

## The use of traditional health care among Indonesian Family

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### Abstrak

**Latar belakang:** Penggunaan obat tradisional, pengobatan komplementer dan alternatif meningkat selama beberapa tahun terakhir. Alasan utama meningkatnya penggunaan obat tradisional adalah pasien mengambil pendekatan yang lebih proaktif untuk kesehatan mereka dan mencari berbagai bentuk perawatan. Penelitian ini bertujuan untuk mengidentifikasi faktor dominan yang berhubungan dengan pemanfaatan pelayanan kesehatan tradisional pada rumah tangga di Indonesia

**Metode:** Penelitian ini menggunakan data rumah tangga dari data Riskesdas tahun 2013. Jumlah data yang dianalisis sebesar 294.959 subjek. Analisis data menggunakan analisis kompleks sampel dengan regresi logistik untuk memperoleh faktor dominan yang berhubungan dengan pemanfaatan pelayanan kesehatan tradisional pada rumah tangga di Indonesia

**Hasil:** Sebanyak 294.959 subjek pada penelitian ini. Proporsi subjek yang memanfaatkan pelayanan kesehatan tradisional adalah 30,4% (89.752/294.959). Faktor risiko dominan yang berhubungan dengan pemanfaatan pelayanan kesehatan tradisional adalah wilayah tempat tinggal, tingkat pendidikan, status pekerjaan, status ekonomi, dan ketersediaan pelayanan kesehatan. Dibandingkan dengan rumah tangga yang tinggal di pedesaan, rumahtangga yang berada di perkotaan berpeluang 1,09 kali memanfaatkan pelayanan kesehatan tradisional [rasio odds suaian (ORa)= 1,09; 95% CI= 1,04 to 1,14]. Rumah tangga yang tingkat pendidikannya rendah berpeluang 1,10 kali memanfaatkan pelayanan kesehatan tradisional (ORa=1,10; 95% CI=1,03 to 1,18). Rumah tangga dengan pekerjaan swasta berpeluang 1,33 kali memanfaatkan pelayanan kesehatan tradisional (ORa=1,33; 95% CI=1,25 to 1,41). Rumah tangga yang memiliki tingkat ekonomi tinggi berpeluang 1,31 kali memanfaatkan pelayanan kesehatan tradisional (ORa=1,31; 95% CI=1,23 to 1,41). Rumah tangga yang mengetahui ketersediaan pelayanan kesehatan berpeluang 1,44 kali memanfaatkan pelayanan kesehatan tradisional (ORa=1,44; 95% CI=1,29 to 1,60).

**Kesimpulan:** Rumah tangga yang tinggal di perkotaan, memiliki tingkat pendidikan rendah, pekerja swasta, memiliki status ekonomi yang tinggi, mengetahui ketersediaan pelayanan kesehatan, lebih berpeluang memanfaatkan pelayanan kesehatan tradisional. (*Health Science Journal of Indonesia 2016;8(1):30-35*)

**Kata kunci:** pelayanan kesehatan tradisional, rumah tangga, Indonesia

### Abstract

**Background:** The use of traditional medicine and complementary and alternative medicine has increased significantly over the past few years. The main reasons for the increasing use of traditional medicine is a growing trend for patients to take a more proactive approach to their own health and to seek out different forms of self-care. This study aimed to investigate the dominant risk factors that related to use of traditional health care among Indonesian family

**Methods:** The study used households data from 2013 National Health Survey Indonesia. Using logistic regression, we then could present dominant risk factors that related to use of traditional health care among Indonesian family

**Results:** Total subjects had been analyzed were 294,959 subjects. The subjects of this study were heads or members of households. The proportion of those who used of traditional health care were 30,4% (89,752/294,959). Dominant risk factors related to used of traditional health care were types area, levels of education, employment status, levels of economic, and knowing about the availability of health care. Compared with those who were in rural, those who were in urban had 1.09 more likely to used of traditional health care [odds ratio adjusted (ORa)=1.09; 95% CI= 1.04 to 1.14]. Households who had low education level had 1.10 more likely to used of traditional health care (ORa=1.10; 95% CI=1.03 to 1.18). Households who were private employees had 1.33 more likely to used of traditional health care (ORa=1.33; 95% CI=1.25 to 1.41). Households who had high economic level had 1.31 more likely to used of traditional health care (ORa=1.31; 95% CI=1,23 to 1,41). Furthermore, households who knowing about the availability of health care had 1.44 more likely to used of traditional health care (ORa=1,44; 95% CI=1,29 to 1,60).

