

ASSESSMENT OF HEALTH CARE SEEKING BEHAVIOR AMONG HOUSEHOLD HEADS IN DALE WOREDA, SIDAMA ZONE; SOUTHERN ETHIOPIA.

BY: FIKRE BOJOLA (BSC.)

A RESEARCH TO BE SUBMITTED TO SCHOOL OF GRADUATE STUDY, INSTITUTE OF HEALTH SCIENCES, DEPARTMENT OF EPIDIMIOLOGY, IN PARTIAL FULFILLMENT OF THE REQUIREMENTS FOR MASTER DEGREE IN GENERAL PUBLIC HEALTH (GMPH).

> JIMMA, ETHIOPIA JUNE -2017





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Abstract

Back ground. Health seeking behavior refers to those activities undertaken by individuals in response to symptom experience. Timing and the types of treatment for sick women, children, adolescents, and the old household members are usually determined by household heads. There is limited information on level of health care seeking behavior and associated factors among house hold heads. Therefore, assessing factors associated with health care seeking behavior among house hold heads have important role to filling the information gap to control inappropriate health care seeking practice and its outcomes. Objective- To assess health care seeking behavior & its associated factor among house hold heads in Dale woreda from February to March 2017. Methods - A community based cross- sectional study was conducted in Dale woreda by using quantitative data collection methods. Stratified random sampling technique was employed to select household heads from rural and urban areas. A structured and pre-tested questionnaire was used. Data was entered into a computer using Epi data 4.13, and analyzed using SPSS for windows version 16. Result - A total of 804 household heads (625 rural and 179 urban) giving a response rate of 95.3 % were interviewed. Among the study participants male comprises 693(86.2%) and female comprises 111(13.8%). Majority of the sick individual lies at age group of 18-30 years which accounts for 372(46.3%). The overall appropriate health care seeking behavior of household heads was 585(72.8%) at the study area. Urban residence [AOR=3.32, 95% CI: 1.94, 5.68], high school and above educational level [AOR=4.26, 95%CI: 2.16, 8.43], Monthly income >=1170ETB [AOR=2.98, 95%CI: 1.37, 5.68] and Family size <5 [AOR=2.29, 95%CI: 1.64, 3.19] were independent predictor of health care seeking behavior. Conclusion -Urban residence, high school and above educational level, monthly income >=1170ETB and family size <5 were independent predictors of health care seeking behaviors. Recommendation. Different stake holders are recommended on, scaling up CBHI, implementation on fee waivers, awareness creation on modern health facility and further research based on residence. Key words- Appropriate health seeking behavior, inappropriate health seeking behavior, Keble, Urban, Rural

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Abbreviations

CSA-Central statics agency

- DHS- the Ethiopian Demographic and health Survey
- **GP-General practitioner**
- MOH- Ministry of health
- OR- Odds ratio
- SNNPR-Southern Nations Nationalities People Region
- SPSS-Statistical package for social science
- SRS- Simple random sample
- STD- Sexually Transmitted Diseases
- WHO-World health organization
- CBHI-Community based health insurance
- HHsT-Total house holds
- UHHsS-Urban households selected
- RHHsS-Rural households selected
- PPS- Proportional to population size.
- **RKS-Rural** kebeles selected
- UKS-Urban kebeles selected

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1. Introduction

1.1Background

Health seeking behavior in terms of illness behavior refers to those activities undertaken by individuals in response to symptom experience. Health seeking behavior is influenced by a large number of factors apart from knowledge and awareness. This behavior among different populations, particularly in the rural communities, is a complex outcome of many factors operating at individual, family and community level including their biosocial profile, their past experiences with the health services, influences at the community level, availability of alternative health care providers including indigenous practitioners and last but not the least their perceptions regarding efficiency and quality of the services. (3).

Health-seeking behavior studies acknowledge that health control tools, where they exist, remain greatly under or inadequately used. Understanding human behavior is prerequisite to change behavior and improve health practices. Experts in health interventions and health policy became increasingly aware of human behavioral factors in quality health care provision (2).

Health promotion programmers worldwide have long been premised on the idea that providing knowledge about causes of ill health and choices available will go a long way towards promoting a change in individual behavior, towards more beneficial health seeking behavior. However, there is growing recognition, in both developed and developing countries, that providing education and knowledge at the individual level is not sufficient in itself to promote a change in behavior. An abundance of descriptive studies on health seeking behavior, highlighting similar and unique factors, demonstrate the complexity of influences on an individual's behavior at a given time and place (4).

Generally it is recognized that indentifying and controlling the determinants associated with health care seeking behavior have positive impacts on modern health services utilization.

1.2 Statements of the problem

Health care seeking behavior is taking pragmatic decision to deal with health problems within the available resources.

A study conducted in Philippine showed availability of six treatment choices for families ranging from not doing anything or the patient' to 'treatment with drugs based on formal prescription'. Sources of health care identified in Uganda, included public health institutions, private practitioners, traditional healers and self-treatment (11, 12).

The study done in Pakistan showed that economic polarization within the society and lack of social security system make the poor more vulnerable in terms of affordability and choice of health provider. Poverty not only excludes people from the benefits of health care system but also restricts them from participating in decisions that affect their health, resulting in greater health inequalities. Cost has undoubtedly been a major barrier in seeking appropriate health care in many developing countries. Not only the consultation fee or the expenditure incurred on medicines count but also the far spent to reach the facility and hence the total amount spent for treatment turns out to be cumbersome. Consequently, household economics limit the choice and opportunity of health seeking (17).

The study done in south east Nigeria indicated that the initial choice of care was, government hospitals 339(27.1%) and the health centers 221(17.6%). About 147(11.7%) consulted traditional medicine healers for treatment, private clinics 29(2.3%), community health workers 24(1.9%). Only 43(3.4%) had their treatment at home (14).

The research done in Nigeria on need assessment and health care seeking behavior reveals that the most common factor is poverty (50.3%) followed by nature of illness (25.2%), quality of service provided (10.8%), attitude of health caregivers (3.6%), waiting time (3%), availability of service (2.8%), accessibility in terms of distance (2.3%) and level of education (2%)(15).

The study conducted in Kenya indicated that, preference for use of non formal facilities was lower among higher income groups (20%) as compared with higher lower income

groups (37.5%). The low-income areas had a morbidity rate of 52% and an insurance coverage of 17%; these numbers were 43% and 46% for the middle income areas, and 33% and 43% for the high-income areas (19).

It is known that many countries in African, Asia and Latin America use traditional medicine (TM) to meet some of their primary health care needs. In Africa, up to 80% of the population uses traditional medicine for primary health care (2).

Traditional medicine has maintained its popularity in all regions of the developing world and its use is rapidly spreading in the industrialized countries. In China, for example, traditional herbal preparations account for 30%- 50% of the total medicinal consumption. In Ghana, Mali, Nigeria and Zambia, the first line of treatment for 60% of children with high fever resulting from malaria is the use of herbal medicines at home (2).

In Ethiopia the utilization of modern medicine could be dated back to start with the 16th century particularly during the reign of Emperor Liben Dingel. More recently the development and expansion of modern health services were started in 1930s, followed by the establishment of ministry of health (MOH) in 1948. Since then MOH was the major provider of modern health services in Ethiopia, other health service like military, large corporation and state farms have directly participated in provision of health care under government rule. Private clinics, drug retailers, and nongovernmental hospital are also secondary health care providers in the community (5).

Recognition of symptoms or indicators of illness is essential to the initiation of health seeking and treatment. Household-level illness diagnosis is associated with the choice made between health treatment alternatives. Both illness diagnosis and choice of treatment are in turn influenced by beliefs regarding causal mechanisms for the prevailing diseases. The resulting patterns of health seeking behavior determine ultimately the net burden of disease in a given society.

