ABSTRACT

Objective: To investigate mothers’ knowledge of infant feeding. Methods: Descriptive study with a qualitative approach, developed in a Primary Health Unit located in the city of Maranguape-CE, with 14 first-time mothers of children aged 6 to 24 months, who were receiving complementary feeding and were resident in the District of Tabatinga between the months of July and October 2009, through participant observation and semi-structured interview. After reading, careful description of the interviews and classification of speech, the following categories emerged: complementary feeding and breastfeeding; food offered to children; and determinants of the healthy infant feeding. Results: Although mothers have basics knowledge of how a healthy diet should be, they continued introducing harmful foods to children, showing lack of control over food education. Mothers are aware that feeding the child could be based on nutritious foods; nevertheless, they prefer choosing those that feature ease of supply. Conclusion: The introduction of new foods was performed incorrectly and nutritional quality is inadequate for children. The mother appears in charge of the child development; however, for this process to be successful, she must become conscious of this subject, since a healthy diet directly influences the child’s organism, as it acts in all body systems.

Descriptors: Nutrition; Public Health; Child Health; Health Promotion.

RESUMO

Objetivo: Investigar o conhecimento materno acerca da alimentação da criança. Métodos: Estudo descritivo, com abordagem qualitativa, desenvolvido em uma Unidade Básica de Saúde situada em Maranguape-CE, com 14 mães primíparas de crianças entre 6 e 24 meses que estavam em alimentação complementar e residiam no Distrito de Tabatinga durante os meses de julho a outubro de 2009, mediante observação participante e entrevista semiestruturada. Após a leitura, descrição cuidadosa das entrevistas e classificação das falas, emergiram as categorias: alimentação complementar e leite materno; alimento ofertado à criança; e fatores determinantes da alimentação infantil saudável. Resultados: Apesar de as mães possuírem noções básicas de como deve ser a alimentação saudável, continuaram introduzindo alimentos prejudiciais à criança, demonstrando falta de controle sobre a educação alimentar. As mães são conscientes de que a alimentação do filho poderia ser baseada em alimentos nutritivos, entretanto, preferem optar por aqueles que apresentam facilidade de oferta. Conclusão: A introdução de novos alimentos foi realizada de forma incorreta e a qualidade nutricional está inadequada para as crianças. A mãe se configura como a responsável pelo desenvolvimento infantil, todavia, para que ocorra êxito nesse processo, deve haver a conscientização da mesma a respeito da temática, pois a alimentação saudável influencia diretamente no organismo da criança, atuando em todos os sistemas do corpo.

Descritores: Nutrição em Saúde Pública; Saúde da Criança; Promoção da Saúde.
RESUMEN

Objetivos: Investigar el conocimiento materno acerca de la alimentación del niño. Métodos: Estudio descriptivo, con abordaje cualitativo, desarrollado en una Unidad Básica de Salud localizada en Maranguape-CE, con 14 madres primíparas de niños de 6 a 24 meses que tenían alimentación complementaria y residían en el comarca de Tabatinga durante los meses de julio a octubre de 2009, a través de la observación participante y la entrevista semi-estructurada. Después de la lectura, la descripción cuidadosa de las entrevistas y la clasificación de los discursos, se identificaron las categorías: alimentación complementaria y leche materna; alimento ofrecido al niño; y los factores determinantes de la alimentación infantil saludable. Resultados: A pesar de que las madres tuvieran nociones básicas de cómo debe ser una alimentación saludable, ellas siguen introduciendo alimentos perjudiciales al niño, demostrando la falta de control de la educación alimentaria. Las madres son conscientes de que la alimentación del hijo podría está basada en alimentos nutritivos, sin embargo, prefieren optar por aquellos que presentan la facilidad de oferta. Conclusión: La introducción de nuevos alimentos fue realizada de manera incorrecta y la calidad nutricional es inadecuada para los niños. La madre es la responsable del desarrollo infantil, aunque, para que ocurra el éxito en este proceso debe existir su concienciación respecto la temática puesto que la alimentación saludable influye directamente en el organismo del niño, actuando en todos los sistemas del cuerpo.

Descriptores: Nutrición en Salud Pública; Salud del Niño; Promoción de la Salud.

INTRODUCTION

Healthy eating refers to that presenting nutritional value, promoting the health of the body. For a child under 2 years of age, which is growing rapidly, it is necessary that food provides the amount of energy and other necessary nutrients to ensure normal growth and development, including the brain’s(1).

