

Empowering Mothers in Stimulating Baby Growth and Development

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ABSTRACT

One of the most crucial factors is growth, which needs to be treated carefully from a young age. However, parents and medical professionals frequently overlook this. From a young age, a lot of work needs to be done to maximize children's growth and development in order to prevent any unexpected delays or deviations. According to the World Health Organization, the global newborn weight incidence rate is still more than 5% below the recommended level. According to Riskesdas (2018), 33.6% of study participants reported eating difficulties, 44.5% had mild to moderate malnutrition, and 79.2% had had eating difficulties for longer than three months. Massage stimulation is a manual technique that can be used as one of the promotional efforts to overcome children's health issues. A child's brain will be stimulated by appropriate and sufficient stimulation, resulting in the development of motor skills, speech and language, independence and socializing, and behavior and emotions that are ideal for their age. The 2024 study by Wardani et al. on the impact of baby massage on weight gain in infants revealed that there was a correlation between the two, with 52.5% of infants aged 0–3 months who got baby massage gaining more than 1 kilogram each month. The majority of the 111 parents of toddlers who participated in the community service project at St. Matthew the Evangelist Church in Bintaro said they thought the exercise was helpful and would utilize it at home. In light of this, it can be said that this community service project was successful in educating participants about the benefits of massaging infants and toddlers.

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INTRODUCTION

Following their birth from the mother's womb, infants are the initial stage of human life. The development of the infant's body and brain at this stage is always a top priority (1). Infancy is divided into two different phases by the neonatal period, which lasts from 0 to 28 days. Changes in blood circulation, environmental adaption, and the operation of bodily organs take place during this time. The early neonatal phase, which lasts from 0 to 7 days; the late neonatal period, which lasts from 8

to 28 days; and the post-neonatal period, which lasts from 29 days to 11 months, are the two periods that make up the neonatal period. Rapid growth and ongoing maturation take place at this time, particularly enhancing the nervous system's function (1).

One of the most crucial factors is growth, which needs to be treated carefully from a young age. However, parents and healthcare professionals sometimes overlook this since they are more concerned with managing their children's illnesses. From a young age, a lot of things need to be understood and done to maximize children's growth and development in order to prevent any unexpected delays or deviations.

The World Health Organization (WHO) reported in 2017 that the prevalence of underweight in Southeast Asia was 26.9%, and that the global infant weight incidence was still below the recommended level of more than 5%. However, 14% of people worldwide are underweight (2). According to the findings of Riskesdas (2018), 33.6% of the participants had eating difficulties, 44.5% had mild to moderate malnutrition, and 79.2% had had eating difficulties for longer than three months (3).

To ensure that every kid has the best possible health, the federal government and local governments must provide facilities and coordinate comprehensive health initiatives. In addition to basic health services and referrals, comprehensive health initiatives encompass curative, rehabilitative, preventive, and promotional activities (4). Massage stimulation is a manual approach that can be used as one of the promotional efforts to overcome children's health issues (5).

A child's brain will be stimulated by appropriate and sufficient stimulation, resulting in the development of motor, speech, and language abilities, independence and sociability, as well as behavior and emotions that are ideal for their age. To completely rule out the likelihood of developmental deviations, early detection is required, which includes investigating any parent complaints regarding their child's growth and development issues. The quality of early childhood development and preparedness for formal schooling will be enhanced by stimulating activities, identifying developmental abnormalities in children, and providing thorough and well-coordinated early intervention. Success indicators for promoting a child's growth and development include improvements in the child's mental, emotional, social, and autonomous development in addition to their health and nutritional status (6).

