

Perceptions and Practice of Exclusive Breastfeeding among Malay Women in Kelantan, Malaysia: A Qualitative Approach

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ABSTRACT

Introduction: Despite evidence from various studies on exclusive breastfeeding (EBF) being best for infants, many women do not or are unable to practise EBF. This study aimed to examine perceptions on EBF and its influencing factors among a sample of Malay women in rural and urban areas in Kelantan, Malaysia. **Methods:** A qualitative study using in-depth interviews was conducted to examine respondents' views about EBF including their beliefs, experiences and feelings. The interviews were audio-recorded and transcribed verbatim, followed by discussion and identification of emergent concepts. **Results:** Data saturation was achieved after interviewing a total of 30 women. The mean age of the women was about 30 years with most having at least secondary level schooling; the majority were working women. Thirteen of the 30 women practised EBF. They believed breastfeeding allowed them to fulfill their reproductive role and regarded it as a gift from God. The practice required sacrifice, and was therefore associated with a combination of positive and negative feelings. Differing opinions surfaced with regard to belief in the superiority of breastfeeding and feasibility of practice. Many women accepted breastfeeding practice but found it challenging to practise EBF especially when confronted with low milk production, perceived low nutritional quality breast milk, and work commitments. **Conclusion:** Women should be educated on the importance of EBF with regard to the nutritional adequacy of breast milk and long term benefits for mother and children.

Keywords: Exclusive breastfeeding, formula milk, perceptions on breastfeeding

INTRODUCTION

Breastfeeding is the best feed for an infant. With its right amount of nutrient content that naturally adapts to the infants' needs, breast milk is the healthiest form of milk for the infants. There is extensive research on

the benefits of breastfeeding (Arifeen *et al.*, 2001; Harder *et al.*, 2005; Kramer *et al.*, 2008). It is unique that the benefits are dose-dependent with a longer duration and exclusivity providing more benefits (Lawrence, 1997; Chantry, Howard & Auinger, 2006). Therefore, the World Health

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Organization has recommended exclusive breastfeeding for the first six months of life followed by continued breastfeeding with appropriate complementary food for up to two years or beyond (Kramer & Kakuma, 2002). The infants should receive breast milk only, without any additional food or drink, during that period.

It is important to understand this issue because the rate of exclusive breastfeeding is still low globally. Many women prefer to feed their infants with formula milk and stop breastfeeding at a very early stage after birth while some continue to breastfeed their infants but also add formula milk due to various reasons. In addition, there are women who do not add formula milk but feed plain water or other fluids to their breastfeeding infants. All of these practices prevent the infants from getting the maximum benefits of exclusive breastfeeding. In Malaysia, the National Health and Morbidity Survey found the prevalence of exclusive breastfeeding up to six months in 2006 to be only 14.5% (IPH, 2008).

In order to improve exclusive breastfeeding practice, there is a need to explore the underlying factors that differentiate why some women succeed while others fail. Several quantitative studies have noted some of the factors associated with a short duration of exclusive breastfeeding. Among them are returning to work, the use of pacifiers, breastfeeding difficulties in the first four weeks, living in urban areas, male infants, Chinese ethnicity, bed-sharing practice, husband support, and maternal smoking (Tan, 2009; Tan, 2011; Xu *et al.*, 2007). Despite these studies extolling exclusive breastfeeding, the practice of exclusive breastfeeding is still far below the standard recommendation. It is therefore important to explore in detail women's views, beliefs and understanding related to breastfeeding.

The in-depth interview method is commonly used in qualitative research data

collection (Liamputtong, 2009). Respondents' perspectives on certain ideas, programmes or situations are explored through this method (Boyce & Neale, 2006). Though not a new method in the field of breastfeeding, it is still not commonly applied in Malaysia. In other countries, for example in Ghana, a qualitative breastfeeding research conducted among 35 periurban women identified maternal employment, breast and nipple problems, perceived milk insufficiency and pressure from family as the main obstacles to exclusive breastfeeding (Otoo, Lartey & Escamilla, 2009). Therefore, this study was conducted to explore perceptions on exclusive breastfeeding to gain insights into the factors that influence breastfeeding practices among Malay women in both rural and urban settings in the state of Kelantan in Malaysia.

