

Effectiveness of Information Education And Communication Using E Book Café For Increase Mother's Creativity in Processing Complementary Foods For Breast Milk

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Abstract

Background: There are still many babies who are given instant complementary foods and monotonous menus. So they get bored and difficult to eat. As a result, they can get growth development delay and stunting. The prevalence of stunting in Sidoarjo was 14,8% in 2020 and in 2021 it increased to 16,1%.

Objective: To determine the effectiveness of Information and Education Communication through the use of E Book Café Menu Complementary Foods For Breast Milk to increase the creativity of mothers and health cadres in providing home breast milk complementary foods.

Methods: Quantitative research using quasi-experimental and measurement methods using one group pretest-post test design. The population and sample were 115 mothers with toddlers aged 6 months to 2 years old and cadres in Wage Sidoarjo. The sampling technique used simple random. Respondents were given a questionnaire before and after given an electronic book. Then the effectiveness was measured using Wilcoxon test.

Results: The results of research analysis using the Wilcoxon Test show that $\alpha < 0.05$, p Value = 0.000, which means that Communication of Information and Education through the use of the E Book Café Menu for Breast Milk is Effective in Increasing the Creativity of Mothers and Cadres.

Conclusion: Communication of Information and Education through the Use of E Book Café Menu MP ASI is effective. Hope that it can provide access to varied and innovative healthy recipes, and can enable mothers and cadres to create Complementary Foods menus which attractive, nutritious and appropriate to the baby's developmental needs.

Keywords: Education, E Book, Complementary Foods

1. Introduction

The problem of babies and toddlers who have difficulty eating cannot be underestimated. Mothers must be creative in processing and providing complementary breast milk without compromising its balanced nutritional value and at an affordable price for the sake of their child's growth and development. Mothers and cadres were given questionnaires before and after being given the electronic book. As a result, they become more creative. Training on feeding infants and children has a positive effect on counseling skills in providing additional feeding (Fadjri, 2017). E Cafe Complementary Foods For Breast Milk is a new breakthrough that can help mothers provide complementary breast milk food for their babies and toddlers, which can be accessed easily by mothers via mobile phone. This electronic café contains information about the benefits of yellow pumpkin, Moringa leaves, purple sweet potatoes and various kinds of processed menus. The aim of this research is to determine the effectiveness of Information and Education Communication through the use of E Book Cafe Menu Complementary Foods For Breast Milk to increase the creativity of mothers and health cadres in providing home Complementary Foods For Breast Milk in Wage Sidoarjo Village.

2. Materials and methods

2.1 Materials

This research involved 115 mothers with toddlers aged 6 months to 2 years and health cadres in Wage Sidoarjo village. Respondents were given a questionnaire before and after being given an electronic book containing information, education and various kinds of home Complementary Foods for breast milk menus. Then the influence or effectiveness was measured using the Wilcoxon test.

2.2 Data collection procedures

This research is a quantitative research with a Quasy experimental design with a one group pretest posttest design. Sampling was carried out using random sampling techniques.

2.3 Data analysis

Data processing was carried out using SPSS. Univariate analysis is carried out to describe or describe the data that has been collected. Bivariate analysis was carried out to determine the effectiveness of Information and Education Communication through the use of the breast milk complementary foods menu cafe e-book. Bivariate analysis uses the Wilcoxon Signed Rank Test with α (0.05), if $p < \alpha$, indicating there is a significant or meaningful relationship between the two variables.

2.4 Research Ethics

This research has passed the ethical review at Research Ethics Committee Chakra Brahmanda Lentera Institution No.038/10/VI/EC/KEP/LCBL/2024.