A 2024 study by Wardani et al. on the impact of baby massage on weight gain in infants discovered that 52.5% of infants ages 0–3 months who received baby massage gained more than 1 kilogram per month. In contrast, up to 20% of infants who did not receive baby massage gained less than or equivalent to one kilogram of weight (7). According to field studies and Scafidi, full-term kids aged 1-6 months who had massages for 15 minutes twice a week for six weeks saw superior weight gain than those who did not receive massages, and premature newborns who received massages three times for ten minutes gained 20% to 47% of their body weight each day (8). According to research by Musa et al. (2024), babies who received massage had a six-fold higher likelihood of gaining weight, and they gained fifteen times as much weight as babies who did not receive massage (9).

METHOD

This community service activity is carried out in several stages starting from the planning stage, starting with the preparation of a proposal, agreement on the implementation time, and preparation of educational materials. The plan for implementing this activity is October 13, 2024 at the St. Matthew Evangelist Church, Bintaro. The target of this activity is mothers who have babies aged 0-12 months.

The activity begins at 08.30 with an introduction and icebreaker activity in the form of a game. After that, participants were presented with material related to stimulating children's growth and gas with direct baby massage and compression. In this session, participants were also given the opportunity to ask questions with the resource person. Participants who participated had the opportunity to join groups and practice directly accompanied by facilitators. At the end of the activity, participants were evaluated regarding their understanding of baby massage.

RESULTS

Community Service Activities were held on Sunday, October 13, 2024 at 10:00 WIB. This activity was carried out in conjunction with the toddler posyandu of the St. Matius Penginjil Bintaro Parish Church. The counseling participants were parents of toddlers in the area around the Church. After the babies were examined and immunized at the posyandu, the parents and their children gathered in the hall to take part in this baby massage activity.



Figure 1. Baby massage demonstration by facilitator

The number of participants who attended was 111 parents of toddlers. The majority of participants were women (mothers of toddlers), namely 72%. The ages of the children varied from 2 months to 5 years. This shows that this community service activity is right on target because baby massage is one way of stimulation that will stimulate the development of the structure and function of brain cells. Even according to modern research, regular baby massage will help the physical and emotional growth of babies, in addition to maintaining their health (10).