In this regard, breastfeeding should be the first option as the menu for at least six months of life. After this period, the healthcare team must be prepared to guide the transition from breastfeeding to the introduction of new foods (initial stage of weaning), because it is a critical time, when nutritional disorders happen. On the other hand, it is common to observe situations where mothers early introduce in the child’s diet foods that are inadequate, from the nutritional point of view, because when a reduction in the supply of breastfeeding occurs, there are losses in the absorption of nutrients, thus increasing the risk of contamination/allergic reactions(2,3).

Complementary feeding involves social, economic and cultural aspects that impact on child nutritional status.

Thus, the adoption of balanced eating habits in the early years of life is important, since this is the period when habits are established and maintained through adolescence and adulthood(4,5).

The complementary feeding period is crucial for the prevention of nutritional deficiencies, overweight and hence morbidity and mortality. In this context, promoting an ideal diet for children should be part of the overall strategy for the security of the population. Although it is an attribution of health professionals and mothers, the ultimate success depends on the definition of appropriate government policies and the participation and support of civil society(5).

Therefore, nutrition education programs and efforts must be continuous and multifaceted. The improvement in eating behavior of individuals/communities is a long-term task and should be encouraged, because it is an ongoing process, permeated by information access, understanding and internalization of information, motivation, capacity, choice, and strategies for long-lasting changes(6).

Despite the improved accessibility to healthy foods, the reality of the municipality of Maranguape-CE presents data indicating the occurrence of early weaning and the introduction of foods lacking nutrients, being necessary to investigate the mothers’ knowledge regarding the supply of this food, in order to obtain scientific support and thus develop strategies that can reverse this situation.

This way, health professionals working in the region, knowing the difficulties mothers confront to offer a healthy diet, shall be able to develop alternative actions adaptable to their social conditions.

The health team, when addressing the child, should highlight the importance of dietary habits as efficient means of promoting health, controlling food and nutrition deviations, and preventing disease in childhood and in future adult life, such as nutritional deficiencies, chronic diseases, overweight and obesity(2).

In this context, the objective of this study was to investigate the maternal knowledge about infant feeding.

METHODS

Study of descriptive and exploratory nature, with qualitative approach, since in descriptive research, there is no interference from the researcher, who seeks to discover how often this phenomenon occurs, its characteristics, causes, relationships and connections with other phenomena. Qualitative research answers to particular questions, occupying itself in the Social Sciences, with a level of reality that cannot or should not be quantified(7,8).

The study was conducted within the Estratégia Saúde da Família - ESF (Family Health Strategy), taking place at a Unidade Básica de Saúde - UBASF (Primary Health Care
Unit) situated in Maranguape-CE. The research consisted of 14 participants, selected based on the following inclusion criteria: primiparous mothers of children aged 6 to 24 months who were in complementary feeding and residing in the district. Exclusion criteria were: children who were not in the age group mentioned and mothers who did not enjoy mental health.

Data was collected from July to October 2009. At the beginning, through the Community Health Agents (ACS), I was held an assessment of the participants meeting the inclusion criteria. With that data, the researchers visited the selected mothers, which responded to semi-structured interviews, guided by the questions: ‘What does your child usually eat?’; ‘Do you think your child’s feeding is healthy?’; ‘What you know about infant feeding?’. The interviews were recorded on tapes in full, with informed consent.

Data analysis occurred through the technique of content analysis of Bardin\(^9\). In pre-analysis, there was the reading of the material collected and organization through some techniques. In the analytical description, the data, which was coded and sorted, was thoroughly studied, in search of simultaneous compositions and divergent ideas. Finally, there was the inferential interpretation, with theoretical background and data reflection.

The categories that emerged from the study were: Complementary feeding and breast milk; food offered to children and determinants of healthy infant feeding.

The study was approved by the Comitê de Ética em Pesquisa da Universidade de Fortaleza - UNIFOR (Research Ethics Committee of the University of Fortaleza), with Approval 028/2007, meeting all the requirements demanded by Resolution 196/96 of the Conselho Nacional de Saúde\(^{10}\) (National Health Council), including signing the Free Informed Consent Form.

RESULTS AND DISCUSSION

Characterization of the mothers

The ages of the 14 mothers ranged from 18 to 32 years. Ten mothers were in work with some type of occupation and four performed household chores. Regarding family income, ten participants earned around one minimum wage per month while the others’ income was related to their partner’s unsteady work, portraying the financial difficulty experienced. With regard to the children in the study, six comprised the age group of 6 months to 1 year of age, and eight were between 1 and 2 years of life. It was observed that most of the mothers had some occupation, however, were the ones who instructed the other family members or performed the preparation of infant feeding.