3. Results and discussion

3.1 Results and discussion

Table 1. Characteristics of Respondents According to Age, Occupation, Parity, Child Age, breast milk complementary foods given, Posyandu Data Participation and Family Type in One Residence

Characteristics of respondents	Total (n)	Percentage (%)
Age		
Early adult (21-35 years old)	78	67,8
Middle adult (36-45 years old)	32	27,8
Late adult (46-65 years old)	5	4,4

Work

Yes	28	24,3
No	87	75,7
Parity		
Primipara	17	14,8
Multiparous	92	80
Grandemultiparous	6	5,2
Child Age		
6 month-1 year	88	76,5
1 year-2 years	27	23,5
Breast milk Complementary Foods Type		
Home only	30	26,1
Instant only	26	22,6
Combine	59	51,3
Attendance at Posyandu		
Always/Every month	64	55,7
Sometimes	45	39,1
Never	6	5,2
Family type in one house		
Nuclear family	92	80
Big family	23	20
Total of Respondents	115	100

Based on table 1, it shows the results of the frequency distribution of mothers who have toddlers aged 6 months to 2 years and health cadres in Wage Sidoarjo village are mostly aged 21-35 years (67.8%), most of the mothers who have toddlers aged 6 months to 2 years and most of the health cadres in Wage Sidoarjo village do not work (75.7%) and almost all are multiparous mothers.

Table 2. Effectiveness of Information and Education Communication Through the Use of E Book Cafe Menu Breast milk Complementary Food to Increase the Creativity of Mothers and Health Cadres in Providing Home Breast milk complementary food

Information and Good Communication	Enough	Less	Total	Z count	Table 2 above shows that almost half (40%) of	
Pre-test	46 (40%)	39 (33,9%)	30 (26,1%)	115 (100%)		-4,661
Post-Test	66 (57,4%)	40 (34,8%)	9 (7,8%)	115 (100%)		

Wilcoxon test $\alpha < 0,05$, ρ Value = 0,000

mothers who had toddlers aged 6 months to 2 years and health cadres in Wage Sidoarjo village had good knowledge, while mothers who had toddlers aged 6 months to 2 years and After being given intervention, the majority of health cadres in Wage Sidoarjo village (57.4%) had good knowledge. The results of the analysis using the Wilcoxon test show that each result is ρ value = 0.000 < 0.05 and the value Z (-4.661) < Z (1.9) means

that H0 is rejected and H1 is accepted so it can be concluded that Information Communication and Education Through the use of the E Book Café, the breastmilk complementary food menu is effective in increasing the creativity of mothers and health cadres in providing home breastmilk complementary food.

This is in accordance with research conducted by Murdiyati et al (2023) where the intervention provided communication of information and education through the use of e-books to mothers with toddlers aged 6 months to 2 years and health cadres in Wage Sidoarjo village (p- value = 0.000). Similar research conducted by Dewi & Yovani (2022) also explained that providing interventions can provide communication of information and education through the use of e-books to mothers who have toddlers aged 6 months to 2 years. Education can change the mother's knowledge about providing breastmilk complementary food correctly in a more positive direction, namely increasing the mother's knowledge because the material presented is the basic material that mothers need in feeding toddlers and will influence the growth and development of toddlers. One of the efforts that needs to be made to increase the growth and development of toddlers is nutrition and health education using media (Setyawati, 2015).

Almost all respondents live in a nuclear family with only their husband and children, without parents, in-laws or other family. So the decision making is easier and free, including in preparing menus or cooking and providing complementary foods for breast milk. The autonomous nuclear family is characterized by its capacity to make independent decisions without relying heavily on extended family or traditional societal structures. This autonomy applies to economic choices, parenting styles, and family roles (Cunningham, 2020).

Most of the respondents were young adults, so that they are more sophisticated in using social media and looking for information about their child's nutrition, how to prepare quality complementary foods for breast milk. Young adult mothers are typically more comfortable with digital technologies and online platforms. They are skilled in using search engines, social media, and parenting forums to access information (Pew Research Center, 2019). Researchers are of the opinion that positive changes in mothers' knowledge about breastmilk complementary food will have a direct impact on the growth and development of toddlers. By providing complementary foods that comply with nutritional guidelines and toddler needs, mothers can support optimal physical growth and cognitive development in their children. Apart from that, good knowledge about breastmilk complementary food also helps mothers avoid common mistakes in giving food to toddlers.

4. Conclusion

Characteristics of mothers who have toddlers aged 6 months to 2 years and the majority of health cadres in Wage Sidoarjo village are aged 21-35 years, and do not work with multiparous status. Communication of Information and Education (KIE) through the use of E Book Café Menu breastmilk complementary food is effective in increasing the creativity of mothers and health cadres in providing home breastmilk complementary food with a P-value of 0.000.

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Conflict of interest

The author declares that there is no conflict of interest in this manuscript

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