METHODOLOGY

The study applied a qualitative method using in-depth interviews for data collection. It was conducted from December 2008 to December 2009 subsequent to approval from The Research Ethics Committee (Human) at Universiti Sains Malaysia. Malay women with children aged less than three years and not contraindicated to breastfeeding were included in the study regardless of their feeding method. Informed consent was obtained prior to the study.

The respondents were contacted through the help of the community health nurses and doctors in the corresponding districts, as well as through community leaders. The study applied a stratified purposive sampling, in which the women were purposively stratified based on their place of residence, to include women from two districts in Kelantan, which were Kota Bharu and Bachok, representing urban and rural areas, respectively. They also consisted of both working women and housewives. The study adapted the WHO definition of giving breast milk only, without additional

food or drink, not even water as exclusive breastfeeding.

The study began with interviewing six women from Bachok, all of whom were nurses. We found three to be practicing exclusive breastfeeding while another three did not. Then, we continued adding respondents from Bachok and Kota Bharu, including working women from several different occupations as well as housewives. The interviews were conducted mostly at their houses, except for four interviews which occurred at their workplace. The respondents themselves chose the time and place of the interviews, and the length of interviews ranged from 45 minutes to two hours. Data saturation was achieved after interviewing 30 women, and it was decided not to include new respondents.

Two researchers who were trained with the study objectives and qualitative method conducted the interviews in the Malay language, using an interviewer guide to facilitate the session. We prepared the guide through discussions among all the researchers, considering the objectives of the study. It covered the respondents' views beliefs, experiences and feelings about exclusive breastfeeding. Besides the researcher, a trained note taker was also present during the interviews.

The note taker recorded all the interviews by writing and also audio-recording. At the same time, she also noted and recorded any non-verbal cues during the interviews. The same note taker transcribed verbatim all the interviews followed by verification of the transcripts by the same researchers who conducted the interviews. Then, all the researchers read each transcript repeatedly and independently. They annotated and coded each transcript and identified the concepts that emerged from them. It was followed by further discussions among all the researchers to resolve any discrepancies in the coding and finally to conclude the key themes identified from the analysis.

RESULTS

A total of 30 respondents participated in the in-depth interviews. Among them, 13 respondents practised exclusive breastfeeding in the first six months of their infants' life. Among those who did not practise, 14 mixed breastfeeding with formula milk, two only gave breast milk but fed their breastfeeding infants with water and one mother started complementary food early. The socio-demographic characteristics of both groups are shown in Table 1. As for perceptions on exclusive breastfeeding, we identified six themes that influenced their breastfeeding practices.

Fulfillment of reproductive role

Respondents who practised exclusive breastfeeding believed that it was their role as a mother to give the best to their infants through exclusive breastfeeding. It was also influenced by the feeling of love, given to and received from their infants through breastfeeding. Some of the respondents described their feelings as:

“Every time I read the statement saying ‘breast milk is the best for baby’ displayed at the formula milk container, I know that I am able to give the best to my baby. If we give formula milk, we do not know what is added to it, but we are confident that breast milk comes from a mother.” (NMN, teacher, EBF)

“I am really satisfied when I can express my milk and give it to my baby. I feel that I have fulfilled my responsibility and am giving my baby his right.” (NS, dietician, EBF)

Similarly, those who did not practise exclusive breastfeeding also related breastfeeding practice with a feeling of love between them and their infants. They wanted to give breast milk to their infants. However, most of them were satisfied with

Table 1. Socio-demographic characteristics of the respondents based on feeding method (n=30)

