	Bad n (%)	
No	9 (27.3)	24 (72.7)	0.049
Yes	6 (66.7)	3 (33.3)	
Total	15 (35.7)	27 (64.3)	

Source: primary data (n=42)

The analysis found that most of the quality of life in the good environmental domain were those who consumed herbal medicine (66.7%), while the quality of life in the bad environmental domain were those who did not consume herbal medicine (72.7%). There was a relationship between herbal medicine consumption and quality of life in the environmental domain ($p=0.049$).

Drinking herbal medicine regularly can improve the quality of life of the environment in several ways. First, the use of natural ingredients in herbal medicine can help maintain environmental sustainability, such as the use of roots and plants that do not damage the ecosystem (Peng et al., 2022). Second, herbal medicine can also help reduce the use of chemical drugs that often have a negative impact on the environment. Third, the tradition of drinking herbal medicine can be an effort to preserve local culture and wisdom, which also plays a role in maintaining the diversity of nature and culture (Kusuma et al., 2020).

Herbal medicine contains various ingredients such as turmeric and cinnamon, have blood-thinning properties and help prevent blood clots from forming. The effects can improve physical fitness which can improve quality of life.

Research shows that herbal medicine consumption has a positive relationship with improving quality of life in several health conditions. Studies have found a relationship between herbal medicine consumption and quality of life in people with hypertension and pregnant women. The effectiveness of herbal medicine as a therapy for insomnia and its impact on quality of life also requires further research. The benefits of herbal medicine are diverse, but further research is needed to understand its mechanisms and effectiveness comprehensively (Ssempijja et al., 2020).

CONCLUSION

The results of the study found that most respondents had a habit of not herbal medicine consumption, also the quality of life in the physical, psychological, social and environmental dimensions was good. There was a relationship between herbal medicine consumption and quality of life in the psychological and environmental dimensions, while in the physical and social dimensions there was no relationship.

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