The mother has a fundamental role in education and transmission of child eating patterns, and should be focused on preventing food rejections, obesity, diabetes, dyslipidemia and nervous anorexia. Low maternal education increases the likelihood that the child will not consume a good quality diet, either due to lack of access to healthy food and adequate information or to poorer ability to discern what is healthy, reflecting not only the access to healthier foods which have higher cost in Brazil\(^{11}\).

After reading in search of validation of data, through the careful description of the interviews, were identified the categories: complementary feeding and breast milk; food offered to the child, and determinants of infant feeding healthy.

Complementary feeding and breast milk

Although the Ministry of Health recommends that breastfeeding should be maintained until the child reaches two years of age, factors contributing to the disruption of this stage were observed, such as: return to work, financial condition, inadequate/insufficient guidance on the ideal period of breastfeeding and introduction of food, lack of knowledge about the benefits of proper nutrition, lack of partner’s participation in care.

When my daughter was two months old, my husband left me; He was the one who brought things home. The health agent said I had to put the girl to suck, but I had to work. The milk was over. She got sick, but my mother helped me in taking care of her. (M12)

I think her feeding is kind of healthy. I could have more time to care for, but I’m very relaxed. Sometimes there’s banana but I give cookie because I’m lazy! For me, what matters is that the girl stops complaining. (M11)

 Mothers are aware that the child’s feeding could be based on nutritious food, however, they prefer to choose those featuring ease of supply. The choice of appropriate food to children should be taken for every meal as a strategy to develop healthy eating habits and thus impact the individual’s life.

Studies indicate close relationship between the food offered and the nutritional status of children, so that water, tea, fruits and non-breast milk are regarded as the foods responsible for the cessation of exclusive breastfeeding. Moreover, the early introduction of chocolate, biscuits and sweets can lead to childhood obesity. One should not generalize the ability to breastfeed without considering the positive or negative feelings experienced by the mother. When the woman is assisted in her doubts and difficulties, the role of mother is safely assumed, being the health professionals responsible to ensure active listening, that is,
understanding her and clarifying on her beliefs and taboos, making breastfeeding a pleasurable act(12,13).

A mother’s decision to breastfeed is related to the value assigned by society to this act. However, this personnel option and its maintenance are influenced by psychological, social, economic and cultural aspects. The act of breastfeeding is more perceived as related to fulfilling a social obligation rather than a result of a rational choice motivated by personal conviction of the advantages of breastfeeding for mother, child, family and the State(14).

He eats little. Even though I try to give juice, milk, bread, homemade food, soup, he just wants my milk. When I started working, I tried to give him porridge and he started kicking. I began giving it when he was 3 months, he lost too much weight. He had diarrhea, vomiting. But that was the only time he got sick. For him, there is no better food than my milk. He is now 1 year and 2 months and will not stop breastfeeding him. (M9)

She eats whatever is available each day. One can give fruit, homemade food, vitamin. I’ve given her soda, but it is a face that this girl pulls. Also, she just started eating other things after 6 months. I’ll breastfeed until my milk is over. She never got sick. And she’s almost 1 year and 9 months. It’s too good to breastfeed. (M11)

The protective effect of nutrition begins with food practices in childhood, with the act of breastfeeding and providing a balanced diet for kids. Parent’s food consumption is crucial in choosing and therefore responsible for likely ensuring health-promoting feeding(15). Furthermore, complementation of breast milk after 6 months of age is essential to meet the infant’s nutritional needs(16). It should be noted that meals with novel foods do not replace breast milk, only complement it, and the feeding frequency can be kept.

The reasons why the mother decides about breastfeeding refer to culture, lifestyle and the influence of society. Although it is a biological process, mothers need to be informed about the advantages of exclusive breastfeeding and disadvantages of early weaning. It is known that infant mortality has close relation with cultural practices, and, although it tends to decline, this indicator of health in Brazil still shows significant rates compared to developed countries(13).

Children under six months of age who were not breastfed or who were weaned present the risk of death from diarrhea eight to ten times higher(17,18). Mothers who introduced food early and abandoned the practice of breastfeeding before the ideal time reported gastrointestinal problems.