At the household level, the process of seeking modern health care was found to vary considerably between the adult men on one hand, and other household members on the other. While adult men who fall sick can independently decide to seek health care, women, children, adolescents, and the old consistently indicated that it is another household member who usually determines the timing and the type of treatment when they are subject to illness episodes. The main underlying reason for the above decisionmaking process is that adult men are responsible for the health care costs for women and children. The study found that even in situations where the wife pays for her own health care, the husband must reimburse the money spent to her afterwards. This has considerable implications for the timing and type of treatment to be sought. Depending on whether or not he is willing and/or able to pay for medical attention, the husband/father of a sick woman/child may decide to delay modern treatment and rely on cheaper traditional medicines for a while. Depending on their own assessment, adult males may also judge the illness of a woman/child as not serious enough to merit medical attention.

When community members get sick, they do not usually seek health care from modern health facilities immediately. Instead, they opt for other alternatives, including not seeking medical care at all, self-medication with drugs obtained from drug vendors, back street marketers, over the counter in shops and pharmacies, and traditional medicine (7).

Ethiopia has the highest number of morbidity and mortality for which health problems due to infectious, communicable disease, and nutritional problems comprising an estimated 60-80%.

Data from 2000 show that Ethiopian households seek care in about 41 percent of illness cases. Although females report higher levels of morbidity, they are less likely to seek care as compared to males. Nearly 45 percent sought care in a public facility, while the rest sought care from a private facility. Except for the richest quintile, health post and clinics seem to be the main providers of care, followed by health centers.. The findings also revealed that there was high urban to rural difference in health service utilization, which was explained by the fact that the urban population had more access to information (20, 21).

The study conducted in Addis Ababa indicated that One-third of all illnesses were treated by modern services, 19.9% by self care and 26.0% by traditional medicine and transitional healers, with 21.5% of all illnesses not being treated. Utilization rates varied with type and duration of illness, socioeconomic level, age, sex and place of residence. (16)

In developing countries including Ethiopia, the effect of distance on service use becomes stronger when combined with the dearth of transportation and with poor roads, which contributes towards increase costs of visits. Availability of the transport, physical distance of the facility and time taken to reach the facility undoubtedly influence the health seeking behavior and health services utilization. The distance separating patients and clients from the nearest health facility has been remarked as an important barrier to use, particularly in rural areas. The long distance has even been a disincentive to seek care especially in case of women who would need somebody to accompany. As a result, the factor of distance gets strongly adhered to other factors such as availability of transport, total cost of one round trip and women's restricted mobility .The distance to health facilities strongly influenced the probability of consulting a health center (17, 20).

Ethiopia has a long history of traditional medicine and has developed ways to combat disease through it (5). The ways are also as diverse as the different cultures. Healing in Ethiopian traditional medicine is not only concerned with curing of diseases but also with the protection and promotion of human physical, spiritual, social, mental and material wellbeing(6).

Traditional medical treatments are also commonly given at the household level. There is significant knowledge of medicinal plants in the non professional public domain where most ailments are diagnosed and treated at the household level. Where traditional professionals are consulted, it is often for their specialized traditional knowledge and skills pertaining to a relatively limited range of health. Most of the families grow or gather these plants in their vicinities of homes (7).

In Ethiopia up to 80% of the population uses traditional medicine due to the cultural acceptability of healers and local pharmacopeias, the relatively low cost of traditional medicine and difficult access to modern health facilities (5).

Ethiopia is in a concerted effort to improve access to modern health service using different policies, strategies and activities. An activity implemented within community includes the health development army (HDA) and the health extension program serve at the base (household and community) level, the health centres provide support for promotion of health, prevention of diseases and basic curative services, Primary and general hospitals are mainly providing curative services and Referral and specialise hospitals mainly handling more complicated and specialized health care (48).

Despite these increases in the supply of healthcare and increases in the utilization of some specific services, overall outpatient healthcare utilization rates remain low and have increased only marginally from 0.27 visits in 2000 to 0.3 visits in 2011(22.49).

Most studies on health care seeking behaviour in Ethiopia have been disease specific particularly on malaria, TB, &Maternal health etc (9). Therefore, limited knowledge is available on general health care seeking practices of communities including problems faced in pursuit of health services.

So that, currently, information generated from a community based study to support the initiating of providing better health services to the community is lacking. Such information is helpful for planning, organization, and implementation of health care delivery systems, by identifying the social influences that encourage or discourage seeking medical care (22). Since similar study was not done in the study area on health care seeking behavior among household heads, this study helped to assess the health care seeking behavior among household heads and identified factor affecting health care seeking behavior.

1.3 Significance of the study

Many studies of morbidity in developing countries are based on sample of patient in health facility bases. These types of studies are seriously suffering of selection biases. While medical records for these samples may provide useful information for certain population in industrialized countries, they are grossly inadequate in most developing countries primarily because most illness in these counties receives little formal treatment.

Health interview survey appears to offer the best vehicle for analyzing treatment behavior on large representative sample of household heads. There is shortage of information in developing countries on range of symptoms experienced by household heads and all treatment sought (e.g., including home remedies, biomedical practitioners, and traditional providers) and the time of treatment (45,46).

This study determined the magnitude of health care seeking behavior and identified the common determinants that affect health care seeking behavior. It is hoped that the results of this study provides evidence-based information to the community, local government and health care providers and policy makers'. Based on the available information possible intervention will be made.

2. Literature review

In most societies a person suffering from physical discomfort or emotional distress has a number of ways of helping oneself or seeking help from other people. He/she may, for example, decide to rest or to take a home remedy or ask advice from friends, relatives or neighbors or consult a local priest, folk healers or wise person or decide to consult a doctor. He/she may follow all these steps or perhaps only one or two of them (23). At any given time, 70-90% population has a medical condition that is diagnosable and potentially treatable but 60-70% of them of people do not consult health practitioner (24).

2.1 Health care seeking and Socio demographic characteristics

Socio demographic characteristics are important factor in the utilization of use of health care services. A sociological study in Canada found that women, younger person and well educated were more likely to treat their own symptoms than men. In Denmark, women were more likely than men to take care of their health (25). In India, study showed that middle and higher education have a lower probability of falling sick. Similarly, the high and middle-income households have lower probability of falling sick than the lower income households. Older people have higher probability of falling sick than younger ones and higher household size has a negative relationship with probability of falling sick (26).

Household heads with informal education are 1.6 times (95% CI 1.07 to 2.46, p=0.02) more likely to take their children to health centers for ARI/pneumonia (baseline is health posts) which potentially offer a higher quality of care as compared with household heads with no education. Education does not exert much of an influence on care-seeking behaviour for diarrhea. However, in both cases, there is clearer evidence that richer households are more likely to access hospitals as opposed to health posts (49).

The cross-sectional study in Pakistan in peri-urban showed that over half of the (n=269, 61.4%) responders reported factors which determined them from seeking health care, out of which 62% reported financial constraint as the commonest factor. Deterrence from seeking health care was associated with illiteracy (p=0.001) and living alone (p=0.06) (27).

The research done in rural district of Kenya on health seeking behavior for rural house hold indicated that, although across the households the ranking of facilities showed a similar pattern, among households with lower education level of the household head, preference for public facilities was much higher (47.1%) compared with the case where the household head had a higher education level (29%). At the same time, preference for use of non formal facilities was lower among higher income groups (20%) as compared with lower income groups (37.5%). Similar results were implicated with the type of economic activity.

There was a high tendency for farmers to use public facilities, while businesses and officers had a higher preference for use of non-public facilities. Considering the head of household, although there was again preference for public facilities—female headed (58.1%) and male headed (38.9%)—there was a higher tendency for male headed families to use private and mission facilities (28%) compared with female headed households (13%)(31).

The study conducted in health seeking behavior for childhood malaria; household dynamics in rural Senegal indicated that Symptoms of the illness, representations of malaria and socio-demographic characteristics influenced the probability of promptly visiting a health facility. The child was brought quickly to the dispensary when he presented severe signs of malaria high fever, vomiting, asthenia, poor appetite (OR=2.13; p=0.002) – and when he resided in households where biomedical care was perceived as the only efficient malaria treatment (OR=2.28; p=0.005). Furthermore, the delay resorting to the health centre was longer as the child got older with a threshold starting from age 7(OR=0.52; p=0.036). An outward attitude of parents, defined as those who use the telephone and attend weekly markets, also favored a quick visit to a health centre (OR=2.13). By contrast, the child's sex and the level of parental education are not predictors of a prompt visit to a health facility; likewise, the economic household level, measured by the goods and equipment owned by the household, did not seem to be associated with the household's capacity to rapidly raise funds for a visit at the health centre.