**Conclusion:** Households subjects who were in urban area, private employees, had low level of education and high economic, knowing the availability of health services were more likely to used of traditional health care. (*Health Science Journal of Indonesia 2016;8(1):30-35*)

**Keywords:** traditional health care, households Indonesia

The use of traditional medicine and complementary and alternative medicine has increased significantly over the past few years. Almost half the population in many industrialized countries now regularly use some form of T/CAM (United States, 42%<sup>1</sup>; Australia, 48%<sup>2</sup>; France, 49%<sup>3</sup>; Canada, 70%<sup>4</sup>), and considerable use exists in many developing countries (China, 40%; Chile, 71%; Colombia, 40%; up to 80% in African countries<sup>5,6</sup>).<sup>1</sup>

Traditional medicine is the sum total of the knowledge, skill, and practices based on the theories, beliefs, and experiences indigenous to different cultures, whether explicable or not, used in the maintenance of health as well as in the prevention, diagnosis, improvement or treatment of physical and mental illness. The terms “complementary medicine” or “alternative medicine” refer to a broad set of health care practices that are not part of that country’s own tradition or conventional medicine and are not fully integrated into the dominant health-care system. They are used interchangeably with traditional medicine in some countries.<sup>2</sup>

Traditional medicine and complementary medicine is widely used around the world and valued for a number of reasons. For many millions of people, herbal medicines, traditional treatments, and traditional practitioners are the main source of health care, and sometimes the only source of care. This is care that is close to homes, accessible and affordable. It is also culturally acceptable and trusted by large numbers of people. The affordability of most traditional medicines makes them all the more attractive at a time of soaring health-care costs and nearly universal austerity. Traditional medicine also stands out as a way of coping with the relentless rise of chronic non-communicable diseases.<sup>2</sup>

The main reasons for the increasing use of traditional medicine is a growing trend for patients to take a more proactive approach to their own health and to seek out different forms of self-care.

The public in many countries is using health care services that are outside the purview and understanding of the dominant medical system. Complementary and traditional medical services are often used alongside (and in addition to) conventional medical treatments.<sup>1</sup>

Health care utilization is the use of health care services by people.<sup>3</sup> It is the objective of policy makers that

health facilities are used whenever necessary. The health care utilisation of a population is related to the availability, quality and cost of services, as well as to social-economic structure, and personal characteristics of the users.<sup>4,5,6</sup> Social, cultural, and political values, as well as socioeconomic factors, influence T/CAM use in industrialized societies.<sup>7,8,9,10</sup>

In most developing nations, distance plays a key role in determining utilization of health services. Buor found that distance is the most important factor that influences the utilization of health services in the Ahafo-Ano south district of Ghana.<sup>11</sup> In a study in rural areas in Nigeria on the effects of distance on utilization revealed that longer travel times and greater distances to health centers in rural areas constituted barriers to repeated visits.<sup>3</sup>

This study aimed to identify risk factors that related to use of traditional health care among Indonesian family

## METHODS

This analysis used households data of the National Basic Health Research (Riskesdas) data year 2013 in Indonesia. Riskesdas 2013 was a cross-sectional community based study designed mainly to describe health problem of Indonesians and oriented to the evaluation of achievement of health indicator. The population of Riskesdas 2013 was all households in 33 provinces, 497 districts. Samples of households and household members in Riskesdas 2013 was designed separately to the sample list of households and household members from national economic survey (Susenas) 2013. The number of samples analyzed were 294,959 households.<sup>12</sup>

The collection of Riskesdas 2013 data was using households and individual questionnaires. Data was conducted by interview using questionnaires and questionnaire’s guidelines. Respondents for household questionnaire were heads of households or housewives or members of households that can provide information. In households questionnaire contained information on whether all members of the households were interviewed directly, accompanied, represented, or not at all were interviewed.<sup>12</sup>

The collection of individual data on the various age groups conducted by interview using a individual questionnaire. Respondents for individual questionnaire

were every member of the households. Especially for household members who aged less than 15 years or the respondents who were sick, interviews were conducted to other members of households who could accompany. Before the Riskesdas data collection in the field, enumerators were trained by the technical team Riskesdas.<sup>12</sup>

The quality assurance of 2013 Riskesdas data had been done by testing the instruments and doing validation. The testing of instruments was conducted by researchers, academia, and professional organizations. Validation was done by a team of universities (Indonesia, Airlangga, and Hasanuddin Universities).<sup>12</sup>

Management process of Riskesdas 2013 data consisted of two stages. The first stage was done at the districts or cities that consisted of activities: data collection, receiving-batching, editing, data entry, and electronic data transmission. The second phase was done in the center working unit consisting some activities some reception and aggregation of data across districts or cities, data cleaning, provincial data merging, combining national data, national data cleaning, imputation, weighting, and electronic data storage.<sup>12</sup>

The data consisted of household data as use of traditional health care, types of traditional health care, types of area, the levels of education of household heads, household heads employment status, types of occupation of household heads, household quintiles, the availability of health facilities and the travel time to health facilities. The types of traditional health care were herbs and skill. Types of area were urban and rural. The levels of education of households head were high, medium, and low. The status of head household employment were employed, and unemployed. The households expenditure quintiles were quintile 1 to quintile 5. The availability of health facilities were knowing of respondents about the availability of health care in respondents' residency.