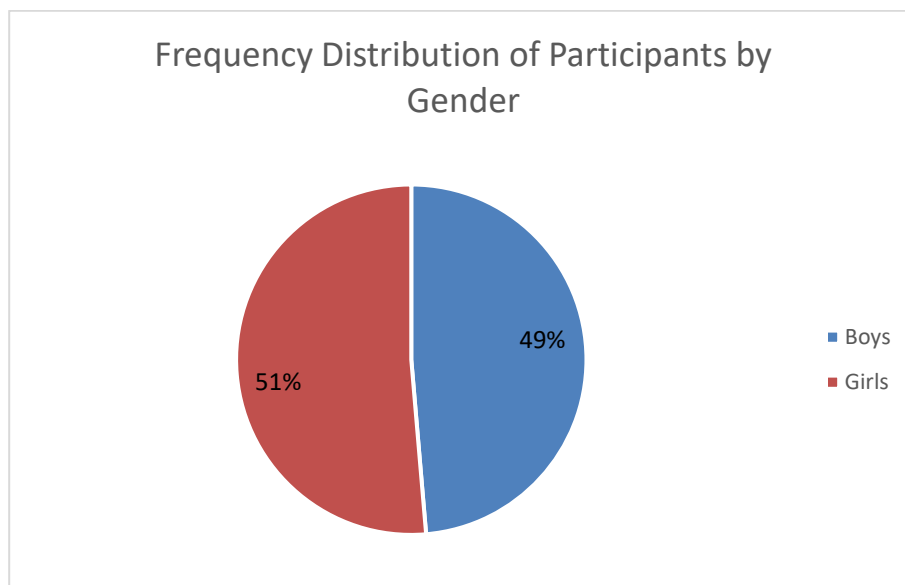


Figure 2. Gender Distribution of Toddlers

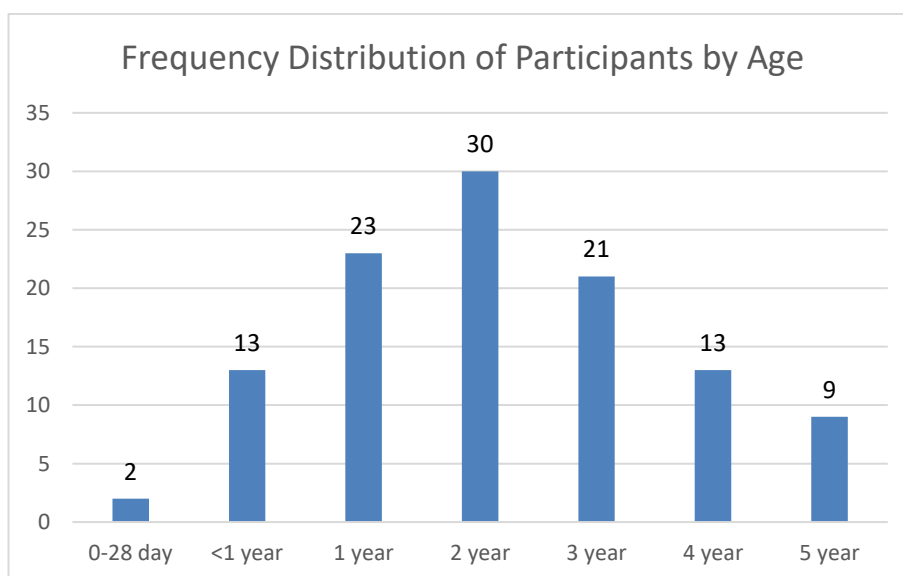


Figure 3. Distribution of Infants and Toddlers by Age

This activity began with an opening prayer by the MC, then a speech from the parish priest and the chairman of the committee for the Balita Posyandu Anniversary, and the cutting of the tumpeng. After that, the facilitators occupied their respective tables that had been prepared. Each facilitator guided around 10-15 people. One facilitator demonstrated while explaining, then followed by facilitators at other demonstration tables. While the participants and facilitators occupied their respective places, the committee distributed paper to participants who wanted to ask questions in writing and would be answered in the final session of the simulation.



Figure 4. Participants are enthusiastic about learning how to massage babies

The baby massage movements carried out consist of two stages, namely baby massage for neonates or babies aged 0-28 days and massage for babies aged more than 28 days-5 years. At the beginning of the activity, the facilitator exemplifies on a doll. After that, the facilitator demonstrates to the babies present at the posyandu. The facilitator also offers if there are parents who are willing to directly simulate on their own babies. Many experts have proven that baby massage performed by parents (especially mothers) can provide many benefits such as weight and length, better sleep, eliminating and reducing stomach aches, better physiological and behavioral responses (11). Baby massage is more beneficial among weight gain, better sleep-wake patterns, increased neuromotor development, better emotional attachment, reducing the rate of nosocomial infections and thus, reducing mortality in premature babies born (12).



Figure 5. Live simulation on the baby present

This community service activity went smoothly. The participants seemed to be actively paying attention and asking questions and recording the baby massage movements. The facilitator was also able to answer the questions given well. After the demonstration and simulation session was over, the facilitator answered several questions submitted through sheets of paper distributed at the beginning of the activity. The questions varied and all were answered well and satisfactorily. Then the event continued with a door prize session. Participants who gave the best questions could answer the questions and parents who were willing for their babies to be massaged in the simulation session received attractive prizes from the committee. Of the total 111 parents of toddlers who attended, the majority felt that this activity was useful and they would practice it themselves at home. Based on this, it can be concluded that this community service activity succeeded in increasing knowledge and providing benefits for participants regarding how to massage babies and toddlers.

CONCLUSION

Community Service in collaboration with the Toddler Posyandu of St. Matius the Evangelist Parish went well. The counseling participants were 111 parents of babies and toddlers. The counseling materials provided interactively included knowledge about the benefits and purposes of baby massage, as well as demonstrations and simulations of baby massage steps.

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