The distance to health facilities strongly influenced the probability of consulting a health centre. Therapeutic practices were also greatly associated with a prompt visit to the health

centre: children who were given no self-medication (OR=5.80; p<0.001) and those who did not consult a traditional healer (OR=4.14; p=0.003) increasingly resorted to a health facility and with a shorter delay (20). A study conducted in Ethiopia showed that the use of health facility was significantly associated with sex, age, ethnicity, occupation, and education. Socio-demographic and economic factors significantly affected the occurrence of illness.

High monthly real per capita income has had a significant association with appropriate health-seeking behaviour.

The socio demographic variable of household was associated with sickness report. Of the 200 reported deaths 118 (59%) visited health institutions for the killer disease. Over the two weeks period preceding the survey, 995 (5.6%) people claimed that they were sick and 38.7% of them visited health institutions. The most important reasons for not visiting health institutions were believed that the disease did not need treatment in health institutions (31.9%), bought drugs from drug vendors (27.2) and visited traditional healers (20.2%). In multivariate analysis urban residence (AOR = 2.8, 95%CI 1.8, 4.5) and educational status of head of house hold (AOR = 3.4 95%CI 2.1,5 5) were significantly related to utilization of modern health institutions.

Teenagers and persons above the age of 60 were less likely to visit modern health services. In multivariate analysis educational status of the sick person did not have significant relation with modern health service utilization, but educational status of the head of the household primary (AOR =3.4, 95%CI 2.1,5 5) or secondary (AOR=3.5, 95%CI 1.4,8 .8) was significantly associated with modern health service utilization.(9,30).

2.2 Health care seeking behavior and choice of health care providers

Sickness prevalence and reporting varies according to socio-demographic and economic condition of the society. Despite the fact that, human being encounters a number of illnesses throughout the life, health care seeking depends up on the perceived severity and social norms.

Study conducted in Amhara region of Ethiopia showed that 52.3% of urban households and 29.6% rural households sought health care in response to symptom experienced (29). The perceived sickness prevalence report is scarce at community level in developing countries. A survey in Zambia showed that diseases like cough, fever, and diarrhea reported more frequently Health service utilization varies from place to place with number of factors.

Despite the availability of modern health care services sick individuals face difficulty in choosing the available health facilities. The choice of a given provider may be determined by the perceived quality of its service. A study conducted in Zambia showed that 43.5% of sick individuals sought health care from health institutions. Of those, 24% chose a government clinic and health center and 8% visited private health institutions. The level of traditional healer was relatively low (28). There was a higher rate of health care utilization among men than women, in age group 15-49 years than the other age groups, and urban over rural(30).

The study done in Kenya indicated that Although across the households the ranking of facilities showed a similar pattern, among households with lower education level of the household head, preference for public facilities was much higher (47.1%) compared with the case where the household head had a higher education level (29%). At the same time, preference for use of non formal facilities was lower among higher income groups (20%) as compared with lower income groups (37.5%). Similar results were implicated with the type of economic activity.

There was a high tendency for farmers to use public facilities, while businesses and officers had a higher preference for use of non-public facilities. Considering the head of household, although there was again preference for public facilities—female headed (58.1%) and male headed (38.9%)—there was a higher tendency for male headed families to use private and mission facilities (28%) compared with female headed households (13%). It was found that patients were not fast in reporting their sickness. Some 57% of outpatient reported within two days of diagnosing the problem, while 40% of inpatients reported within five days of diagnosing the problem. The average number of days that patients stayed before reporting their cases was 4.65 days for outpatients and 7.8 days for inpatients. Across the different facilities, the study found that there was a significant

relationship between the type of facility and the number of days taken by patients to seek medical care. For the mission facility 81% of the patients reported within two days, compared with health centre (70%) and the public dispensary (67%) .Study conducted in Benu state revealed that educational level is statistically significant on health seeking behaviour. Specifically, participants with high educational level reported higher score on health seeking behaviour (8, 31)

The study done in Senegal indicated that Nearly 75% of respondents considered the health facility as the most appropriate resort to treat simple fever without complications; only 15% of respondents used self-medication and 10% used traditional therapy, either at home or by going to a traditional healer(20).

The study done in rural Tanzania on health seeking behavior indicated that the majority of cases 87.7% gave a history of going to hospital as the first point of care, 10.2% purchased drugs from a nearby drug shop before going to hospital and 2% went to a local traditional healer first.

Among 298 patients, median total delay to hospitalization was 10 weeks with patient delay contributing a greater proportion than service provider. Patients more often presented initially to public hospitals (41%) or clinics (31%) than to spiritual/traditional healers (15%) or private GPs (13%). Total delay was shorter amongst those presenting to hospitals than those presenting to clinics (rate ratio 1.33 95% CI 1.13-1.85) with a significantly smaller proportion of the total delay attributable to the health service provider (18% vs. 42%) (32).

2.3 Alternative health care utilization among sick individuals

There are always alternative health care services to counter act or withstand the challenge of health problems with the limited availability of modern health care options .The WHO report state over 75% of rural population in Africa seeks health care among traditional healers.

The main reasons include that it is integral part of every culture, socially acceptable, widest coverage. There are multistage resorts of health care provider from different group of sick individuals. So sick individuals initially resort health care service from traditional

healers and additionally resort to modern health care .In Nepal, of those who sought health care 81% first visited traditional healers (33 34,35).

The study done in traditional medicine in Ethiopian child hood illness indicated that 85 of the 100 children had been treated by traditional medicine: 9 experienced improvement, but the condition of 15 worsened as a result. 68% of respondents thought that traditional medicine was more cautious and conservative, 46% cited easy access to it, and 6% the low cost as the reasons for using it. 62% vowed never to use it, though after their hospital experience, still 36% claimed they would turn to the local healer again.(36).A study conducted in Jimma hospital showed that 26.9% of rural and 12.3% of urban patients admitted to the hospital were found to use traditional medicine prior to their arrival to hospital.

The use of drugs from informal sector such as open markets and village kiosks encouraged the practice of self-medication. For self-reported sickness there was self-medication resorted from 28.5% - 81.5% from different surveys. The most common reasons reported for self diagnosis and self-medication were non-seriousness of disease, emergency use, and previous experience (37, 38, and 39).

3. Conceptual frame work of health care seeking behaviour.



Figure 1Conceptual frame work of health care seeking behaviour among household heads in Dale Woreda, May 2017(Developed from literatures).

4. Objectives

4.1General objectives -

To assess health care seeking behavior & its associated factors among household heads in Dale woreda Sidama Zone 2017

4.2Specific Objectives:

To determine the magnitude of health care seeking behaviour among households heads in Dale woreda.

To determine factors that affect health care seeking behaviour among household heads in Dale woreda.

5. Methods and Materials

5.1Study Area

Dale woreda is one of nineteen woredas in Sidama Zone having total population 242,658 of which 122,918 are males and 119,740. Yirgalem town is one of the town administration in Sidama Zone found in Dale woreda which is 45km far from Hawassa. Dale woreda has a total of 31 rural kebele and 7 urban kebeles and 49, 244 households. The health service coverage of the woreda in 2010 is 86%. (Census 2007, CSA)

5.2 Study period

The actual data collection was carried in February- March 2017

5.3 Study Design

A community-based cross-sectional study was conducted among household heads residents of Dale Woreda to assess health care seeking behavior and its associated factors. This design was selected considering the time allocated for data collection and availability of study subject.

5.4 Population

5.4.1 Source population.

All households in Dale woreda with household heads were sick in the last four week before the survey date.

5.4.2 Study population.

Sampled household heads from the source population who were sick in last four weeks before the survey date and confirmed by census.

