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Management Of Underweight Monitoring In Prevention Of Underweight In Tanjung Jabung Timur District, Jambi, Indonesia

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ABSTRACT
One form of malnutrition in infants and toddlers is underweight, which is a condition in which the body weight of infants or toddlers is far below their age standard. Based on the SSGI results, the prevalence of underweight in Jambi Province reached 13.8% in 2022, and the highest district/city prevalence of underweight was East Tanjung Jabung District with a prevalence of 21%. This study aims to analyzed the management of monitoring the weight children in an effort to prevent underweight. This research was qualitative study with 11 informants. Informants were selected using purposive technique. Data collected by indepth interview. Data analyzed by content analysis. Based on in-depth interviews, the input component consisting of human resources and infrastructure has not been maximized. The process component of monitoring under-two children was not in accordance with procedures, and the output component has not obtained accurate children monitoring data. It is recommended that regular monitoring of the progress of weight monitoring of underweight children, training health centre staff as information management personnel, increasing the participation of cadres by providing adequate incentives, and periodic reporting can be used as input in the prevention and intervention of underweight children.

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INTRODUCTION

The problem of malnutrition in infants and toddlers under the age of two years is still a major concern in many developing countries, including Indonesia. Malnutrition in infants and toddlers can cause a decrease in quality of life, increase the risk of disease and death, and have a negative impact on children's physical and mental development (Kassie & Workie, 2020) . One form of malnutrition in babies and toddlers is underweight, namely a condition where the weight of the baby or toddler is far below the standard for their age (Kemenkes RI, 2018). According to WHO data in 2019, there were around 47 million children under the age of five who were underweight throughout the world, and around 75% of this number were in Asia and Africa (WHO, 2020).

Underweight among children under five is still a serious global health problem and has a major impact on the quality of life and survival of children throughout the world (Garenne, Myatt, Khara, Dolan, & Briend, 2019). In developing countries, the incidence of underweight

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among children under five is still high and is one of the main causes of death for children under five years (Harding, Aguayo, & Webb, 2018) . Several factors play a role in the occurrence of underweight in toddlers, namely lack of access to nutritious food, especially protein and calories, repeated and uncontrolled infections and diseases, poor social and economic conditions, such as poverty and political instability, lack of access to adequate health services. Inadequate, such as vaccination and affordable health care, lack of knowledge about nutrition and healthy eating patterns (World Food Program, 2022) .

The reason why Indonesia is the country with the fourth largest population in the world is its high birth rate. Even though improving the quality of appropriate treatment can help create a superior generation of the nation, Indonesia still faces nutritional problems, especially among toddlers. Babies and toddlers aged 0-24 months have a critical period or golden period depending on the care given to them. The problem of malnutrition in children under five is significant in Indonesia. In a high-level meeting on the global action plan to overcome nutritional problems in Indonesian children, Subandi Sardjoko, Deputy for Human Development, Society and Culture at the Ministry of National Development Planning/Bappenas, revealed that Indonesia was ranked second with the highest prevalence of underweight after Papua New Guinea. As a result, the RPJMN aims to reduce the underweight rate to 7% by 2024. In addition, reducing the neonatal and under-five mortality rate is the SDGS target by 2030, with the hope that all countries can reduce the neonatal mortality rate to at least 12 per 1000 live births and death rates. under five to 25 per 1000 (Pratama, 2022) .

According to data from the results of a nutritional status survey (Health Development Policy Agency, Ministry of Health, 2022) , the prevalence of underweight in 2021 is 17%, and has increased to 17.1% in 2022, while according to riskesdas results in 2018, the prevalence of underweight under five, reached 17.7% and fell to 16.3% in 2019. Based on SSGI results, the prevalence of underweight in Jambi Province reached 13.8% in 2022, and the district/city with the highest prevalence of underweight was East Tanjung Jabung district with prevalence of 21% (Health Development Policy Agency. Ministry of Health, 2022) .