Once in a while, he gets sick. Has diarrhea. He never makes a face. He began to eat other things was early. I think he wasn’t even 4 months of age. I also had to work! (M7)

He’s already had a problem, yes. Vomiting a lot, also had diarrhea. Once the health agent brought those serum pots for him to take here at home. At that time, I got worried, scared that he would end up needing to go to the hospital. (M5)

Appropriate complementary feeding of the breastfed child is fundamental to success in child growth and development. Food and nutritional security implies guaranteeing the right to access to food, healthy eating practices and respect for cultural characteristics. Therefore, the State must provide it, in conjunction with the civil society.

Healthcare professionals have the mission of orientation on proper infant feeding, aiming to foster the children’s growth and development. The challenge is to effectively educate the population, especially mothers and caregivers. Early introduction of foods may influence the duration of breastfeeding, interfere with the absorption of nutrients from milk and increase the risk of contamination and allergic reactions, the same way that the late introduction may lead to slowing the child’s growth, increasing the risk of malnutrition and micronutrient deficiency(17,18).

A child’s diet should be rich in nutrients. The mother has a key role at this stage, being stimulated and focused on the risks of a poor diet. Given this scenario, the health professional should discuss ways to promote breastfeeding, so that such practice is promoted and enhanced. Thus, health professionals should be aware that the eating habit is influenced by the experiences and learning in the early years of life. Childhood is the stage of the life cycle when ideal conditions for changes in eating habits and lifestyles are found, reflecting, in the future, healthier choices.

Food offered to child

As práticas alimentares são adquiridas durante a vida, destacando-se os primeiros anos como um período essencial para o estabelecimento de hábitos que promovem a saúde do indivíduo(19). No entanto, as mães introduziram alimentos sem valor nutricional as crianças. Eating habits are acquired during life, emphasizing the early years as a crucial period for establishing habits that promote the individual’s health(19). However, mothers introduced foods without nutritional value to children.

I give Farinha Láctea™ porridge, soup, coffee with milk, fruits, homemade food, bean broth, milk. Vitamin, Danone™, biscuit, ‘xilito’, juice, Mucilon™ or cornstarch porridge. (M2 and M3)

He eats everything: fruit, chicken soup, ‘xilito’, candy, ice cream, Danone™, biscuit. These things he likes most. When I’m drinking soda, if I don’t give it to him, he cries so much that no one can stand it! (M5)
The Ministry of Health\(^ {18} \) reports that an appropriate complementary feeding is one that includes foods rich in micronutrients and energy (iron, vitamins, protein, phosphorus, potassium, calcium), without contamination, with low contents of salt or condiments, of easy intake and consumption, good acceptance, without complications in the preparation, and affordable, respecting the age range where the child is.

_The food I give him is good. He only eats healthy things. Never was squishy or had diarrhea. I don’t give harmful food nor greasy. Vitamin, porridge, juice, fruit bruised with fork. He cries asking for candy, but I don’t give it. The health worker told me that he fits the right weight for his age. I’m careful about his feeding._ (M1)

My child’s feeding is healthy. I’ve worked in a family home and took care of a girl. I learned from my boss what I had to give to the baby for him to grow well, without disease. So, on my table, no bad food._ (M1)_

The possibilities of changing children’s eating habits may be limited by socioeconomic conditions. It is suggested that although food may refer to the basic need for survival, it is not limited to a natural phenomenon, in that the dietary practices are both linked to the availability of food as to the choice, depending on the cultural values and educational bases\(^ {19} \).

The increased consistency of food until it equals the family’s feeding pattern must be slowly and gradually introduced, starting from eight months of age\(^ {20} \). Although mothers possess basics knowledge of how a healthy diet should be, they continued introducing unhealthy foods to children, showing lack of control over the supply/food education.

_He eats junky food, but it’s my fault. I don’t like fruit, soup. It’s difficult to have this things here at home and the money is also short. I eat things I shouldn’t and he gets teasing and ends up eating. Our afternoon snack is homemade cake with soda. Sometimes, I’ve had dinner and eat it again. And the boy eats, too. There are times when, before bed, he cries, pointing at his belly and I am also feeling so ‘full’. I can’t control myself._ (M7)

By this, it is revealed that the consciousness of parents should be enriched with the real value of their role as a model for feeding the child, being necessary to adopt a healthy eating concept accompanying the intensity and scope of the concept of health. Therefore, parents have effective participation as nutrition educators. The children’s eating behavior is influenced by family and cultural and psychosocial interactions. In particular, the strategies used by parents, at mealtimes, to teach children the quantity and quality of the meal play a dominant role in the development of children’s eating behavior.