Risk factors that related to use of traditional health care among Indonesian family were analyzed using the complex sample analysis with logistic regression.

Ethical clearance was granted from the Research Ethical Commission of Institute for Health Research and Development, Ministry of Health.

## RESULTS

Table 1 showed that the proportion of households that used of traditional health care were 30.4%

(78,775/294,959). Those who used of traditional health care and did not use of traditional health were differently distributed with respect to type area, level of education, employment status, level of economic, and knowing about the availability of health care.

Table 2, the final model shows that types area, levels of education, employment status, levels of economic, and knowing about the availability of health care as dominant factors related to used of traditional health care. Compared with those who were in rural, those who were in urban 1.09 more likely to used of traditional health care. Households who had lower education level had 1.10 more likely to used of traditional health care. Heads of households who were private employees had 1.33 more likely to used of traditional health care. Households who had high economic level had 1.31 more likely to used of traditional health care. Furthermore, households who knowing about the availability of health care had 1.44 more likely to used of traditional health care.

## DISCUSSION

The purpose of study was to identify potential risk factors affecting use of traditional health care among Indonesian families. Social, cultural, and political values, as well as socioeconomic factors, influence traditional medicine and complementary and also alternative medicine (T/CAM) use in industrialized societies. In developing countries, the affordability, availability, and cultural familiarity of traditional medicine, as well as family influences, contribute to the continued use of traditional medical providers and medicines.

The proportion of households who used of traditional health care were 30.4% (78,775/294,959). Those who used of traditional health care and did not use of traditional health were differently distributed with respect to type area, level of education, employment status, level of economic, and knowing about the availability of health care.

Traditional medicine therapies are commonly used in developing countries because they are often more widely available and more affordable than conventional therapies. In addition, because Traditional medicine practices are, often, woven into everyday life and belief systems, and because traditional healers are trusted members of the community, Traditional medicine is often the first source of health care at the community level. Conventional health care may be a last resort, especially if the nearest primary health care facility is some distance from the community.<sup>2</sup>

Table 1. Several characteristics and risk of use of traditional health care among Indonesian family

Variable	Use of traditional health				Crude Odds ratio	95% confidence interval	P
	Yes (n=89,752)		No (n=205,207)				
	n	%	n	%			
<b>Area</b>							
Rural	41857	28.7	104148	71.3	1.00	Reference	
Urban	47895	32.2	101059	67.8	1.18	1.13-1.23	0.001
<b>Level of education</b>							
Low	47768	30.2	110245	69.8	1.00	Reference	
Middle	35066	30.2	81000	69.8	1.01	0.97-1.03	0.959
High	6918	33.1	13962	66.9	1.14	1.07-1.22	0.001
<b>Occupation status</b>							
Unemployed	10685	28.1	27388	71.9	1.00	Reference	
Military/police/civil	4585	32.1	9715	67.9	1.21	1.13-1.29	0.001
Privat employees	13010	34.5	24696	65.5	1.35	1.27-1.43	0.010
Entrepreneur	19227	31.9	41098	68.1	1.20	1.14-1.26	0.001
Labor and other	42245	29.2	102309	70.8	1.06	1.01-1.10	0.001
<b>Economic status</b>							
Quintiles 1	11954	26.0	33946	74.0	1.00	Reference	
Quintiles 2	16540	29.1	40350	70.9	1.16	1.10-1.23	0.001
Quintiles 3	19491	30.4	44571	69.6	1.24	1.17-1.31	0.001
Quintiles 4	22775	32.5	47246	67.5	1.34	1.29-1.45	0.001
Quintiles 5	18993	32.7	39094	67.3	1.38	1.30-1.47	0.001
<b>Knowing about the availability of health care</b>							
Not available	1457	21.8	5220	78.2	1.00	Reference	
Available	88295	30.6	199987	69.4	1.58	1.42-1.76	0.001

Table 2. Several dominant factors and risk of use of traditional health care among Indonesian family

