

***Moringa* Nastar Increase Prolaktin As Support Of 1000 HPK Action With UNICEF Consept Approach**

Ely Isnaeni , Erna Rahmawati

IIK Bhakti Wiyata Kediri, East Java, Indonesia

Corresponding author: ely.isnani@iik.ac.id

ABSTRACT

Background: The percentage of exclusive breastfeeding decreases with increasing age groups of infants. The desire for exclusive breastfeeding is not supported by maximum milk production and the main reason is time constraints due to work so that it is not possible to provide breast milk directly or by way of pumping breast milk. The more nutrients that enter the mother, the more the hormone prolactin, and the more milk production. Moringa contains phytosterol compounds that work to increase and facilitate the production of breast milk (lactagogum effect).

Purpose: This study aimed to analyze the effect of Moringa Moringa to increase prolactin as a supporter of the 1000 The first day of life (HPK) movement with the UNICEF concept framework approach.

Methods: The research design uses pre-experiment research design with one group pre-post tests design. Data were collected using purposive sampling with a total sample of 10 respondents. Data were analyzed using non-parametric data analysis techniques with the Mann Whitney test with $\alpha = 0.05$, to see the effect of Nastar Moringa increasing Prolactin as a Supporter of the 1000 HPK Movement With Increased Unicef Conceptual Framework

Result: The results of the study with the Mann Whitney test showed that the influence of Moringa nastar to increase prolactin levels was pvalue = 0.047. Before given Moringa nastar, the mean was 37.06 and after given Moringa nastar increased to 56.51.

Conclusions: it is concluded that there is an influence of Nastar Moringa to increase prolactin as a supporter of the 1000 HPK movement. Based on the results of this study it is recommended that mothers consume Moringa nastar to increase levels of Prolactin

Keywords: Moringa Nastar, Prolactin, 1000 The first day of life

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BACKGROUND

In Indonesia, the percentage of exclusive breastfeeding decreases with increasing age groups of babies. In infants aged 5 months exclusively breastfeeding was only 15.3% in 2010, but has increased by 36.2% in 2013, while infants 6 months exclusively breastfed by 30.2%¹. The target of exclusive breastfeeding is 80% in 2015. The results of the talk show "Philips Avent New Parents Class", 60% of breastfeeding mothers stop breastfeeding earlier than they want. A survey from De Jager in 2013 said that 1 in 10 mothers stopped breastfeeding because they felt uncomfortable breastfeeding outside the home. Another survey also showed that more than 30% of breastfeeding mothers felt comfortable pumping breast milk in a closed room⁵.

This study uses 10 mothers at Gambiran City Hospital in Kediri taken through a purposive technique in which the researcher chooses to marry, work, have children, give breastfeeding although not exclusively and formula milk or other complementary foods when the baby is 0-6 months old. The results of the study show that the desire for exclusive breastfeeding is not supported by maximum milk production and the main reason is the limited time due to work so it is not possible to provide breast milk directly or by way of pumping breast milk and the lack of full support from families to provide exclusive breastfeeding. The hassle if you have to pump breast milk when working, the distance is too far between the place of work and home, must consume fibrous food.

The cause of nutritional problems in 1000 HPK (First Day of Life) for example infants do not get exclusive breastfeeding. Although the data above requires validation, what is clear is that the scope of exclusive breastfeeding is still far from the target that must be achieved in 2015, which is 80%. According to UNICEF, "out of control" is an obstacle that causes ineffective promotion of exclusive breastfeeding. All efforts to improve nutrition outside this period have been proven unable to resolve the nutritional problems of the community thoroughly⁶.

Many factors affect the production of milk, milk production in the body depends on two hormones, namely prolactin and oxytocin. The more nutrients that enter the mother, the more the hormone prolactin, and the more milk production. Rahayu's research results stated that food factors significantly influence milk production in addition to psychological factors and baby sucking. Moringa plants are local food ingredients that have the potential to be developed in culinary nursing mothers, because they contain phytosterol compounds that function to increase and facilitate the production of breast milk (lactagogum effect)². Theoretically, compounds that have the effect of lactagogum are sterols. Sterols are steroid compounds³. The results of Fuglie's research on malnourished communities in Senegal, Africa with Moringa leaf flour therapy showed significant results on the nutritional status of individuals⁴.