Variables	Exclusive breastfeeding group	Non-exclusive breastfeeding group
	Freq (%)	Freq (%)
Age (year)	30.4 ^a (4.63) ^b	30.9 ^a (4.31) ^b
Education		
Secondary school		
Diploma		
Degree	5 (38.5)5 (38.5)3 (23.0)	7 (41.2)5 (29.4)5 (29.4)
Occupation		
Housewife		
Working	4 (30.8)9 (69.2)	6 (35.3)11 (64.7)
Place of residence		
Rural		
Urban	8 (61.5)5 (38.5)	9 (52.9)8 (47.1)
Number of baby	3.1 ^a (1.71) ^b	2.7 ^a (1.84) ^b
Age of baby (month)	15.5 ^a (7.25) ^b	15.1 ^a (7.19) ^b
Gender of baby		
Boy		
Girl	6 (46.2)7 (53.8)	10 (58.8)7 (41.2)

^amean

^bstandard deviation

their practice of mixing breastfeeding with formula milk. They expressed their feelings as:

“I add formula milk just for the baby to taste and be familiar with it. If I do not give breast milk at all, then only I will feel regret. What is important is that he gets the breast milk.” (NS, housewife, non- EBF)

“I do not mind adding formula milk, as long as I give breast milk to my baby.” (RK, veterinarian, non- EBF)

Gift from God and fulfilment of religious duty

Both groups of respondents who practised and did not practise exclusive breastfeeding believed that breast milk was a gift from God. It was full of goodness. Therefore, they appreciated their ability to produce milk and gave it to the infants. They described it as:

“For me, breastfeeding is a gift from God to us. The process cannot be experienced by any other person. We should be grateful and not waste the gift.” (RZ, nurse, EBF)

“Breast milk is the right of a baby and a gift from God to him. That is why I want to give him breast milk.” (NM, housewife, non- EBF)

However, some of the respondents who did not practise exclusive breastfeeding felt that breast milk was still inadequate for their infants and need to be supplemented with formula milk or other foods. One respondent stated:

“He always cried and looked like breastfeeding was still not enough for him. Then I tried to feed him with infant cereals, he ate it.” (NS, housewife, non- EBF).

There was also a respondent who believed that she could find formula milk with similar qualities as breast milk. She mentioned as,

“People told me that brand X [not the true name] is the same as breast milk. I know that formula milk cannot compete with breast milk but when I gave my baby the milk, he took it. So, maybe what people said is true.” (NR, clerk, non-EBF)

Relations with internal feeling

All respondents who practised exclusive breastfeeding were proud of their ability to do so. One respondent said:

“I am confident and proud that I can give exclusive breastfeeding to my baby, even though other people say that it is difficult to do so.” (NAS, clerk, EBF)

They also experienced a feeling of joy and satisfaction, as well as felt relieved and relaxed whenever they breastfed their babies. They expressed this feeling as:

“I am so happy to be a mother, especially when I breastfed for the first time and the milk came out from my breast. I am happy to breastfeed.” (NMN, teacher, EBF)

“My body feels light whenever I breastfeed my baby, a fresh feeling. I feel tired if I do not breastfeed.” (RM, housewife, EBF)

As for those who did not practise exclusive breastfeeding, many of them had a mixed feeling towards the practice. They felt the joy but they also experienced a sense of discomfort and fatigue, especially among those who were working. For them, it was sufficient that their baby was breastfed, though supplemented with formula milk. They admitted to being disappointed when their breast milk production decreased or stopped. They expressed it in this way:

“I feel tired especially when I have to sleep on my side to breastfeed my child

at night. I also do not have enough sleep as my sleep is interrupted. If I give formula milk, I can just prepare the milk once at night. He sleeps well after a formula milk feed.” (RZ, assistant officer, non-EBF)

“I feel disturbed when my body automatically stimulates milk production and I have to express it while at work. I feel uncomfortable.” (NR, clerk, non-EBF).

