

DESCRIPTION OF KNOWLEDGE IN ANTIBIOTIC GIVING IN ROSSOAN VILLAGE HEALTH CENTER, ENREKANG DISTRICT, ENREKANG REGENCY

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ARTICLE INFORMATION

Received : September 10th, 2024

Revised : December 10th, 2024

Available online : February 20th, 2025

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KEYWORDS

Knowledge, Antibiotics, Rational, Information

DOI 10.24252/hmsj.v6i1.52413

ABSTRACT

Backround: An adequate understanding on health workers on use antibiotics can prevent the treatment ineffective. Increased risk for the security patient and the spread resistence.

Objective: The purpose of this research that is, to know the knowledge of midwives in provision of antibiotics for the patient.

Methods: The kind of research non experiment by using the method case study a qualitative approach. The data using a method of in-depth interviews.

Result: The determination of inform with purposive technique. Inform were 6 people consisting of 3 informants midwives and 3 informants patients. Based on the results of the study, the knowledge of midwives' knowledge of rationality in the administration of antibiotics based on 4 T (exact patient, precise indication, proper drug, correct dose) and 1 W (side effect) is still not appropriate because in midwife antibiotics using empirical therapy, the use of antibiotics for empirical therapy is the use of antibiotics in cases of infection that have not been known to the type of bacteria the cause.

Conclusion: rician drug information submitted is the name of the drug, the purpose of therapy, how to take medication with a time interval of 3×1 in a day, the drug should be spent and back in case of abnormalities when taking the drug.

INTRODUCTION

Antibiotics are agents used to prevent and treat bacterial infections (American Heritage, 2011). Antibiotics are drugs that are widely prescribed to patients, but their use is often inappropriate. As a result, there is an increase in bacterial resistance to antibiotics. This occurs

partly due to the lack of accurate information which can result in high levels of inappropriate consumption (Baltazar, 2009).

One factor in antibiotic resistance is the doctor as the prescription writer. Where the lack of knowledge about rational antibiotic selection can result in the wrong antibiotic administration so that

the desired effect is not achieved, resulting in bacterial resistance to antibiotics.

Adequate knowledge of health workers about the use of antibiotics can prevent ineffective treatment, increased risks to patient safety and the spread of resistance (Ministry of Health of the Republic of Indonesia, 2011).

The health government office in Enrekang district based on the letter of delegation of authority No. 42/PKM-KT/TU.I/1/2017 provides additional authority to assistant health center officers in this case, namely midwives, to carry out pharmaceutical duties with the following: (1) Recording drug use reports; (2) Giving drugs to patients; (3) Making LPLO (Drug Receipt and Request Report)

Based on the description above, midwives at the Rossoan Village Assistant Health Center have the authority to give drugs to patients, including antibiotics. As an effort to prevent antibiotic resistance in the community, a study needs to be conducted to determine the description of the knowledge of midwife health workers regarding the administration of antibiotics in Rosson Village, Enrekang District, Enrekang Regency.

METHOD

A. Type of Research

This research is a non-experimental research, where the researcher does not carry out any manipulation/intervention/exposure to the variables studied. By using the case study

method or field research, which aims to intensively study the background, current status, and environmental interactions that occur in a social unit such as individuals, groups, institutions, or communities (Siswanto, 2015).

This research uses a qualitative approach, where qualitative research is carried out through intense and long contact with the "field" or a situation. The situation is something normal, a reflection of the daily life of an individual, group, community, and organization (Miles and Huberman, 2008).

B. Location of research

This research was conducted at the Rossoan Village Health Center, Enrekang District, Enrekang Regency, South Sulawesi Province.

C. Sampling Technique

The sampling technique in this study was purposive sampling. Criteria for midwife informants: (1) Health workers working at the Rossoan Village Health Center; (2) Health workers who have given antibiotics to patients; (3) Willing to be interviewed until completion. Criteria for patient informants: (1) Residing and domiciled in Rossoan village; (2) Have or are currently consuming antibiotics given by the Rossoan Health Center midwife; (3) Patients at the Rossoan Village Health Center

D. Data Collection Method

In-depth interviews are a type of interview conducted by an interviewer to explore information, understand the views, beliefs, experiences, knowledge of informants about something in its entirety (Martha and Kresno, 2016). Observation can be interpreted as observation, where researchers observe phenomena that occur that are related to the research when the research is conducted (Sugiyono, 2014). As supporting data for primary data, in the form of literature or documents and data taken from an organization or institution.