The determinant of underweight is a state of malnutrition caused by consuming insufficient nutrition according to needs within a certain period of time, so that the body will break down food reserves that are under the layers of fat and layers of the body's organs. Based on KEPMENKES No. 1995/MENKES/SK/XII/2010, malnutrition is nutritional status based on body weight index for age. The threshold category for nutritional status based on anthropometry is that toddlers underweight if their body weight for age is -3.0 SD to ≤-2.0 SD. Malnutrition can develop a condition of malnutrition that lasts for a long time so that the breakdown of fat reserves takes place continuously and the impact on the health of children under five will be complex, moreover, poor nutritional status can cause death (WHO, 2020) .

The determinants of underweight in children under five can be influenced by various factors such as inadequate nutritional intake, lack of access to health facilities, poor sanitation conditions, as well as unsupportive social and economic environmental factors (Hintsa & Gereziher, 2019; Moshi et al., 2022) . Research on the determinants of weight of babies under two years old is very important to help efforts to prevent underweight in babies and toddlers.

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Various factors can influence a baby's weight, such as the mother's nutritional status during pregnancy, breastfeeding practices, diet, and the surrounding environment (Kassie & Workie, 2020) . Improving a clown's weight status must be comprehensive. Data on the profile of determinants of underweight in toddlers is collected for intervention, while from a management perspective, this body weight must be monitored in order to provide policy recommendations.

Management of a baby's weight monitoring program must involve several important elements. Infant weight monitoring programs must collect accurate and regular data about the baby's weight, including data comparing the baby's weight with age and gender. This data must be updated regularly and used as a reference in determining future program policies. Monitoring the baby's weight must be done consistently and routinely, at least every month in the first months of the baby's life. This is very important for early detection of possible health problems that affect the baby's growth. The baby weight monitoring program must be supported by an effective management information system to facilitate fast and accurate data collection and data analysis. This information system can be a special application or software that is integrated with central data. Parents should be actively involved in the baby's weight monitoring program. Parents must be given an understanding of the importance of monitoring baby weight and ways to increase baby growth (Surveillance, 2022; World Health Organization, 2018; Wulandari, Margawati, & Rahfiludin, 2021) .

The research was conducted in East Tanjung Jabung Regency which is located in Jambi Province, Indonesia. The area of this district reaches around 5,615.48 km2 and consists of 12 sub-districts. Geographically, East Tanjung Jabung is on the east coast of Sumatra. The aim of this research is to analyze the management of monitoring the weight of young women in an effort to prevent underweight in East Tanjung Jabung Regency.

METHODS

This research has gone through ethical review and obtained ethical approval on 11 April 2022 with number 3848/UN4.14.1/TP.01.02/2022 at the Faculty of Public Health, Universitas Hassanuddin Makasar. This study describes the management of toddler monitoring in an effort to prevent underweight, which consists of input components including human resources, facilities and infrastructure, as well as process and output components in toddler monitoring management. This research is a qualitative research. This research was conducted from June to November 2022. This study was conducted in East Tanjung Jabung District, in the working areas of mendahara health centre and simpang pandan health centre. These two health centres were chosen because they have the highest population in the district. Informants in the study were selected using a purposive technique, namely the head of the child health and nutrition programme of the health office, the MCH programme holder of 2 health centres, 2 health centre midwives, 2 health centre cadres, and 4 mothers of infants. Primary data were collected by in-depth interviews with an interview guide, after obtaining informed consent from the informants. The results of the interviews were recorded, then recapitulated in the form of an interview matrix. To maintain data validity, data triangulation

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and source triangulation were conducted. Data processing used the NVIVO application. Data were analysed using content analysis.