In addition to vitamin C, the nutritional content will increase in quantity if Moringa leaves are consumed after drying and turned into powder (flour). Vitamin A in moringa leaf powder is equivalent to 10 times vitamin A in carrots, equivalent to 17 times calcium in milk, equivalent to 15 times calcium in bananas, equivalent to 9 times protein in yogurt and equivalent to 25 times iron in spinach⁷. Some of the above theories strengthen researchers to package Moringa leaf extract into a form of processed nastar bread so that it becomes an economical, practical, high nutritional value snack with the aim of analyzing the influence of Moringa nastar influence to increase prolactin as a supporter of the 1000 HPK movement with the UNICEF concept framework approach.

OBJECTIVE

This study aimed to analyze the effect of Moringa nastar to increase prolactin as a supporter of the 1000 HPK movement with the UNICEF concept framework approach, which was carried out in nursing mothers.

METHODS

The research method uses a pre-experimental design with one group pre-post test design research design, aimed to determine the effect of Moringa nastar on increasing levels of prolactin in nursing mothers aged 0-6 months at Gambiran City Hospital in Kediri. The study population was breastfeeding mothers of infants aged 0-6 months, samples taken were some of the population that met the inclusion criteria, namely: 1) nursing mothers of infants aged 0-6 months, 2) working at the Gambiran City Hospital in Kediri. Purposive sampling technique with a sample size of 10 respondents. The research location used is the Gambiran City Hospital environment in Kediri because 65% of the employees who work are women.

The participants were assured that their engagement was voluntary, and that anonymity, privacy, and confidentiality of the data were guaranteed. Furthermore, they were informed about the purpose and the method of the study before signing a written informed consent. The questionnaires were distributed to eligible participants at the Gambiran City Hospital, and respondents were asked to complete and return them in the same time.

RESULTS

The results of the study with the Mann Whitney test showed that the influence of Moringa nastar to increase prolactin levels was $pvalue = 0.047$. Before given Moringa nastar, the mean was 37.06 and after given Moringa nastar increased to 56.51.

DISCUSSIONS

The results of the study with the Mann Whitney test showed that the influence of Moringa nastar to increase prolactin levels was $pvalue = 0.047$. Before given Moringa nastar, the mean was 37.06 and after given Moringa nastar increased to 56.51.

The initial puerperium amount of milk produced correlates with the amount of prolactin released during breastfeeding after birth, the main stimulus that maintains the secretion of prolactin is sucking, milk production will continue as long as the baby continues to suck breast milk. Every time a mother feeds her baby, nerve signals from the nipple to the hypothalamus will cause a surge of prolactin secretion of about 10 to 20 times which lasts about 1 hour, this prolactin works on the breast of the mother to maintain the mammalian glands to secrete milk into the alveoli for alveoli to subsequent lactation production (Guyton & Hall, 2007).

This is supported by the results of research that prolactin levels differ in each preode, the results of research conducted on 16 breastfeeding mothers obtained different serum prolactin levels between groups of breastfeeding mothers 1 week postpartum, 4 weeks postpartum, 8 weeks postpartum, during the first menstruation after delivery and after the baby weaning. Prolactin levels of breastfeeding mothers 4 weeks post partum are higher compared with others (Glaiser, 2006).

Increased levels of the hormone prolactin because in nastar Moringa contains phytosterol chemical compounds namely poliferol and sterol, where these compounds play a role in increasing levels of prolactin, high levels of prolactin function to increase, accelerate, and

facilitate the production of breast milk. Phytosterol and Steroid compounds contained in Moringa leaves have lactagogum effect power, in which the mechanism of lactagogum power of a compound can occur among others by: directly stimulating the protoplasmic activity of mammary gland secretory cells, stimulating the secretory nerve endings in the mammary gland so that secretion increased milk, or stimulates the prolactin hormone that acts on alveolar epithelial cells. Prolactin or luteotropin or LTH is a lactagonic and proliferative hormone against the mammary gland. The effect of prolactin in humans or mammals is stimulating lactation (PUspita, 2013). In addition, the function of lactogogum can also increase glucose metabolism for lactose sites, thus increasing milk production.

CONCLUSIONS

There is an effect of nastar Moringa to increase prolactin levels with a pvalue = 0.047. Before given Moringa nastar, the mean was 37.06 and after given Moringa nastar increased to 56.51.

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