E. Research Instruments

The instruments used in this study were interview guidelines, field notes, observation sheets, small books, writing tools, cameras, and recording devices as a complement to the researcher's research in the smooth running of the research being carried out.

F. Data Validity Check

Triangulation is a data validity check technique that utilizes something other than the data for checking purposes or as a comparison to it. The most widely used triangulation technique is checking through other sources (Notoadmodjo, 2010).

G. Data Processing and Analysis Techniques

In analyzing the data in this study, researchers used the Miles and Huberman data analysis model (Sugiono, 2014), namely as follows: Data Reduction (Data Reduction) Reducing data means summarizing, choosing the main things, focusing on important things, looking for themes and patterns and discarding unnecessary ones. Data Display (Data Presentation), after the data is reduced, the next

step is to display the data. Data presentation can be done in the form of brief descriptions, charts, relationships between categories, flowcharts and the like. Conclusion Drawing/ Verification, can be done with decisions, based on data reduction, and data presentation which is the answer to the problems raised in the study.

RESULTS

This research was conducted at the Rossoan Village Assistant Health Center, Enrekang District. The research was conducted on November 15-December 15, 2017. This research uses a qualitative approach, where qualitative research is carried out through intense and long contact with the "field" or a situation. So this research is intended to explore a fact, then provide an explanation related to the reality presented. Therefore, the author directly observed events in the field by conducting direct observations related to how the description of rationality and information conveyed by midwives to patients in administering antibiotics at the Rossoan Village Assistant Health Center.

In this study, the researcher chose a research location with the following characteristics: assistant health center, far from health centers or hospitals, located in remote areas, and health workers are only midwives.

The sampling technique in this study was the purposive technique (purposive sampling), namely by determining that the informant/"sample" is a person/party who can provide the desired

information/data. According to Morse (1995), there are no clear rules for sample size (non-probabilistic) in qualitative research. The size of the "sample" depends on the purpose of the research, research statement, benefits, credibility, availability of time and resources available (Martha, 2016). In this study, the determination of informants was based on certain criteria in accordance with the research topic.

Information obtained through in-depth interviews with interview and observation guidelines made in the form of a matrix.

Based on table 1, there are 3 female Midwife Informants. The last education of the informant is D III Midwifery. Informants were selected based on research criteria using purposive sampling technique, namely the selection of informants based on criteria determined by researchers such as, Health workers working at the Rossoan Village Health Center, Health workers who have given antibiotics to patients and are willing to be interviewed until completion.

Based on table 2, Patient Informants consist of 3 people. The ages and occupations of informants vary from students, housewives, and farmers. Informants were selected based on research criteria using purposive sampling technique, namely the selection of informants based on criteria determined by researchers such as, residing and domiciled in Rossoan village, having or currently taking antibiotics given by

midwives at the Rossoan Health Center, patients at the Rossoan Village Health Center, and willing to be interviewed until completion.

Midwives' Knowledge in Providing Antibiotics at Rossoan Village Sub-Health Center a. Right Patient

From the informant's statement regarding the assessment of the condition of patients who were given antibiotics, it can be concluded that the informant gave antibiotics to patients who had accident wounds, post-delivery and diarrhea.

This can be seen from the results of interviews conducted by researchers through indepth interviews, namely cases of diseases that are usually given antibiotic therapy and are illustrated through the following interview results:

"Cases that are given antibiotics are postdelivery, accidents, boils, and diarrhea that has healed. For example, if we have sutured the patient, we automatically give antibiotics. Because if there is a wound, it will automatically be attacked by bacteria, such as abrasions." (JM, Midwife Informant, 26 Years)

b. Right Medicine

From the results of informants' statements about the selection of antibiotics for patients, it can be concluded that informants choose antibiotics to be given to patients based on patient complaints and information from doctors, drug brochures and from experiences such as postpartum and accident wounds are given amoxicillin, diarrhea above 4 times is given cotrimoxazole