RESULTS AND DISCUSSION

Based on the results of qualitative research from 11 informants, qualitative data collection includes inputs, processes and outputs in the management of monitoring children under two in East Tanjung Jabung District. Based on the results of in-depth interviews, the following results were obtained;

Input Components in the Management of Children under two Weight Monitoring

In the input component, it consists of human resources, and facilities and infrastructure in the management of monitoring under-five children. The human resources component consists of the competence, training of midwives and cadres in monitoring the weight of under-five children. The number of midwives and cadres is sufficient in terms of numbers. Midwives, as the person in charge of monitoring the weight of under-five children, trained cadres on how to weigh, record, and write reports in monitoring under-five children. Training is not conducted regularly, but only once to senior cadres. Furthermore, senior cadres teach the training to new cadres. The following are excerpts from the interviews with informants S1 and S2. Furthermore, the statements of informants S1 and S2 were confirmed by informant S3, with the following interview excerpt:

'The midwife is competent to do the weighing. But recording and reporting are trained' S.1

'Our midwives already know how to weigh, because they also teach the cadres' S.2

'We were trained once from the head office, but that's it, we've known weighing for a long time....if it's recording, making reports, we were taught, if there are obstacles we usually discuss it with the head office staff' S.3'

I am a senior cadre, we were trained by the public health center midwife. We were also taught how to take notes, make reports too, but sometimes we don't have time, because we serve a lot of people every time we do integrated healthcare center, so we write them later' S4

'We were trained in the past, but not lately... we are the ones who teach the new cadres. The midwife didn't have time...' S.5

In the infrastructure component, the health centres have baby weighing equipment, toddler scales and adult scales, and head measuring tapes. The following is an excerpt from the informant's interview:

'In our health centre, we have everything, you can check it out...' S.2, S.3

'Scales, head tape, microtois, there are everything.' S.4, S.5.

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In terms of recording and reporting, it is done manually using an expedition book by cadres, then the public health center midwife writes back by inputting excel data using a computer assisted by other staff. The following is an excerpt from her interview :

'Ideally, the recording is directly on the computer, we have provided the template. So, the data can be sent online. But, the obstacle is that many midwives cannot operate excel' S.1

'These midwives are already senior, so using excel, turning on the computer, they are sometimes confused. So we wait for the staff who are younger, to be processed and help enter the data. The important thing for us is to write it down in the big book first.' S.2

'For excel, we have people who help us, sometimes interns from health education, sometimes staff as well, so our data can't just be entered there and then. So we weigh it, then we write it in this book, well don't lose the book...' S.3

Cadres record and report manually by writing in an expedition book, then the book is submitted to the public health center midwife, the following are interview excerpts from informants S.6 and S.7:

'We weigh the children, then we measure the length of the body, then the head band, then we record it in the book, well later we submit this book to the public health center' S.6, S.7

In the input component, it consists of human resources, and facilities and infrastructure in the management of monitoring children under two. In the HR component, the number of midwives and cadres is sufficient in terms of numbers. The midwife, who is responsible for monitoring the weight of the baduts, trains cadres on how to weigh, record and write reports in monitoring the baduts. However, training is not carried out regularly, but only once for senior cadres. Next, senior cadres provide training to new cadres. In the infrastructure component, at the community health center there are tools for weighing babies, scales for toddlers and adults, and head measuring tapes are available. In terms of recording and reporting, it is done manually using an expedition book by cadres, then the health center midwife writes it back down by inputting Excel data using a computer assisted by other staff.

Lack of weight monitoring personnel can have an impact on preventing underweight. Weight monitoring personnel, such as doctors, nutritionists, or health workers, can help detect early symptoms or signs of being underweight in a person. They can carry out a thorough assessment of a person's health condition, diet and physical activity, and provide appropriate interventions to prevent or overcome being underweight. (Keller, 1993) Weight monitoring personnel have in-depth knowledge about nutrition and the need for balanced nutrition. They can provide education and counseling to individuals or groups about the importance of healthy food, calorie needs, and the nutrients needed to maintain a healthy weight. Lack of weight monitoring may result in a lack of access to this information. Weight monitoring per-

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sonnel play an important role in planning and monitoring health programs aimed at preventing underweight. They may involve public policy, community interventions, or prevention programs aimed at at-risk populations. A lack of weight monitoring personnel can hinder the implementation and monitoring of these programs. (Puspitarini & Hendrati, 2013)