5.4.3 The sampling unit.

Systematically selected household heads from study population who were sick in the last four weeks from the survey date and were interviewed.

5.4.4 Inclusion and Exclusion criteria

5.4.4.1 Inclusion Criteria:

Household head's who were sick in the last four weeks from the survey date and whose age is >=18

5.4.4.5 Exclusion criteria:

Household head's who were sick in the last four weeks from the survey date and whose age is <18

Household heads who were critically sick and non-communicative for the last four weeks.

Household heads who were sick for the last four week with self limiting diseases like common cold.

5.5Sample Size determination and Sampling Procedure

5.5.1 Sample Size determination:

The final sample size was determined using a single population proportion formula. Since the proportion for this particular study was unknown, 50% was used to get the maximum sample size with assumptions of 95% confidence level and 5% margin of error. $n = (Z)^2 P(1-P)$

$$d^2$$

Where n= initial sample size

P=proportion of health care seeking behavior. Since the proportion for this particular study was unknown and used p = 50% to get maximum sample size.

Z= the standard normal deviation of 95% i.e. 1.96

d= the margin of sampling error .i.e.5 %

$$n = (1.96)^2 0.5 (1-0.5) = 384$$
$$(0.05)^2$$

By considering the design effect of the sampling technique (2) and 10% non response rate the final sample size was= 844

5.5.2 Sampling Techniques

A multi-stage sampling design was used to select primary sampling units (kebeles) and secondary sampling units (households) from the woreda. Twelve kebeles out of thirty eight were selected using simple random sampling method. Complete census was carried out in all the selected kebeles (12 out of 38) before the actual data collection time to get an eligible house hold heads who were sick for the last four weeks. Based on the census 2520 rural and 950 urban eligible household heads were found who were sick in the last four weeks. By using the information from the census, representative sample of household heads from each Kebeles included in the study by using PPS. The household heads who were interviewed from each kebele were selected by using systematic sampling method. The sampling fraction was the numbers of sick household heads were interviewed in each kebele divided by the corresponding total numbers of sick household heads in each kebele confirmed by census. The first household head was interviewed, by using the Keble's house number given during census period for urban and rural household head register, selected by using simple random sampling method.

The next urban household head was interviewed at the fraction of (the number of sick household heads were interviewed in each kebele /corresponding total number of sick household heads in each kebele confirmed by census =1/5.3. There for the interval used to select the second and the rest house hold heads was systematically at every (k=5) for urban house hold heads.

The next rural household head was interviewed at fraction of (the number of sick household heads were interviewed in each kebele / corresponding total number of sick household heads in each kebele confirmed by census= 1/3.8. There for the interval used to select the second and the rest house hold heads was systematically at every (k=4) for rural house hold heads.

5.5.3 Sampling procedure



5.6 Measurements

5.6.1 Questionnaires

The data was collected by using structured sidamigna version questionnaires consisting of Socio-demographic characteristics of sick household heads, different questions regarding health care seeking behavior including the Utilization of health services and types of health care sought and factor affecting health seeking behavior.

5.7 Variables

5.7.1 Dependant variables

Health care seeking behavior.

5.7.2 Independent variables

- ✤ Age,
- Sex,
- ✤ Marital status,
- ✤ Family size,
- Religion
- ✤ Ethnicity.
- Educational status
- ✤ Income
- ✤ Occupation.
- Residence (urban or rural).
- Perceived severity of diseases.
- Price of health service
- Distance from health facilities
 - ✤ Approaches of health professional
 - ✤ Satisfaction of health service
 - ✤ Self medication

- Traditional medicine
- ✤ Attitude toward health service
- Knowledge about diseases

5.8 Data collection techniques

The data collection was carried out using structured questionnaires filled by data collectors. The questionnaire was prepared in English and was translated from English to local language (sidamigna) and was re-translated back to English to check the reliability of the instrument. Data was collected by interviewing the House hold head .The house to house visit continued until the sample size required was secured. During data collection the data collectors found locked house and re-visited.

5.9 Quality assurance

Before undertaking the data collection, instrument was tested taking 44 household heads in Abesto kebele for the feasibility of the questionnaires. Based on the findings Modifications were done. The pre-tested data was not included in the main data. Validity and reliability of questionnaire was checked.

The Grades 10th completed 10 interviewers were recruited as data collectors who could speak local language (Sidamign) fluently. Two nurses were recruited as supervisor considering their knowledge of biomedical practice (this was considered as a resource of information for data collectors). Both interviewers and supervisors were trained, demonstrated, and practiced on the data collection technique.

The data collectors were given data collecting instrument in the morning of each day. At the end of each day the supervisors checked the completeness of the questionnaires. The data collectors came cross with locked house during data collection and re -visited.

5.10 Terms and Operational definition

- Health care seeking behavior:-Those activities undertaken by individuals in response to symptom experienced.
 - ✓ Appropriate health care Seeking behavior Those respondents who reported visiting at least one of modern health facility (government or private/ health center, private clinic, health post, public hospital & private hospital) in response to symptom experienced and coded as 1
 - ✓ Inappropriate health care seeking behavior- Those respondents who did not report visiting any of modern health facilities (government or private) in response to symptom experienced and coded as o.
- ♦ Household: a group of related people or family living together
- Illness: the subjective response of the patient and of those around him to his being unwell
- Sickness: the social connotation and socially acceptable role of an ill person
- ◆ Urban: Localities of 2000 or more inhabitants (CSA, 1984).
- ✤ Rural: Localities of less than 2000 inhabitants (CSA, 1984).
- **Kebele:** The smallest administrative unit in an urban and rural area.
- Self-medication: where ill-health is first recognized and all the therapeutic options initiated and utilized without consulting medical practitioners
- Traditional medicine: spiritual, religious, and experience based knowledge and practice applied to treat patient with sickness.

5.11 Data Analysis

To ensure that all needed information was collected and recorded properly, the supervisors and principal investigator checked data in the field. Data analysis was started by sorting and performing quality control checked up at field.

The data entered into Epi Data version 3.14 and analyzed using SPSS version 16.0 software. It was verified that all totals corresponds to total number of study units. There were special columns for no response or missing data to arrive at accurate total figures.

Data clean up was performed to cheek for frequencies, accuracy, outliers, and consistencies and missed values and variables. Frequencies, proportions and summary statistics were used to describe the study population in relation to relevant variables using tables, charts and graphs. Odds ratio and chi-square test was computed to assess the strength of the associations. The bivariate analysis was carried out to calculate the crude odds ratio (OR) and a 95% confidence interval (CI). For all statically significance tests, the cut of value set was P<.05 as this considered statically significant. Since crude odds ratio (OR) did not take into account the effect of the confounding variable(s), multivariate analysis was applied by fitting the logistic regression.

6. Ethical considerations

Prior to data collection, ethical clearance was obtained from the ethical clearance committee of the Jimma University, Institute of health science. Formal letter of permission was obtained from administrative bodies of the zone to the woreda and then to the respective kebeles. Moreover, confidentiality was assured for the information provided since the name of study participant was not stated on the questionnaire rather coding system was applied. The purpose of the study was explained to the study participants. Before starting the interview, the respondents were requested for their verbal consent to participate in the study and obtained. Apiece of advice was give on benefit of seeking care from modern health facility for those respondents who sought care from alternative sources. During survey the interviewer did not find the debilitated, neglected and sick individuals in critical condition.

7. Dissemination plan

The finding of this study will be presented to Epidemiology Department, institute of health science, Jimma University.

Will be distributed to concerned bodies

Efforts will be effort made to publish on scientific Journals.

8. Result

8.1 Socio-economic and demographic factors

A total of 804 households heads were participated in giving a response rate of 95.3 %. Among the study participants male comprises 693(86.2%) and female comprises 111(13.8%).Majority of the sick individual lies at age group of 18-25 years which accounts for 372(46.3%). Seven hundred thirty one (90.9%) of study participant had monthly income <1170 birr. Six hundred twenty five (77.7%) of respondents resided in rural and majority of respondents (69.4%) were the follower of protestant religion.