This can be seen from the results of interviews conducted by researchers through indepth interviews, namely the reasons for choosing to provide antibiotic drug therapy to patients and are illustrated through the following interview results:

"Yes, if for example serious wounds, we are afraid that if there is an infection, so we give them medicine so that it can inhibit bacteria in the wound. To be used for diseases caused by infection. Such as amoxicillin, ampicillin, tetracycline, cotimoxazole, grissenfulfin. Amoxicillin, cotrimoxazole, ampicillin. No, it depends on the wound, even if for example minor wounds are not given. If there is no written guide, it's just that if we ask the doctor, he/she will say, "This amoxicillin medicine is suitable for women who are giving birth, children, and things like that. Usually, if there is a patient, then we are confused, we call the doctor, we usually read the brochure." (NM, Midwife Informant, 48 Years Old)

c. Correct Dosage

From the results of informants' statements about the dosage of antibiotics given to patients, it can be concluded that informants determine the dosage of antibiotics given to patients based on the patient's age.

This can be seen from the results of interviews conducted by researchers through indepth interviews, namely the dosage of antibiotics that are usually given to patients and is illustrated through the following interview

results:

"Depends on age, for adults it is definitely 3 times 1, for children it depends on their weight, we see how much they weigh and then divide it by age" (LS, Midwife Informant, 26 Years)

d. Aware of side effects

From the results of informants' statements about being aware of the side effects of antibiotics given to patients, it can be concluded that informants ask patients to return when there are abnormalities when taking antibiotics.

This can be seen from the results of interviews conducted by researchers through indepth interviews, namely how to be aware of the side effects of antibiotics and is illustrated through the following interview results:

"We ask patients that if for example there are symptoms or abnormalities that are felt, they should immediately return to us. Resistance means that the germs are immune, so if we give antibiotics again, it is no longer effective, so the patient does not recover. This is due to errors in the way they are taken, or for example if they are not taken regularly, or sometimes they only take 2-3 times and stop immediately because they have recovered, so the antibiotics do not run out, the medicine does not run out and they stop immediately". (NM, Midwife Informant, 48 Years)

e. Exact duration of administration

From the results of the informant's statement about the duration of antibiotic administration given to the patient, it can be concluded that the informant gave 1 tablet of antibiotics to the patient

which was consumed for 3 days.

This can be seen from the results of interviews conducted by researchers through indepth interviews, namely How long do you usually give antibiotics to patients? and is illustrated through the following interview results:

"3 days, if the antibiotics run out and there is no change, they are referred to the health center" (LS, Midwife Informant, 26 Years)

f. Proper follow-up

From the results of informants' statements

about the follow-up of antibiotic administration to patients, it can be concluded that informants refer patients to the Health Center when there is no change after consuming antibiotics.

This can be seen from the results of interviews conducted by researchers through indepth interviews, namely If the patient does not recover, what do you do? and is illustrated through the following interview results:

"Usually referred to the health center for medical action" (NM, Midwife Informant, 48 Years)

Table 1. Characteristics of Midwife Informants

Informant Name	Age (years)	Gender	Education	Length of Service
NM	48	Female	D III Midwifery	26 Years
JM	26	Female	D III Midwifery	5 Years
LS	28	Female	D III Midwifery	± 6 Years

Information from Midwives in Handing Over Antibiotics to Patients at the Rossoan Village Sub-Health Center

a. Accurate information

From the results of informants' statements about the information conveyed to patients when giving antibiotics, it can be concluded that informants inform patients about how to take them, the use of the medicine, the medicine must be finished, return if there are abnormalities, and the information conveyed in written and oral form, with the hope that patients understand what is being informed.