Cadres record and report manually by writing in an expedition book, then the book is handed over to the community health center midwife. Monitoring of children under two is carried out at community health centers and also integrated healthcare center. Integrated healthcare center is carried out irregularly, depending on the readiness of the public health center staff who are constrained by the amount of work. The mother was hampered by bringing the clown because she was busy with work and the household. Transportation to the integrated healthcare center is provided by motorbikes belonging to the public health center, or the officers' personal property. The recording and reporting process by cadres has not been carried out ideally so the reporting process takes a long time. Ideally, with the use of technology this process should be fast. However, due to the officers' limited ability to use computers, recording and reporting took a long time . (Safitri, Prastiwi, & Setianto, 2022)

The results of research conducted by Fitriani, 2022, in terms of HR (Human Resources) still require additional positions for nutrition coordinators. The tasks in managing stunting toddlers have been integrated but there is no special team yet and the main duties are not in accordance with their competence, especially the nutrition coordinator is held by the midwife. Home visits are to motivate clients who have not received health services. The results of observations of supporting facilities are sufficient to support management, including medicines, vitamins, micronutrients and equipment used for examinations. All funding is subsidized by the District Health Service, but there is a lack of anthropometry for measuring Body Length (PB) in babies, because they only have one tool. (Fitriani, 2022) This research is also in line with Nur Wulandari (2021), that the HR component is also very lacking due to lack of training. (Wulandari et al., 2021)

In the infrastructure component, at the community health center there are tools for weighing babies, scales for toddlers and adults, and head measuring tapes are available. In terms of recording and reporting, it is done manually using an expedition book by cadres, then the health center midwife writes it back by inputting Excel data using a computer. assisted by other staff. Cadres record and report manually by writing in an expedition book, then the book is handed over to the community health center midwife.

The facilities and infrastructure needed to monitor baby (children under two) weight involve several important components. (Compiler., Team of the Directorate of Family Health, Directorate General of Public Health, 2020) The components of facilities and infrastructure that are generally used in monitoring the weight of babies are scales that are accurate and precisely calibrated, which are used to measure the baby's weight regularly. The baby scales that are usually used are digital scales with an accuracy of up to grams.

A special baby weighing table is used as a place for babies to be placed when their weight is measured. This table is designed so that babies feel comfortable and safe during weight measurements. Growth charts or growth cards are used to record and monitor the baby's weight development over time. These charts usually provide normal growth lines

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based on the baby's age and gender, allowing easy monitoring of the baby's weight development.

Writing equipment such as pens, pencils and notebooks are used to record the baby's measured weight. It is important to record data regularly and accurately, including the date of measurement and the baby's weight. Considering that babies have a vulnerable immune system, it is important to use sterile equipment when monitoring weight. This includes sterile gloves or cleaning wipes used to clean scales and weighing tables before and after use.

It is important to have a quiet and private space where the baby can be measured comfortably and without distractions. This helps create a calm and safe atmosphere for both baby and parents. Health professionals responsible for monitoring infant weight must be equipped with the necessary knowledge and skills. Appropriate training, guidelines, and resources on infant weight monitoring are essential to ensure accurate and effective monitoring.

Process Components in the Management of Under-5 Weight Monitoring

Monitoring of under-five children is carried out at the community health centre (public health center) as well as the integrated healthcare center. Integrated healthcare center is not routinely conducted, depending on the readiness of the health centre staff who are constrained by a lot of work. Mothers are constrained to bring their infants because of their busy work and households. Transport to the integrated healthcare center is provided by motorbikes owned by the public health center, or the personal property of the staff. Informants S.2 and S.3 said the following:

> *'Integrated healthcare center is not held regularly, because our cadres are limited. These cadres are not paid regularly, so they are less motivated... We usually go to the integrated healthcare center using a motorbike, whether we want it or not. But for transport we have a puskes motorbike.' S.2*