Superiority of breastfeeding

All respondents who practised exclusive breastfeeding appreciated the benefits that they and their infants have gained through breastfeeding. They believed that they would not get similar effects from formula milk. It motivated them to continue providing the best to their infants. All of them experienced better resistance from their infants against infection. One of them described it as:

“The most obvious is that my children are healthy. They are not infected when other children have flu. I can count only few times in a year that they caught flu.” (IJ, doctor, EBF)

Other benefits included baby's development, economical factor, bonding, weight reduction for them and amenorrhea as a family planning method. Examples of their quotations were:

“I can save a lot through breastfeeding. In relation to health status of my children, they are less ill, so I save money as I make less trips to the doctor.” (NAB, clerk, EBF)

“When I am angry, it looks like he can feel that. When I am stressed, he looks uneasy. When I am calm and happy, everything goes smoothly for him. I feel like there is a bonding between us, as if he can feel what I feel.” (NS, dietician, EBF)

Meanwhile, those who did not practise exclusive breastfeeding claimed that their

babies have similar health and development status with those who practised exclusive breastfeeding. One of the statements was:

“My sister practised exclusive breastfeeding. I do not see any difference between her children and mine. They are active and have good development.” (ACH, nurse, non-exclusive breastfeeding)

Except for a few who realised the disadvantages experienced by their babies, others were satisfied with their practice. There were also respondents who claimed that they have had bad experiences with previous breastfeeding practice. Therefore, they began to add formula milk early for this current infant to avoid similar problems. One of them said :

“Based on previous experience, it was difficult to leave his brother to caregivers because he was used to breastfeeding and refused formula feeding. I am afraid he will become like his brother.” (NR, clerk, non- EBF)

Requires sacrifice

Respondents who practised exclusive breastfeeding have made a lot of sacrifices to be successful. They were very determined to provide the best for their infants. Many of them started to express their breast milk even as early as during the first one month after delivery, so that they would have a stock of milk on their return from work in the evening. In addition, they also planned their time to be able to express their milk regularly or even opted for breastfeeding in between work hours. One of them described her situation as follows:

“I do not use the whole one hour lunch time to eat or do something else. I need to balance my time. I will spend 15 minutes to express breast milk during that time.” (NAB, clerk, exclusive breastfeeding).

In contrast, those who did not practise exclusive breastfeeding were less determined and easily gave up whenever they faced problems. They found it difficult to express their milk because they were working and also claimed that it was not worth the effort, since they were able to get very little milk. They also could not manage to make adjustments such as bringing their babies nearer to the workplace or going back to breastfeed the babies. Some of them also claimed that they prioritised other things compared to breastfeeding. Their feelings are reflected in the quotations below:

“Sometimes I do not want to breastfeed because I want to maintain my body shape. I am tired, and when I reach home, as I need to be with her, I cannot sleep or rest. I feel tired.” (RZ, assistant officer, non- EBF)

“I need to familiarise my baby with formula milk because I only have a small amount of milk. It is not worth expressing it because I can only get a little of it.” (NAI, clerk, non- EBF)

“In order to go home, I need to spend RM 1 to fill my motorbike with fuel. How can I go back to breastfeed?” (AM, nurse, non-exclusive breastfeeding)

Feasible to practise

Feeling confidence with their ability to practice was an important factor among those who practised exclusive breastfeeding. Most of them knew how to maintain exclusive breastfeeding through reading, or by sharing their experiences with others. They were well prepared with good planning and the adjustment required of them. Most did not face any problems with breast milk production as they had been successful in practising exclusive breastfeeding with their previous babies. They described it as:

“When I was seven months pregnant, my milk started to come out. I have a lot of milk, even with my current body weight. I cannot accept that people do not breastfeed because I experienced a lot of milk.” (RZ, nurse, EBF)

“I do not feel it difficult at all. It is very easy; whenever my baby wants, I can give my breast to him straight away. It is different with formula feeding. We need to prepare the bottle, water and mix the milk first.” (NMN, nurse, EBF)

Meanwhile, those who did not practise exclusive breastfeeding felt it was impossible for them to practise because of work commitment and problems with breast milk expression. In addition, many of them believed that their milk supply was inadequate. However, they were able to practise exclusive breastfeeding during the confinement period and also when they were not working such as during weekends. They knew that they had plenty of milk during that period. These were some of their feelings on this matter:

“I do not think that I have time. I am not confident to give exclusive breastfeeding as I cannot afford to do so, with my work commitment and my condition.” (NR, clerk, non-exclusive breastfeeding)

“I am not confident that the expressed milk is fresh, that is why I do not express it. But I breastfeed exclusively during the weekend.” (RK, veterinarian, non-EBF)

DISCUSSION

Perception is a way of regarding, understanding, or interpreting something. It is important to understand people's perceptions since it influences their behaviour. As for breastfeeding, many women knew its importance, especially those aspects related to the health of mothers and infants. However, they still could not

practise exclusive breastfeeding. Therefore, we need to explore how they actually see, feel, understand and believe in the issues related to exclusive breastfeeding.

A nominal group technique exploring psychological factors influencing breastfeeding duration in Australia found that the breastfeeding women had strong motivation to put the infant's needs before all others, and it was strongly influenced by their love for the baby. In contrast, those who did not practise breastfeeding were also very much in love with their babies but they felt stressful and distressed in fulfilling the demand of these young babies (O'Brien *et al.*, 2009). Similarly in this study in order to fulfill their reproductive role, the respondents who practised exclusive breastfeeding were able to overcome the various obstacles to breastfeeding by the love between them and their infants. The feeling of motherhood helped to ease the breastfeeding practice. At the same time, this study also noted that those who did not practise exclusive breastfeeding also loved their infants. However, they did not put exclusive breastfeeding as the priority besides all their other roles as mothers, wives, workers etc. They were satisfied that they had given their breast milk to the infants, even though they had supplemented breastfeeding with formula milk.

In addition, almost all respondents believed that breast milk was a gift from God. They knew the superiority of breast milk and they wanted to give it to their infants. It might be the consequence of breastfeeding education given to antenatal women, routinely practised by most governmental health clinics and hospitals in Malaysia. However, there were a few women who felt that breast milk alone was inadequate for their infants. Therefore, they supplemented breastfeeding with formula milk and even believed that some brands of formula milk might provide similar benefits as breast milk. In Xinjiang, China, a similar situation existed in which more than half of mothers recruited in a study thought that exclusive

breastfeeding could not satisfy an infant's nutritional requirement until six months of age, thus requiring them to mix with formula milk (Xu *et al.*, 2007). In the United States, the percentages of public who agreed that infant formula was as good as breast milk increased significantly from 14.3% in 1999 to 25.7% in 2003 (Li, Rock & Strawn, 2007). These situations explain the reasons why some women easily add or shift to formula feeding when faced with obstacles in practising exclusive breastfeeding.

Feelings of pride, happiness, satisfaction, relief and relaxation were among the positive feelings experienced, motivating some of the women in this study to continue practising exclusive breastfeeding. Similarly, in Vietnam, most of the respondents used words like 'self confident', 'enjoyable', 'satisfied' and 'comfortable' to describe their breastfeeding experiences (Duong, Binns & Lee, 2004). On the other hand, negative feelings such as 'uncomfortable' and 'fatigue' were experienced by those who did not practise exclusive breastfeeding. Other studies also found that not all mothers reacted positively to their ability to produce milk. Some of them described breastfeeding as messy, and that it made them feel that they had no control over their body; they felt disgusted and uncomfortable (Mozingo *et al.*, 2000).

With regard to the superiority of breastfeeding, a study conducted in Nigeria found that most mothers who were able to practise exclusive breastfeeding perceived breastfeeding as something beneficial, especially related to health and development. They believed that infants who were given exclusive breastfeeding looked healthier, had less ailments and seemed more intelligent (Uchendu, Ikefuna & Emodi, 2009). It supported the findings from this study in which respondents who practised exclusive breastfeeding appreciated the benefits obtained through breastfeeding. All of them stated that their infants experienced only a few episodes of infectious diseases

and it motivated them to continue providing exclusive breastfeeding. Besides, they also highlighted bonding between mothers and infants as an added benefit. Similarly, mothers in Pennsylvania stated that the most significant factors contributing to the decision to initiate breastfeeding included infant's health, naturalness, and emotional bonding (Arora *et al.*, 2000). A good bonding from birth might help to reduce the increasing social problems later in life. These, together with other benefits such as economical factors and pregnancy spacing, were less appreciated by those who did not practise exclusive breastfeeding.