This can be seen from the results of interviews conducted by researchers through in-

depth interviews, namely what information do you usually convey to patients? and is illustrated through the following interview results:

"Yes, the patient immediately asked, this is an antibiotic, you have to finish it, you can drink it after eating, for example, eat regularly, eat, leave it and say tomorrow, because that doesn't work for the antibiotic. Asked, this is an antibiotic to kill germs if you drink it regularly, but if you don't drink it regularly, the germs will increase, the medicine is taken 3 times, 1, morning, afternoon and evening, after eating." (LS, Midwife Informant, 26 Years)

This statement is supported by patient informants from the results of in-depth interviews

who said:

"Yes, How to eat, uses, 3 times a day after eating, (indications) to kill bacteria in the body, (information) Written and oral 3 x 1" (TR, Patient Informant, 62 Years)

b. Correct Method of administration

From the results of the informant's information about how to give antibiotics to patients, it can be concluded that the informant gave antibiotics to patients while explaining the rules for taking the medicine and writing down information on how to take the medicine

This can be seen from the results of interviews conducted by researchers through indepth interviews (in-depth interviews), namely how to give medicine to patients? and is illustrated through the following interview results:

"Yes, How to take medicine for example 3 times a day after eating, So that mothers know how to take medicine" (JM, Midwife Informant, 26 Years)

c. Correct Interval of Time of Administration

From the results of the informant's statement about the interval of time of giving antibiotics to patients, it can be concluded that the informant gave antibiotics to patients at intervals of 3 times a day or 3 times 1 spoon.

This can be seen from the results of

interviews conducted by researchers through indepth interviews, namely: What are the instructions (how to take) for using the medicine? and is illustrated through the following interview results:

"For example, it is written on the medicine 3 times one, or 3 times 1 spoon if syrup, so that he knows and he can do as conveyed" (NM, Midwife Informant, 48 Years)

d. Correct dispensing of drugs

From the results of the informant's statement about handing over drugs to patients when giving antibiotics, it can be concluded that the informant handed over the drug to the patient while asking the patient again regarding how to take the drug that had been given whether the patient understood the explanation that had been given.

This can be seen from the results of interviews conducted by researchers through indepth interviews, namely: What information do you usually convey to patients? and is illustrated through the following interview results:

"Yes, I am often asked again, mother, what else do you think about this, how many times do you take this medicine. So that she understands or not, don't let it get to her house "eee how many more times will I take this medicine, what else is it called", the patient asks again. To find out if you understand" (LS, Midwife Informant, 26 Years)

Table 2. Characteristics of Patient Informants

Name	Age (years)	Gender	Occupation
AF	17	Female	Student
SR	26	Female	Housewife
TR	62	Male	Farmer

DISCUSSION

1. Midwife's Knowledge in Administering Antibiotics at Rossoan Village Health Center

The use of drugs is called rational if it is given for the right diagnosis. The right patient in administering or prescribing drugs as well as antibiotics must be right and correct, because if the patient's condition or diagnosis is not established correctly or incorrectly, then the selection of drugs will refer to the wrong diagnosis. As a result, the antibiotics given will also not be in accordance with the indications that should be, so that it can result in bacterial resistance to the drug.

Based on the results of the interview, it is known that midwife informants provide antibiotic treatment to patients who experience accident injuries that can cause infection, postpartum, patients with severe diarrhea in this case who have defecated more than 4 times, fever that has been treated previously with basic drugs but does not heal and boils.

In deciding to provide antibiotic drug therapy to patients, it is taken after the diagnosis is established correctly, therefore the drug chosen must have a therapeutic effect that is in accordance with the patient's disease, so before administering antibiotics to patients, a laboratory examination is first carried out to determine the patient's diagnosis whether it is caused by bacteria or not.

Midwives at the Rossoan Village Health Center choose antibiotics to be given to patients based on patient complaints and information from doctors, drug brochures and from experiences such as postpartum and accident wounds are given amoxicillin, diarrhea more than 4 times is given cotrimoxazole, without conducting prior laboratory tests to determine the cause of the disease experienced by the patient.

The use of antibiotics for empirical therapy is the use of antibiotics in cases of infection where the type of bacteria causing it is not yet known. The purpose of giving antibiotics for empirical therapy is to eradicate or inhibit the growth of bacteria suspected of causing the infection, before obtaining the results of microbiological examinations (Ministry of Health, 2011).