Variable	Use of traditional health				Adjusted Odds ratio*	95% confidence interval	P
	Yes (n=89,752)		No (n=205,207)				
	n	%	n	%			
<b>Area</b>							
Rural	41857	28.7	104148	71.3	1.00	Reference	
Urban	47895	32.2	101059	67.8	1.09	1.04-1.14	0.001
<b>Level of education</b>							
High	6918	33.1	13962	66.9	1.00	Reference	
Middle	35066	30.2	81000	69.8	0.94	0.89-1.01	0.005
Low	47768	30.2	110245	69.8	1.10	1.03-1.18	0.001
<b>Occupation status</b>							
Unemployed	10685	28.1	27388	71.9	1.00	Reference	
Military/police/civil	4585	32.1	9715	67.9	1.18	1.10-1.27	0.001
Privat employees	13010	34.5	24696	65.5	1.33	1.25-1.41	0.010
Entrepreneur	19227	31.9	41098	68.1	1.18	1.13-1.24	0.001
Labor and other	42245	29.2	102309	70.8	1.11	1.06-1.16	0.001
<b>Economic status</b>							
Quintiles 1	11954	26.0	33946	74.0	1.00	Reference	
Quintiles 2	16540	29.1	40350	70.9	1.14	1.08-1.20	0.001
Quintiles 3	19491	30.4	44571	69.6	1.20	1.13-1.27	0.059
Quintiles 4	22775	32.5	47246	67.5	1.31	1.23-1.39	0.001
Quintiles 5	18993	32.7	39094	67.3	1.31	1.23-1.41	0.002
<b>Knowing about the availability of health care</b>							
Not available	1457	21.8	5220	78.2	1.00	Reference	
Available	88295	30.6	199987	69.4	1.44	1.29-1.60	0.001

\*Adjusted each other between variables listed on this table



In resource-limited countries, especially in rural areas, there are usually fewer conventional health care practitioners than traditional medicine practitioners. In India, traditional medicine is the only available source of health care for a large part of the rural population.<sup>13</sup> This situation has been aggravated as large numbers of trained and licensed conventional health care workers leave their native countries for better opportunities elsewhere (the “brain drain” phenomenon); sub-Saharan Africa has been particularly hard hit.<sup>13</sup>

In developed countries, patients have become more informed about their health and use print media, television, and the Internet to get information on which to base their health decisions. As a result, alternative therapies are appealing because they are perceived as more natural and therefore safer compared to “manufactured” pharmaceutical products.<sup>14</sup> A perceptual difference between cultures may be that people in developing countries are more likely to view traditional medicine as their primary source of medical care, whereas people in developed countries generally view alternative treatments as complementary to, rather than competitive with, conventional medicine.

The findings of other studies found traditional medicine use was highest in India, 11.7% of people reported that their most frequent source of care during the previous 3 years was traditional medicine; 19.0% reported traditional medicine use in the previous 12 months. In contrast <3% reported traditional medicine as their most frequent source of care in China, Ghana, Mexico, Russia and South Africa; and <2% reported using traditional medicine in the previous year in Ghana, Mexico, Russia and South Africa. In univariate analyses, poorer, less educated and rural participants were more likely to be traditional medicine -users.<sup>15</sup>

Multivariate analysis showed that that type area, level of education, employment status, level of economic, and knowing about the availability of health care as dominant factors related to used of traditional health care. Compared with those who were in rural, those who were in urban had 1.09 more likely to used of traditional health care (ORa= 1.09; 95% CI= 1.04 to 1.14). Households who had low education level had 1.10 more likely to used of traditional health care (ORa=1.10; 95% CI=1.03 to 1.18).. Households who were privat employees had 1.33 more likely to used of traditional health care (ORa=1.33; 95% CI=1.25

to 1.41). Households who had high economic level had 1.31 more likely to used of traditional health care (ORa1,31; 95% CI=1,23 to 1,41). Furthermore, households who knowing about the availability of health care had 1.44 more likely to used of traditional health care (ORa=1,44; 95% CI=1,29 to 1,60).

In the China multivariate analysis, rurality, poor self-reported health and presence of arthritis were associated with TM use. In Ghana and India, lower income, depression and hypertension were associated with TM use.<sup>13</sup> Different from the findings in Ghana and India, others have found that those of a lower socio-economic status, who were unemployed, lived in rural areas and reported low health status were more likely to report use of traditional healers.<sup>16,17,18,19</sup>

In industrialized countries, members of the dominant culture who have lower incomes and educational levels tend not to use complementary medicine. This may be because they have less disposable income and less exposure to information about complementary therapies.

In conclusion, this study identified factors affection use of traditional health care among Indonesian families. Households who were in urban, had higher education level, were employed, had higher economic status, knowing about the availability of health care were more likely to use traditional health care.

Public in many countries are using health care services that are outside the purview and understanding of the dominant medical system. Complementary and traditional medical services are often used alongside (and in addition to) conventional medical treatments. It is necessity for health professionals to have regulation ofnpractitioners and guidelines for licensing and establishment of standards of practice.

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