> *'Our integrated healthcare center is running too, sometimes we can go every month, sometimes we can't, it depends. Sometimes our obstacle is that it's hard to get the mothers to go to the integrated healthcare center because they work too, they're busy taking care of their children, things like that. So they like to come to the puskes dewek, because their time is free too... 'S.3*

In the process of monitoring the weight of the under-five children, the midwife or cadre records it in the MCH book of the under-five children, recapitulates it in the cadre's expedition book, and then submits it to the midwife. Furthermore, the weight data of under-fives is entered into a computer excel system, but calculating the average weight of under-fives for a certain age is done by manual calculation. Furthermore, the officer compares the average body weight of under-fives with the WHO standard for that age, then enters it into excel on the computer. The following is an excerpt from an interview with an informant:

> *'Ideally, recording and reporting should be done online. But we are limited in manpower. Not all officers are proficient in using computers. Especially in distant areas, internet access is difficult' S.1*

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'We write the records in a book, then enter them into the computer' S.2, S.3

In the weight monitoring process, if the average body weight of under-fives is below WHO standards, further preventive or treatment measures are taken by educating mothers about the nutrition of under-fives. Mothers are educated by explaining the best foods to consume for infants, and advised to increase breast milk production by eating nutritious foods, what should be consumed, and what is not good to consume. For underweight cases, it is assisted by giving PMT. If the average body weight of under-fives is in accordance with WHO standards, then regular monitoring is carried out to ensure that the condition of under-fives remains healthy, but this monitoring activity is carried out if the under-fives come to the health centre. Here is an excerpt from the interview:

'Usually, the midwife immediately calculates the baby's weight, whether it is within the green line or not. If it doesn't match, they educate the mother. If it does, we wait for her to come next month. But that's rare…' S.3

'If it's prevention, we educate the mother. If it's implementation, we can't routinely monitor it, at most we go down once in a while, the location is also far away…' S.4

'The data that has been collected, we calculate whether it meets the standards or not. If there are extremes, we usually educate the mother directly. The cadre can also come to the child's home. We teach diet, but sometimes we also give PMT' S.5,S.6

The obstacles faced in monitoring the weight of infants are that data collection is not accurate and has not been carried out regularly, so the data is not updated.

'We can't monitor it every month, because their location is far away… Mendahara Hulu is by pompong first. Even our Integrated healthcare center depends on the weather, if it's the rainy season we can't take the pompong… so we usually get the data from the cadres. But that's the difficulty, they don't have a fixed salary…' S.2

'Our integrated healthcare center is not routine either. We write down the data when we can, so the reporting is not done every time.' S.3

The weight monitoring management information system is not yet perfect due to officers who are not proficient in using computers and calculating with excel and signal constraints in remote areas. The following is an excerpt from his interview:

'The weight monitoring information system is established from the health centre, they record weight, height, head circumference, then calculate the Z score, then report it to the office. Ideally, it should be reported every month. We also have EPPBGM. This is actually the data collected together. But, the obstacle is that our computer-savvy

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officers are difficult. Not to mention signal constraints, because many of our remote areas are by sea....' S.1

'We do try to evaluate every month, but we have problems inputting this...' S.2, S.3

Midwives have a double workload, and there are also limited officers who are competent in using computers. The following are interview quotes by informants S.4 and S.5:

'We have a lot of work to do, this is not all we do...' S.4

'Service midwives too, administration too... so we have a lot of workload...' S.5

The determinants of underweight based on the results of the research were asked to informants. For the variable of early breastfeeding initiation (IMD), it is recommended for childbirth either at the hospital, health centre, or midwife. But the implementation is not monitored but reported to the agency. Direct monitoring is done, but not routinely. Monitoring of breastfeeding and breastfeeding patterns should be monitored by midwives, but there is no specific reporting. Smoking behaviour has been made a local regulation, but its implementation is not yet binding. For health facility visits, socialisation is conducted, but only as an appeal. There is a marriage age maturing programme, but its implementation is difficult to monitor. The age of marriage below 19 years is still widely practised. At the public health center, if a mother gives birth, IMD is guided. But it is difficult to implement due to supervision by midwives. Breastfeeding and breastfeeding patterns are educated to mothers of under-fives, but it is difficult to monitor because midwives rarely go directly to the community. Informant S.1's statement was confirmed by informants S.2 and S.3 The following are informant quotes:

'For IMD practices, breastfeeding patterns, breastfeeding is not routinely monitored. Smoking is what the regulation is working on, but it should be binding. We socialise PUP in collaboration with BKKBN, it's their programme. For visits to the health centre, we only encourage them. But it is not always monitored...' S.1

'IMD practices can be monitored if the birth is at the health centre, if outside, we don't know. We educate breastfeeding and breastfeeding patterns... Sometimes we encourage cadres to tell mothers to bring their children to the public health center...' S.2

'Indeed, these women are still young when they get married and have children. Many have not even graduated from high school. It is the smoking behaviour in the house that is difficult. Suaminyo gets angry when reminded...' S.3

In the process of monitoring the children under two's weight, the midwife or cadre records it in the children under two's MCH book, recapitulates it in the cadre's expedition book, and then hands it over to the midwife. Next, the toddler weight data is entered into the computer Excel system, but calculating the average toddler weight for a certain age is done

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using manual calculations. Next, officers compare the average weight of toddlers with WHO standards for that age, then enter it into Excel on the computer. In the weight monitoring process, if the average weight of toddlers is below WHO standards, preventive or further treatment measures are taken by educating mothers about toddler nutrition. (Rachmi, Agho, Li, & Baur, 2018) Mothers of toddlers are educated by explaining the best foods for toddlers to consume. They are advised to increase breast milk production by eating nutritious food, what is best to consume, and what is not good to consume . For underweight cases, assistance is provided by providing PMT. If the average weight of toddlers is in accordance with WHO standards, then regular monitoring is carried out to ensure that the toddler's condition remains healthy, but this monitoring activity is carried out if the toddler comes to the health center. (Ministry of Health, 2019)

The obstacle faced in monitoring the weight of baduts is that data collection is not accurate and has not been carried out regularly so the data has not been updated. Integrated healthcare center that is not routinely implemented. Lack of coordination with the Health Service. The weight monitoring management information system is not yet perfect, hampered by officers who are not yet proficient in using computers and calculating with Excel and signal problems in remote areas. Midwives have a double workload, and there are also limited staff who are competent at using computers.

Determinants of the causes of underweight based on the results of the researcher's research were asked to the informants. For the variable, early initiation of breastfeeding (IMD) is recommended for childbirth in hospitals, health centers or midwives. However, its implementation is not monitored but reported to the department. Direct monitoring is carried out, but not routinely. Midwives should monitor breastfeeding and breastfeeding patterns, but there is no specific reporting yet. Smoking behavior has been made into a regional regulation, but its implementation is not yet binding. For visits to health facilities, socialization is carried out, but it is only limited to giving advice. Marriage age maturity programs exist, but their implementation is difficult to monitor. At the health center, if the mother gives birth, she is guided by the IMD. But it is difficult to implement because of obstacles to supervision by midwives. Breastfeeding and breast-feeding patterns are provided by education to young mothers, but it is difficult to monitor because midwives rarely go directly to the community. The results of this research are in line with Nur Wulandari (2021), that in the process components there has been no cross-sector collaboration in implementing *underweight prevention.* (Wulandari et al., 2021)

Output Components in the Management of Under-five Weight Monitoring

In the output component, monthly reports of under-five weight data have not been formed, but annual reports exist. There is no analysis of the average weight of children under five for a particular age. Conclusions have not been drawn as to whether the average body weight of children under five is in accordance with WHO standards or not. There are no recommendations for further prevention or treatment. Remedies include providing nutrition and health education to the community, expanding nutrition and health education programmes in schools, health centres and other public places. By providing knowledge on how to choose and consume nutritious food, the community can understand how important