Determinants of healthy infant feeding

The Ministry of Health\(^ {18} \) reports that an appropriate complementary feeding is one that includes foods rich in micronutrients and energy (iron, vitamins, protein, phosphorus, potassium, calcium), without contamination, with low contents of salt or condiments, of easy intake and consumption, good acceptance, without complications in the preparation, and affordable, respecting the age range where the child is.

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On the day that we feel on the mood, I get anything done: soup, homemade food, it depends. When I’m out of disposition, I only make porridge. He eats a lot ‘xilito™’ at snack time, lollipop, candy and chocolate. I own a shop, I sell these junkies and he eats it. I know it’s not right, but I’m much accommodated._ (M14)

An increase in the consumption of processed foods, rather than fresh food, is observed. Vegetables and fruits are less cited, being cause of a nutritional imbalance related to vitamins and minerals, and high sodium intake.

This increase in consumption of processed food is also influenced by the media and marketing. From this knowledge, we can build a different nutritional approach with their mothers, in view of the development of criticality on the influence of poor infant feeding\(^ {21} \).

It should be noted that access to food is determined by the socioeconomic structure, which involves the economic, social, agricultural and agrarian politics. Thus, feeding practices, established by the condition of social class, cultural and psychosocial determinants are being stimulated by technological advances in the food industry, agriculture and globalization of the economy, with increasing concern because epidemiological studies indicate a close relationship between diet and some chronic diseases associated with food\(^ {22} \). Thus, nutrition education emerges as a strategy to ensure health, reaffirming the use of advice strategies on infant feeding, integrating theoretical content and permanent practices within the policies of health care for the child, emphasizing the concern with the continuous professional development.

The success on the child’s eating behavior depends on access to good quality food, which shall protect against the absorption of foreign substances, not exceed the functional capacity of the gastrointestinal tract and be free from infectious agents\(^ {23} \). In spite of the mothers’ basic notion regarding proper feeding, the children’s daily menu included unhealthy foods to infant body, showing contradiction in the discourse.

_The child also gets smarter, is more willing to play. Growing faster. Any baby has to have a good diet. I’m very strict on that point at home._ (M6)

_It is important because it has many vitamins that help in the growth of the baby. You have to eat well. Both, mother and son. You have to eat beans because it is strong. Give to the child, so that she doesn’t have anemia. Fruits and milk also leave the boy more robust._ (M13)
Despite the correct recommendations, the promotion of new food depends on the mothers/caregivers’ attitudes. In the first year of life, it is influenced by maternal education, and this, perhaps, is the variable that contributes most to the success of appropriate complementary feeding. However, some mothers showed a lack of clarity on the subject and the guidelines given by health professionals to such families should be reevaluated.

I don’t know for sure, no. I think it has something to do with intelligence. Makes the child smarter. (M3)

Here at home, people always argue with me, because once in a while, he appears crying with stomach ache and say it’s because he eats junky food. I think that good food does not let the child get a tummy ache. I see no difference, no. What matters is that the boy goes without hunger, isn’t it? I don’t even take it seriously when they fight me. (M8)

After the first year, the diet should be based on reducing the consumption of ready-made and fatty foods, with preference for fruits, vegetables, and foods rich in vitamins and minerals, essential for proper growth and child development. Thus, we propose health strategies addressing the theme of infant feeding in this region, in order to catch the interest of the population, changing the reality where the child is inserted. In the context of public health, it is necessary to require adequate infant nutrition, with a guarantee of further repercussions in health promotion. However, to promote health, cannot work to feed isolated individual nor the individual isolated from the environment.

FINAL CONSIDERATIONS

The factors interfering in a negative way in obtaining adequate feeding identified in this study were the low monthly income and educational level of the mother. Despite the basic knowledge about infant feeding, the introduction of new foods was performed incorrectly. The mother is configured as the primary responsible for the child development, however, for this process to be successful, there must be awareness of the nursing mother about the topic since a healthy diet directly influences the child’s body, acting in all body systems.

There is a need of developing tools for health promotion that subsidize the detection of disorders related to poor infant feeding in this region. We highlight the role of the health professional, seeking ways to monitor, guide and stimulate the process of introducing food to the child performed by the family, thus ensuring the healthy growth and development, ideal for age as well, seeking explanations for failings on poor diet, reflecting on measures that can be reassessed or improved, and advising mothers about healthy eating.

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