Table 1 Socio-economic and demographic characteristics of household headsrespondents (n=804) in Dale woreda, Sidama Zone, SNNPR, May 2017

Characteristics	N <u>o</u>	%
Residence		
Urban	179	22.3
Rural	625	77.7
Sex		
Male	693	86.2
Female	111	13.2
Age (in year).		
18-25	372	46.3
26-35	324	40.3
36-45	66	8.2
46+	42	5.2
Religion		
Protestant	558	69.4
Orthodox	125	15.5
Muslim	63	7.8
Others	58	7.2
Ethnicity		
Sidama	503	62.6

Amhara	74	9.2
Gurage	67	8.3
Woilata	92	11.4
Others	68	8.5
Occupation		
Farmer	561	69.8
Employee	169	21
Others	74	9.2
Marital status		
Married	528	65.7
Single	197	24.5
Others	79	9.8
Educational status		
No formal education.	336	41.8
Primary education(1-8)	333	41.4
High school and above	135	16.8
Monthly income (in birr)		
<1170	731	90.9
>=1170	73	9.1
Family size(in person)		
<5	480	59.7
>=5	324	40.3

8.2 Health care seeking behavior

8.2.1 Appropriate health care seeking behavior among house hold heads

. Overall appropriate health care seeking behavior of household heads was 585(72.8%) at the study area. Public health center was the most common place where two hundred twenty two (37.9%) participants sought health care and only 10 (1.7%) participants sought health service from private hospital.

8.2.2. Inappropriate health care seeking behavior among household heads.

Inappropriate health seeking care behavior reported among household heads was self treatment 81(37.0%), traditional healer 38(17.4%) and did not know where to go/ nothing 100(45.6%). In addition to that 34 (15.5%) respondents did not know where best treatment is available. But 145 (66.2%) and 40 (18.3%) respondents believed that best treatment is available in modern health institution and traditional healer respectively.

Characteristics	N <u>o</u>	%
Appropriate health care seeking (n=585)		
Public Health Center.	222	37.9
Private Clinic	95	16.2
Health Post	96	16.4
Public Hospital	162	27.7
Private Hospital	10	1.7
Inappropriate health care seeking (n=219)		
Self treatment	81	37
Traditional healer	38	17.4
Did not know where to go/ nothing	100	45.6

Table 2Health care seeking behavior among household heads in Dale woreda, Sidama Zone, SNNPR, May 2017.

8.3. Reason for not seeking modern health care.

Two hindered Nineteen (27.2%) of household heads did not seek health care from modern health facility. The main reason reported for not seeking health care were lack of money 94 (42.9%), perceived ineffective treatment available 54 (24.7), symptom is not serious 17 (7.8%) and long distance 13(5.9%). Among the participants who did not seek health care from modern health facility 81 (37%) practiced self treatment. The main reason reported for practicing self treatment were I know the treatment by myself 26(32.1%), it is cost effective 22(22.7%), diseases is not serious 17(21%).

Table 3Reason for not seeking modern health care among household heads in Daleworeda, Sidama Zone, SNNPR, May 2017

Variable	N <u>o</u>	%
Reason for not visiting modern health facilities (n=219)		
Lack of money	93	43
Not effective treatment available	55	25
Symptom is not serious	17	7.8
Long distance	14	6.4
Others	40	18
Reason for preferring self treatment(n=81)		
I know the treatment my self	26	32
It is cost effective	22	27
Diseases is not serious	17	21
Long waiting time	6	7.4
Others	10	12
Time of health care seeking in response to symptom		
experienced (n=585)		
Immediately as illness start	118	18.8
>=1 days	467	81.2
It is cost effective Diseases is not serious Long waiting time Others Time of health care seeking in response to symptom experienced (n=585) Immediately as illness start >=1 days	22 17 6 10 118 467	27 21 7.4 12 18.8 81.2
8.4. Approaches of health professional and Satisfaction of health service seeker.

The title of health professionals reported based on modern health facility visitors were Doctors 162(27.7%), Nurses 145(24.8%), health officer 16(2.7%), health extension workers 94(16.7%) and 168 (28.7) did not know the title of health care providers. Participants reported Health professional approach during health care provision as respectful 301 (73.6%), polite 299(72.6%), knowledgeable 276(67.3%) and friendly 358(87.3%) and 417(71.3%) of participants reported they would return to seek medical care but 168(28.7%) of households reported that they would not return to seek medical care from those health care giver.

Table 4Approaches of health professional and households Satisfaction with health service sought in Dale woreda, Sidama Zone, May 2017.

Variable	N <u>o</u>	%
Who did you talk to / see at modern health service care unit.(
n=585)		
Doctors	162	27.7
Nurse	16	2.7
Health extension workers.	94	16.1
I do not know	168	28.7
Health professional approach during treatment provision (n=585).		
Respectful	301	73.6
Polite	299	72.9
Knowledgeable	276	67.3
Friendly	358	87.5
Would you return again to seek advice or treatment (n=585)		
Yes	417	71.3
No	168	28.7

	Health care se	eking behavior
Characteristics	Yes (%)	No (%)
Residence		
Urban	161(89.9)	18(10.1)
Rural	424(67.8)	201(32.2)
Sex		
Male	509 (73.4)	184(26.6)
Female	76(31.5)	35(68.5)
Age (in year).		
18-25	269(72.3)	103(27.7)
26-35	244(75.3)	80(24.7)
36-45	46(69.7)	20(30.3)
46+	26(61.9)	16(38.1)
Religion		
Protestant	412(73.8)	146(26.2)
Orthodox	96(76.8)	29(23.2)
Muslim	43(68.3)	20(31.7)
Others	34(58.6)	24(41.4)
Ethnicity		
Sidama	359(71.4)	144(28.6)
Amhara	50 (67.6)	24(32.4)
Gurage	55(82.1)	12(17.9)
Woilata	68 (73.9)	24(26.1)
Others	53(77.9)	15 (22.1).
Occupation		
Farmer	391(69.7)	170(30.3)
Employee	135(79.9)	34(20.1)

Table 5Socioeconomic and demographic factors versus healthcare seeking behaviour among household heads, in Dale Woreda, Sidama Zone, May 2017

Others	59(79.7)	15(20.3)
Marital status		
Married	373(70.6)	155(29.4)
Single(divorced, widowed & widower)	212(76.8)	64(23.2).
Educational status		
No formal education.	225(67.0)	111(33.0)
Primary education(1-8)	236(70.9)	97(29.1)
High school and above	124(91.9)	11(8.1)
Monthly income (in birr)		
<1170	520(71.1)	211(28.9)
>=1170	65(89.0)	8(11)
Family size(in person)		
<5	380(79.2)	100(20.8)
>=5	205(63.3)	119(36.7)

Table 6Individual related factors affecting healthcare seeking behaviour among household heads, in Dale Woreda, Sidama zone, May 2017

Variable	Yes (%)
Reason for not visiting modern health facilities (n=219)	
Lack of money	93(43)
Not effective perceived treatment available	55(25)
Symptom is not serious	17(7.8)
Long distance	14(6.4)
Others	40(18)

8.5. Factors associated with health care seeking behavior.

Urban residents were 3.32 times more likely to seek appropriate health care as compared to rural residents [AOR=3.32, 95% CI:1.94,5.68]. Having family size <5 were 2.29 times more likely to seek appropriate health care as compared to whose family size were >=5.[AOR=2.29, 95%CI: 1.64, 3.19]. Educational level of High school and above households were 4.26 times more likely to seek appropriate health care as those households who did not have formal education compared to [AOR=4.26,95%CI:2.16, 8.43]. The odds of having appropriate health-seeking behavior for symptom experienced among household heads earning a monthly real per capita income of >=1170 ETB was 2.98 times higher than those household heads earning a monthly real per capita income of <1170ETB [AOR=2.98,95%CI:1.37,6.44].