Those who practised exclusive breastfeeding were very motivated and had made a lot of sacrifice to succeed in their endeavour to breastfeed. Most of them decided on practising exclusive breastfeeding even during pregnancy. Early decision and preparations were shown to be positively related to the practice, as concluded from a study in Xinjiang, China (Xu *et al.*, 2007). However, among those who did not practise, time factor was a big obstacle for them. They also felt that exclusive breastfeeding practice required a lot of adjustments in their lives especially related to work, other household chores and social activities.

Employment was shown to be the major obstacle to exclusive breastfeeding in many studies (Otoo, Lartey & Escamilla, 2009; Xu *et al.*, 2007). Many women often cited time pressure as a reason to introduce formula feeding. However, a study conducted in the United States using 12-hour home observations at 19 and 24 weeks post-partum found that total time devoted to infant feeding was significantly greater in the women who gave other food in addition to breast milk compared to those who gave exclusive breastfeeding (Cohen *et al.*, 1995). This situation was explained by the fact that they needed more time to prepare the formula feed. Besides the time factor, there was also a respondent who was reluctant to breast-

feed for cosmetic reasons. Effect on breast shape was a big concern for her. However, it has been proven by a study in Italy that even though mothers frequently reported that the size and shape of their breasts had changed after childbirth, these changes did not seem to be associated with breastfeeding (Pisacane & Continisio, 2004).

In term of feasibility of practice, many women in the exclusive breastfeeding group were confident with their ability to practise exclusive breastfeeding. They also had positive factors that supported their practice, such as plenty of milk. However, the issues of inadequate milk production were of deep concern among those who did not practise exclusive breastfeeding. They perceived that their milk production was inadequate and therefore were not convinced and believed that exclusive breastfeeding was impossible for them, especially among working women after they returned to work.

Many studies across the regions have shown similar findings, in which many women felt that they had poor milk supply and their infants were not satisfied with the amount (Xu *et al.*, 2007; Arora *et al.*, 2000; Fjeld *et al.*, 2008). However, such beliefs have not been supported by objective assessment tools. Women should be educated about assessing the adequacy of milk supply such as listening for audible swallow during feeding, noting the infant's urine production and weight gain (Arora *et al.*, 2000). However, noting the differences between an infant who is adequately breastfed and one who is not have been less highlighted during antenatal and postnatal counseling. Therefore, most of the assumptions made are less valid and require further assessment and counseling.

Since this study found that many women want to breastfeed their infants but do not accept exclusive breastfeeding, a better strategy to improve the situation is needed. The rationale on the importance of giving breast milk only and the risks of

supplementing with formula milk, water or foods needs to be stressed to all women. Every woman should know that breast milk alone is enough to meet the nutritional needs of infants in the first six months of life. In addition, every woman should receive adequate knowledge on practical aspects such as measures to sustain milk production, ways to identify that infants are getting enough milk and steps to be taken if they are facing breastfeeding difficulties and problems. They should also understand that supplementing with formula milk would negatively affect the frequency of breastfeeding, and subsequently affect the production of breast milk.

As all women in this study agreed that breastfeeding was a gift from God, breastfeeding educators could use these messages while promoting breastfeeding among women. For example, Muslims are encouraged to breastfeed their babies until two years old. Therefore, motivation to all women is very important. They should know where they can seek help and assistance should there be any problems related to breastfeeding. The role of a breastfeeding support groups is of importance here. Other women who had succeeded in exclusive breastfeeding practice could also be used as a role model to provide support and share their experience.

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