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a balanced diet is if the average weight of children under five is below the WHO standard. A regular monitoring schedule has been established through the integrated healthcare center schedule. Informant S.1's statement is in line with informants S.2 and S.3. The following is an excerpt from his interview:

> *'There is a monthly report, but not every month. But we have an annual report. We have Zscore analysis, but we haven't made prevention recommendations. The most we do is provide nutrition and health education to the community, expanding nutrition and health education programmes in schools, health centres, and other public places. By providing knowledge on how to choose and consume nutritious food, people can understand the importance of a balanced diet for their health' S.1*
> *'We don't do monthly reports routinely, but we definitely complete annual reports...' S.2*
> *'prevention or intervention is what yo educate but this is a long-standing programme... S.3*

In the output component, monthly reports on toddler weight data have not yet been formed , but there are annual reports. There is no analysis of the average weight of toddlers for certain ages. Conclusions have not yet been drawn whether the average weight of toddlers is in accordance with WHO standards or not. There are no recommendations for preventive measures or further treatment. Handling is carried out by providing education about nutrition and health to the community, expanding educational programs about nutrition and health in schools, health centers and other public places. By providing knowledge about how to choose and consume nutritious food, the public can understand how important a balanced food intake is if the average weight of toddlers is below WHO standards. A regular monitoring schedule has been established through the integrated healthcare center schedule. This research is in line with Nur Wulandari (2021), that in the output aspect, the health status of underweight, wasting and stunting toddlers has increased. Apart from that, monitoring and evaluation is also carried out on toddlers registered at the integrated healthcare center. (Wulandari et al., 2021)

In the management of monitoring toddlers' weight, the output component refers to the information produced after the monitoring and evaluation process has been carried out on the growth and development of toddlers. This output component aims to provide understanding and recommendations to parents or health workers regarding the nutritional and health status of toddlers. A toddler growth chart is a visual tool used to show the gradual development of a toddler's weight over a certain period. These charts usually include growth curves based on growth standards such as WHO or CDC. (WHO, 2009) Through this graph, parents or health workers can see whether a toddler's growth is in accordance with set standards or not. (Danjin, Adewoye, & Sawyerr, 2020)

Based on weight data and growth charts, this output component provides an assessment of the nutritional status of toddlers. Nutritional status can be categorized as good nutrition, undernutrition, or overnutrition. (Gizi et al., 2023) This information is important to find out whether a toddler is experiencing nutritional problems that need to be treated immediately or not. The output component also provides recommendations to parents or

health workers regarding steps that need to be taken based on the nutritional status of toddlers. These recommendations can take the form of changes to diet, increasing intake of certain nutrients, or further visits to a doctor or nutritionist. (Mahihody & Hinonaung, 2020) Education provides educational information to parents or health workers regarding the importance of balanced nutrition, healthy eating patterns, and good health maintenance practices for toddlers. This education aims to increase understanding and awareness regarding toddler nutrition and how to maintain their growth and development properly. (Ayu, Susanti, & Durungan, 2023; Black et al., 2018) This output component records all data and information that has been collected during the process of monitoring toddlers' weight. This record is useful for tracking a toddler's development over time, making it easier to monitor their overall growth and development. With this output component, it is hoped that parents or health workers can understand the nutritional status of toddlers, take appropriate action, and intervene if necessary to ensure healthy growth and development of toddlers.

CONCLUSION

Based on in-depth interviews, the input components consisting of human resources and infrastructure are not optimal. In the process component of monitoring toddlers, it is not yet in accordance with procedures, and in the output component, accurate monitoring data for toddlers has not been obtained. It is recommended that routine monitoring of the progress of monitoring the weight of toddlers be carried out, training of community health center staff as information management personnel, increasing cadre participation by providing adequate incentives, and regular reporting so that it can be an input in the prevention and intervention of underweight toddlers.

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