	Health care so	eeking behavior	
	Yes	No	COR(95% CI)
Variables	N <u>o</u> (%).	N <u>o</u> (%)	
Ethnicity			
Sidama	359(71.4)	144(28.6)	1
Amhara	50 (67.6)	24(32.4)	0.84(0.49,1.41)
Gurage	55(82.1)	12(17.9)	1.84(0.96,3.53)
Woilata	68 (73.9)	24(26.1)	1.14(0.69,1.89)
Others	53(77.9)	15 (22.1).	1.42(0.77,2.59)
Residence			
Urban	161(89.9)	18(10.1)	4.23(2.53,7.09)**
Rural	424(67.8)	201(32.2)	1
Family size			
<5	380(79.2)	100(20.8)	2.21(1.61,3.02)**

Table-7 Bivariate analysis of factor associated with health care seeking behavior among household heads in Dale Woreda, May 2017.

>=5	205(63.3)	119(36.7)	1
Educational status			
Had no formal education	225(67.0)	111(33.0)	1
Primary education (1-8)	236(70.9)	97(29.1)	1.20(0.86,1.67)
High school & above	124(91.9)	11(8.1)	5.56(2.88,10.72)**
Monthly income (in birr)			
<1170	520(71.1)	211(28.9)	1
>=1170	65(89.0)	8(11)	3.29(1.56,6.99)*
Occupational status			
Farmer	391(69.7)	170(30.3)	1
Employee	135(79.9)	34(20.1)	1.73(1.14,2.62)*
Others	59(79.7)	15(20.3)	1.71(0.99,3.10)

Table 8 Multivariable logistic analysis of independent predictors of health careseeking behavior among household heads in Dale Woreda, May 2017.

	Health care s	eeking behavior		
	Yes	No	COR(95% CI)	AOR(95%CI)
Variables	N <u>o</u> (%).	N <u>o</u> (%)		
Ethnicity				
Sidama	359(71.4)	144(28.6)	1	
Amhara	50 (67.6)	24(32.4)	0.84(0.49,1.41)	
Gurage	55(82.1)	12(17.9)	1.84(0.96,3.53)	
Woilata	68 (73.9)	24(26.1)	1.14(0.69,1.89)	
Others	53(77.9)	15 (22.1).	1.42(0.77,2.59)	
Residence				
Urban	161(89.9)	18(10.1)	4.23(2.53,7.09)**	3.32(1.94,5.68)**
Rural	424(67.8)	201(32.2)	1	1

Family size				
<5	380(79.2)	100(20.8)	2.21(1.61,3.02)**	2.29(1.64, 3.19)**
>=5	205(63.3)	119(36.7)	1	1
Educational status				
Had no formal education	225(67.0)	111(33.0)	1	1
Primary education (1-8)	236(70.9)	97(29.1)	1.20(0.86,1.67)	1.32(0.94,1.86)
High school & above	124(91.9)	11(8.1)	5.56(2.88,10.72)**	4.26(2.16,8.43)**
Monthly income (in birr)				
<1170	520(71.1)	211(28.9)	1	1
>=1170	65(89.0)	8(11)	3.29(1.56,6.99)*	2.98(1.37,5.68)*
Occupational status				
Farmer	391(69.7)	170(30.3)	1	
Employee	135(79.9)	34(20.1)	1.73(1.14,2.62)*	
Others	59(79.7)	15(20.3)	1.71(0.99,3.10)	

Note: *-significant result, 1-reference category, ** p-value <0.001, * p-value <=0.05

9. Discussion

In this study, the magnitude of appropriate health care seeking behavior among household heads for symptom experienced was 72.8 % in the surveyed communities with urban household heads sought 89.9 % and 67.8 % rural household heads. There is an increment of utilization of modern health service in both residences in current study compared to a study done in Amhara region, Ethiopia revealed that 52.3% in urban and 29.6% in rural and similar Study conducted in Zambia and Nigeria indicated 43.5% and 48.9% respectively(29, 28,14). The study conducted in Senegal showed almost similar findings (75%) with current study (20).

The improvement might be due to continuous efforts to strengthen the health system, infrastructure, increase public awareness, and involvement of community health extension workers and building staff capacity.

Similarly study conducted in Tanzania indicated 87.7% of rural respondents sought health service from modern facility (32). This finding is high compared to current study findings which indicated 67.8% of rural households sought health service from modern facility. The big difference observed here might be due to the differences in methodologies (difference in geographical differences, sampling techniques and difference in definition of health care seeking behavior).

In this study, the magnitude of inappropriate health care seeking behavior among household head for symptom experienced was 27.2 % in the surveyed communities. The study conducted in Amhara region, Ethiopia, Kenya and Zambia indicated that preference for non formal facilities were 47.3%, 37.5% and 56.5 % respectively (29, 31, and28,). The difference might be due to improvement in accessibility of facilities and health information delivery by health extension program (HEP). Forty three percentage of household heads reported lack of money was the most common reason for not seeking health service from modern health facility. Study conducted in Pakistan and Nigeria 62% & 50.3% respectively supported the current study findings (27, 15).

The study conducted in Tanzania showed that only 12.3% did not seek health service from modern health facility that is almost three times less than the current findings (32). The possible explanation might be due to the differences in methodologies (different approach in data collection, study population, location of studies, and difference in definition of health seeking behavior).

Average monthly income was significantly affects health care seeking behaviors of household heads in study area. The odds of having appropriate health-seeking behavior for symptom experienced among household heads earning a monthly real per capita income of >=1170 ETB was 2.98 times (95%CI:1.37,6.44 p=0.03) higher than those household heads earning a monthly real per capita income of <1170ETB.

Study conducted in Pakistan, Kenya, Nigeria and Ethiopia supported the findings (27, 31 14, 9). The possible explanation might be those household heads who earn high monthly income may have more access to information. The affordability of health care service may not bother them.

In this study family size showed highly significant (p=0.00) association with health care seeking behavior. Households heads whose family size < 5 were 2.29 times more likely to have appropriate health seeking behavior than those households heads whose family size >=5. Population based cross sectional Study conducted in North West Ethiopia revealed similar findings (9). This might be due to the fact that those who have the larger family members should carry more responsibilities and experienced severe socio-economic hardship which prevented them from seeking appropriate health care from modern health facilities for symptom experienced.

Those households heads whose Educational level high school and above were 4.26 times (95%CI 2.16, 8.43,p=0.00) more likely to have appropriate health care seeking behavior than those households heads who had non -formal education. The study conducted in four region of Ethiopia revealed that household heads with informal education are 1.6 times (95% CI 1.07 to 2.46, p=0.02) more likely to take their children to health centers for ARI/pneumonia (baseline is health posts) which potentially offer a higher quality of care as compared with household heads with no education . Household heads with

primary or secondary education are systematically more likely to seek appropriate care immediately as opposed to their less educated counterparts. Study conducted in Pakistan showed that educational status of head of house hold (OR = $3.4\ 95\%$ CI 2.1,5 5) were significantly related to utilization of modern health institutions.

Similar study conducted in Benue state also revealed that educational level is statistically significant on health seeking behaviour. (27, 45, 8).

This might be due to that better educated people are aware of health problem, know more about the availability of health care services, and use this information more effectively to maintain or achieve good health status.

Residence of household's heads was highly significant with appropriate health seeking behavior. Urban household heads were 3.32 times (95% CI: 1.94, 5.68, p=0.00) more likely to seek appropriate health care than rural household heads. This study is similar with the findings in Jamaica that indicated healthcare seeking behavior can be explained by area of residence in which urban household heads were more likely to have appropriate health care seeking behavior than rural household heads. Consistent study conducted in Pakistan showed that urban residence (AOR= 2.8, 95%CI 1.8, 4.5) were significantly related to utilization of modern health institutions (42, 27). This might be due to urban household heads had better accessibility to service and information.

10. Limitation

The limitation of this study is that social desirability bias. Especially, the modern health service utilization rate might be overemphasized, as many households might be afraid to admit that they visited traditional practitioners like *Kalichas*, (witchcrafts).The non sampling error like recall bias might introduced. The strategies like shorter time less than one month period was used to minimize the recall bias.