Based on the statement above, it is permissible to provide antibiotic therapy to patients suspected of causing infection before microbiological examination, so the decision of the midwife informant to give amoxicillin to patients who have accident wounds and postpartum (wounds in the birth canal) patients who can cause infection is correct

Meanwhile, for patients with fever who have been given basic drug therapy for 3 days and have not recovered, so they are given antibiotic therapy and patients who have diarrhea more than 4 times a day are given antibiotics are not appropriate because antibiotics are only given if there are indications, such as bloody diarrhea or diarrhea due to cholera, or diarrhea accompanied by other diseases. This is very important because often when they have diarrhea, people immediately buy

antibiotics such as Tetracycline or Ampicillin. In addition to being ineffective, this action is dangerous, because if antibiotics are not used up according to the dose, it will cause bacterial resistance to antibiotics.

The dose, method and duration of drug administration greatly affect the therapeutic effects of the drug. Excessive doses, especially for drugs with a narrow therapeutic range, will be very risky for side effects. Conversely, doses that are too small will not guarantee the achievement of the expected therapeutic level (Ministry of Health of the Republic of Indonesia, 2011)

Based on the interview results, it is known that the midwife informant gave antibiotics with a dose of 3 times a day for adults and for children based on body weight divided by age, which was given for 3 days. This can be justified because empirical antibiotics are given for a period of 48-72 hours. Furthermore, an evaluation must be carried out based on microbiological data and the patient's clinical condition and other supporting data (Ministry of Health, 2011). Meanwhile, the midwife's vigilance in giving antibiotics was quite vigilant because the midwife asked the patient to return if there was an abnormality when taking antibiotics and if they did not recover, they were referred to the health center for medical action. However, the midwife did not convey what side effects would appear when taking the antibiotics, so this was not quite right.

2. Midwife Information in Handing Over

Antibiotics to Patients at the Rossoan Village Health Center

Correct and correct information on the use of drugs is very important in supporting the success of therapy, because the patient's knowledge and understanding in the use of drugs will have an impact on treatment compliance and success in the healing process, so drug information services are needed for patients and families through drug counseling. **Patients** who have sufficient knowledge about their medication will show increased adherence to the medication regimen they are using so that the results of therapy will also increase.

Based on observations and the results of interviews with midwife informants, it can be seen that the information conveyed by midwife informants when giving antibiotics to patients is the indication of the drug, how to take it 3 times a day, the drug must be finished, and return if there is an abnormality when taking the drug where the midwife conveys this information verbally and in writing.

Meanwhile, based on the results of interviews with patient informants at the Rossoan Village Health Center, they said that they already understood the information conveyed by the midwife, namely how to take it, the drug must be finished, the use of the drug and return if there is an abnormality when taking the drug, and this information was received by the patient in the form of verbal and written instructions on how to take the patient's medicine.

Providing information when giving medicine to patients includes: (1) Purpose of therapy; (2) Correct and regular use; (3) Do not stop taking antibiotics without the knowledge of the Doctor/Pharmacist (must be taken until finished unless an unwanted drug reaction occurs); (4) Possible unwanted drug reactions and actions that must be taken; (5) Storage method

Provision of information by pharmacists can be done verbally or in writing. Written information about antibiotics is made by the Drug Information Service Unit (PIO) of the Hospital Pharmacy Installation (Kementerian Kesehatan Republic Indonesia, 2011).

From the statement above, it can be concluded that the information on antibiotic drugs provided by midwives to patients is still lacking and the rules for taking are unclear because midwives do not interpret that drugs that must be taken 3 times a day are taken at intervals of every 8 hours, which can cause low levels of patient compliance when taking medication. And do not convey possible unwanted drug reactions and actions that must be taken.

CONCLUSION

Midwives' knowledge of the rationality of administering antibiotics based on 4 T (right patient, right indication, right drug, right dose) and 1 W (be aware of side effects) is still not right because in administering antibiotics, midwives use empirical therapy, where the use

of antibiotics for empirical therapy is the use of antibiotics in cases of infection where the type of bacteria causing it is not yet known. The information conveyed by the midwife when handing over antibiotics to the patient is the name of the drug, the purpose of therapy so that infection does not occur, how to take the drug with an interval of 3×1 a day, the drug must be finished and returned if there is an abnormality when taking the drug.

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