11.Conclusion

This study showed that the magnitude of appropriate health care seeking behavior among house hold heads was satisfactory. However, this doesn't mean that there will be no need for further strengthening of the intervention activities as significant proportions of the study communities still demonstrate inappropriate health care seeking behavior.

Residence has an effect on the households' health care seeking behaviors for symptom experienced. Urban household heads were more likely to visit modern health facility as compared to rural household heads.

Educational level has an effect on the household's heads health care seeking behavior. Household heads whose educational level is High school and above had a more appropriate health seeking behavior than the other categories of educational level. Those household heads whose monthly income >=1170ETB and family size<5 also had a more appropriate health care seeking behavior than their counterparts.

12. Recommendation

Federal MOH continues Scaling up of the recently introduced CBHI scheme may play an important role in enhancing access to health care.

SNNPR-Health bureau continues strengthening implementation of the fee waiver system to increase access for the 'poorest of the poor'.

Health professionals continue providing health education and awareness creation on modern health service at all level .

Researcher who interest on health care seeking behavior among household heads should conduct residence based comparative study on health seeking behavior with other strong study designs.

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13 Annex – Questionnaire.

English Version Questionnaires

This questionnaire was prepared for collecting information on health care seeking behavior at household level among household members in Dale woreda, Sidama zones

Introduction:

My name is ______. I am working as a data collector in this survey which Will be conducted by the collaboration of Jimma University, post graduate study, College of public and medical science department of epidemiology .So as to assess the type of sickness you have encountered, the type of health care providers sought, and the role about the local healers for health seeking behavior at household level..

You are kindly requested to skip any questions that you don't want to answer and you may end up this interview at any time you want to.

However, your honest answers to these questions will help us better understand what people think and what measure they take during sickness. We would greatly appreciate your help in responding to this survey. Would you be willing to participate?

1. Yes 2. No

Signature of interviewer certifying that informed consent has been given verbally by respondent.

Result codes: completed 1, respondent not available 2, refused 3, partially completed 4, others 5

005: Interviewer code [------] Name_____

006: Date of interview: [------]

Checked by supervisor: Name _____

Signature_____ Date _____

Part- One : Socio-demographic variables of Sick household head that has been ill for the last 4 weeks.

101	Residence of sick	1.Urban+	
	individual	2.Rural	
102	Sex of sick individual	1. Male 2. Female	
103	Age of sick individual		
		1. House wife	
104	Occupation of sick	2. Unemployed	
	individual	3. Government employee	
		4. Farmer	
		5. Artesian	
		6. Student	
		7. Others(specify)	
	Religion of sick	1. Orthodox	
105	individual.	2. Protestant	
		3. Catholic	
		4. Muslim	
		5. Others (specify).	
	I	1	

106	Marital Status of sick individual	 Single Married Widowed 5.widower Separated 	
107	Ethnicity of sick individual	 Sidama Dawro Amhara Wolaita Oromo Gurage Tigre Others(specify). 	
108	Educational status of sick individual	 Illiterate Read and write Elementary High school and above. 	
109	Average monthly income of sick individual		

110.	Family size	

Part Two: Sickness Profile

	If you were sick in the last one month, which kind of symptom did	 Cough with or without sputum Fever with chill and rigor 	
201	you have? /	3. Abdominal pain with diarrhea	
		4. Skin disorder	
		5. Eye diseases	
		6. Others(Injuries)	
	How long have you been sick?		
202			
	What kind of measure have you	1. self treatment treatment	No
203	taken?	2. Rest	404
		3. Traditional treatment	
		4. Private hospital	
		5. Hospital	
		6. Health center	
		7.Health post	Part /
		8.priviate clinic	1 411 4
		9. Nothing	

	If the response is self treatment for	1. None	
204	the above 203 questions, What type of measure was taken at home level?	2. Rest	
		3. Abstinence of fluid and food	
		4. Encourage fluid and food	
		5. Pray for preying	
		6. Took left over drugs	
		7. Other	
206	After experiencing symptom, how many day/s later you went to health care provider?	1	
207	Who did you talk to or see at health service care unit?	1. Doctors 2. Nurses	
		3. Health extension worker	
		4. Health officer	
		7. I don't know	
208	How did u judge the health care	1. Friendly yes No	
	provider during care provision?	1 2	
		2. knowledgeable 1 2	
		3. Well qualified 1 2	
		4. Respectful 1 2	
		5. Polite 1 2	

209	Would you return again to seek advice or treatment from this care provider?	1. Yes 2. No	No. 319
210	Which health care unit you have visited in addition to the above mentioned health care units?	 Hospital Health center Clinic Traditional healer Local healers Others 	
211	What was the main reason for visiting additional health service(if the patient has gone any of the above in question number 210 mentioned additional health care unit)	 Because it s not relived I have not satisfied Referral Insisted from relatives Others 	
212	For the most recent symptoms you had, have you received medical treatment?	1. Yes 2. No	No .320
213	Have you completed the medicine?	1.yes 2.No	

	If you have not completed the	1. Due to side effect		
214	medication q number 213 Why?	2. Perceived not effective		
		3. Have not bought yet		
		4. Expensive(lack of money)		
		88. I don't Know		
	If you would not return again to seek			
215	the medical treatment, why not you returned?	Yes		no
		1. Made me unwelcome 1		2
		2. Made me fell ashamed 1		2
		3. Do not provide me		
		necessary treatment 1		2
		4. Not knowledgeable 1		2
		5. Others		_
	If you have not received medical		Yes	no
	treatment, what were the reasons?			
216		1. Shortage of money	1	2
		2. Long distance	1	2
		3. Perceived low quality of		
		Service	1	2
		4. Do not believe in Biomedica	1	
		Therapy	1	2
		5. Hatred for health care		
		Providers	1	2
		6. Others		-

Part three: Health care seeking from traditional healers/providers

301	What is the most important reason or	1. I don't get cure from medial care
	resorting looking for treatment from	2. They do not charge to much
	traditional healers rather than medical	3. They are respectful
	treatment (Q. no 203) ?More than one	4. There is no long waiting
	answer is possible and circle all	5. Treatment is effective
	response.	6. Maintain confidentiality
		7. Maintain privacy
		8. Because, family recommended it
		9. Because, they are near
		10. Others
302	What type of medication have you sought	1. Massage
	from traditional healer?	2. Herbal medication
		3. Tattooing/cauterization
		4. Spiritual care
		5. Advice
		6. Other

self treatment

401	If you have not visited a	1. Thought sickness is incurable	
	health care provider (Q no.	2. symptoms is not serious	
	203) what is your most	3. thought getting well from	
	important response for not	symptom	
	receiving any treatment?	without treatment	
		4. Do not know where it can be	
		treated	
		5. No effective treatment is	
		available	
		6. Lack of time	
		7. Lack of money	
		8. Feeling guilty telling my	
		problem to	
		health worker	
		9. Long distance	
		10. Others	
		99. No response	
402	According to the main cause	1. Symptoms have no cure	
	of your most recent	2. Symptoms disappear without	
	symptoms, from where do	treatment	
	you believe is the best	3. From traditional healers	
	treatment available?	4. From modern health care	
		institutions	
		5. Others	
		99. No response	
	Do you believe that getting	1. Yes	
	early treatment is beneficial	2. No	
403	for people who are sick?		

	If you have not got treatment	1. I know the treatment myself	
	in	2. Diseases is not serious	
404	Institutions (Q no 203) what	3. It is cost effective	
	is the most important reason	4. Maintain confidentiality	
	for preferring self treatment	5. Feeling guilty discussing my	
	for the disease mentioned	problem	
	above?	with other	
		6. In health care there is long	
		waiting time	
		7. In health care reception is not	
		good	
		8. others	

Sidamignu afii xamo

Konni woronni no xa'mo qitabinohu fayyima agarate assinani qafo laenohuni Dale woradera , Sidamu Zonera

Hanafo

Su'miya-----ane losemohu mashalake gaba assateni jimmu university, lanki degree rosu kifile na medicaletena dagommu college, epidemiologete timirtete kifile ledo ikkaten, xibu dana shole saminte gido xisanitoha, xagicho anno mana laenoha, safarete ogeye na xisamani woyite muro laenohumitti.

Xaimama hasiratoki xa'mo dixam'mamato na ayi yanna gidonnino agurte fula dandato

Ikkolan kayinni kennetite halalacho dawaro assinani mirimireya lowo darga afidhino.xam'mamate fikadegaho?

1.ee''e 2.diani

Tamanchu malate , xam'manchu sumuma kulanoha

Wutetu code

Gudinoha1, qualachu dilelino 2, qola giwinno 3. Woma diqolino3, woleno 5

005 xam'manchu code

006 xa'mote bara

Supervuzerichun laeno . Su.ma-----

Malate -----

Bara-----

Xammo mitte

hajajo

.balanta xa,mo qolitinayii gede na halalancho xa'mo

Kin'et halalancho kolo xisamino manni maya hedanorona afate kalitano

Lelitehiki xa,mo hedhuro , xama danidato

Ate laanoheki xamo kolate dikirinsahe

•

Unnonin giddoni lame nna haki ale kola dandatoo

	ayinatte	Qolete variable	Skip to
T,q			
	I		
	Part one; takilla ma	rraja	
101	Min mani abaworu	gatare	
	teso	katama	
102	badoshe	labahoo	
		mayite	
103	Woga	1.20-29	
		2.30-39	
		3.40-49	
		4.50 ale	
		99.dawaro dino	
104	Losu huneta	1. min galite	
		2 .losancho	
		3 manigistete sarategnsa	
		4. gilete losancho	

		5. aligu min noho	
		6. rosancho	
		7. dadalancho	
		8. wole	
105	hayimanote	1. orthodoxe	
		2. prostestante	
		3. catholic	
		4. musilm	
		5. wole	
		1. chalicho	
106	Galite huneta	2. adheha	
		3. tireha	
		4 betameha	
		99. dawaro dino	
	Min mani kirro	1	
107		99. dawaro dino	
		1. sidama	
		2.woilata	
108.	gosa	3. Amhara	
		4. dawaro	
		5. Oromo	
		6. Gurage	

		7 Tigre	
		8. wole	
		99. dawaro dino	
109	Eeo	1. ajano 100birr	
		2. 101-200birr	
		3. 201-300birr	
		4. rorano 300birr	
		99. dawaro dino	
		1. roseha	
110		2. nabawna tsafa	
	Rosu huneta	3. direose	
	I	I	
Part Two: xisan	nino manchi mashalake	shole saminte gido xisaminohu.	
201		1 galite	
	Xisamanchu xadoshe	2.min ana	
	min galitan ledo	3.qako	
		4. mayite qako	
		5.fitaho	
		6. minu losancho	
		7. dawaro dino.	

202	Ayinate	1. labaho 2. Mayite	
203	Diro	1.ajano 5year	
		2. 5-9	
		3. 10-14	
		4. 15-19	
		5. 20-24	
		6. 25-29	
		7. 30-34	
		8. 35-39	
		9. 40 nna rorano.	
		99. dawaro dino	
		1. min mancho	
204	losu	2 losu dino	
		3. manigistet losancho	
		4. gabare	
		5. farisancho	
		6. rosancho	
		7. wole	
		99. dawaro dino	

	hayimanote	1. Orthodox	
205		2. Protestant	
		3. Catholic	
		4. Muslim	
		5. wole	
	Galitete huneta	1. chalicho	
206		2. adhameha	
		3. tirewa	
		4 batewa	
		99. dawaro dino	
207	Gosa	1 .Sidama	
		2. Dawro	
		3. Amhara	
		4. Wolaita	
		5. Oromo	
		6. Gurage	
		7. Tigre	
		8. wole	
		99dawaro dino	
		1. dirosino	
	Rosu huneta	2. boresana nabawa	
208		3 rosoha	

		1 ajano 100birr	
		2. 101-200birr	
		3. 201-300birr	
		4. rorano 300birr	
209	Ео	99. dawaro dino	

Parte sase: xasamate mashalake

Hajajo mashalake ganba asitanorira.

.tintalote alama xawis.

Tamamanchoho xamamate fikadegna ikinoha xa'mi

Xawo ikkitinoki xa'mo xawis

. lam'xisamancho afidhiriniro mito muli ysana gido xisaminoha dore.

. lowo geshsha xisaminoha afidhiniro xa'mitinonte.

	Sai again gido xisamotoro , hiko	1.bussano	
	xiba xisine	2. ibbile	
301		3. godowu xiba	
		4. bisuha	
		5. eleha	
		6. wole	
		99. dawaro dino	

	Mage yana tisamito	mito bara	
302		lame	
		sase	
		shole	
		onte	
		lee barana ale	
		99 dawaro dino	
303	Ayiti bsadihu xibo	1. umiya	
		2. alibidi limiden	
		3. min manii	
		4. gorobete	
		5. hayimanotete anii	
		6. fayimate ogeyee	
		7. wolu	
		99. dawro dino	
304	Ayiti min gido tisamino mancho	1. anu	
badihi balate	badini balate	2. ama	
		3 wole	
		99. dawaro dino	
	Ayit min gobani badihu umi	1 ahahu	
	manchi	2. gorobete	
		3. amanote ani	
305		4. fayimate manni	

		4. wole	
		99. dawro dino	
	Aritinnon qafo	1 min gido	kiro504
306		2. folisho	
		3. ogeyetewin	
		4. umi fayimate	
		5. Hospital	
		6. tena tabihu	
		7. mitoreno	Hadhe . p5
		99. dawro dino	
	Mayi qafo adhitin?	1. mitoreno	
307		2. folisho	
		3. sagale hola	
		4. sagale aa	
		5. huchato	
		6. gatinoha tagicho adha	
		7. wole	
	Fayimate mine hadhinoni	1. ee	
308		2. denii	No .320
		99. kolo dino	
	Xabu gedensanii mee bara	1	
309	keshitinii	99. dawaro dino	

	Ee ikkturi kolo ,, hiko adhitin	1. ogeyetemine	Hari p4
310		1. 1rosakirinni	
		1.2. ogesha	
		1. 3. Tsebel	
		1.4. huchato	
		2 gilete clinic	
		2.1. Clinic	
		2.2. Pharmacy	
		2.3. Higher clinic	
		3. dagommu facilite	
		3.1. tena kela	
		3.2. Tena tabiya	
		3.3. h	
		4. manigistawe ikkitinoki dirijite	
		4.1. Clinic	
		4.2. Hospital	
		5. wole	
		99. dawro dino	
	Ayi akamine	1. Doctors	
311		2. Nurses	
		3. tenu assustant	
		4. ogeye	
		5. tenu officere	
		6. woridi tena nurse	
1	1		1

		7. diafomo	
		99dawro dino	
312	Hitonii gam.atito	1. danchaho yes No	
	Gra yarat	1 2	
		Zegenamano I Z	
		3. rosinoho 1 2	
		4. aramoho 1 2	
		5. shakadoho 1 2	
	Lanikita hadhinani wiro higine	1. awo	
313		2. deni	No. 319
		99. golo dino	
	Hite lain mangisteten ledo	1. Hospital	
314		2. Health center	
		3. Clinic	
		4. ogeye	
		5. safare	
		6.wole	
		99. dawro dino	
215	Wala yagata min hasira alamu	1 hura dina	
515	wole xagate initi hasira alamu		
		2. disrakaomo	
		3. Referral	
		4. fittu giwo	
		5. wole	
		1	
		99 dawro dino	
-----	---	---	---------
316	Muli xisora xagicho adhotoXagicho adhito	1. awo 2. din oo 99. dawaro dino	No .320
317	Xagicho gudito	1 awo 2.de'ne 3. dawaro dino.	
318	Qoloki de'ni ikkituro , Alidi xa'mo taru kiro.317 xagicho mayirati gudotokihu	abanoha qare hedateni. Hure nokihura Dihidhomo Wude ikkinohura. 88. di afomo 99 . dawaro dino.	