

ORIGINAL ARTICLE

Weaning Practices in Mothers of Infants age 6 to 12 months visiting Sandeman Provincial Hospital, Quetta

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ABSTRACT

Background: Weaning can be described as gradually increasing the amount of foods other than breast's milk in the infant's diet. Breast feeding for the first four to six months is recommended by the WHO for a full-term healthy child by a healthy mother.

Aim: To find weaning-related factors that contribute, strengthen, and enable mothers of infants under the age of 12 months to obey or not obey guidance for proper infant feeding by World Health Organization's (WHO-2009)

Methods: The current research was a cross-sectional descriptive study. From March 2020 to January 2021, pre design performa was used to collect data from 100 mothers of infants under the age of 12 months who lived in Quetta City and visited at OPD department of Sandeman Provincial Hospital in Quetta. The multiple rounds of data collection were done. The data was analyzed by SPSS 20. Statistical test like chi-square test was applied to obtain the required results.

Results: Total 100 babies consist of 41(41%) male and 59(59%) female enrolled. The mothers in the sample were on average 27.2 ± 4.2 years old with the age range of 20-40 years. Results showed that mothers of 6-8 months' kids 18(45%) fully aware about the importance of weaning and feed their children with different soft food along with breast feeding which increased at the age of 8-12 month as 22(73.33%). Majority of mothers, i.e. 63% were housewives. The social status showed lower middle income 34% and 41% of research participants belonged to the middle income group. The findings showed that 61% mothers had inadequate knowledge about proper child feeding and weaning practice compare with other group as 39% with p-value 0.01.

Conclusion: Mothers should be well informed about the benefits and importance of weaning, as well as the age in which weaning should begin and the different forms of weaning diets available. This target can be met with the assistance of LHWs and LHVs, as well as the use of social media. It is important to stress the importance of continuing to breastfeed after weaning.

Key words: Mothers; Practices; Infants; Weaning.

INTRODUCTION

Weaning is the continued procedure by which a baby gradually becomes used to eat family or adult foods while becoming less reliant on breast milk. The method varies by culture and is often regulated by the child's specific needs. Since healthy babies of weaning age grow and develop at a rapid rate, it's critically to ensure that they get enough of the right kind of food¹. Weaning causes babies to move around more and become less dependent on their mothers. They begin to expose with germs in the atmosphere and at the same time, the way a baby's body protects itself from germs changes². Even when babies are very young, they still have from protection (immunity) received their mothers during pregnancy. However, this defense wears off after around four to five months, the babies begin to grow their own immunity when they come into contact with germs in the environment³. Babies are more likely to contract infectious diseases from the age of 4-5 months due to this change, particularly if they are not breastfed. That is why all food cooked for babies should be processed and fed in a very hygienic way⁴.

The World Health Organization (WHO) recommends that breastfeeding be started as soon as possible, followed by exclusive breastfeeding for the first six months, and then

complementary feeding be introduced in a timely and sufficient amount, frequency, quality, and variety to meet the nutritional needs of the growing baby at the six months of age, with breast feeding continuing up to two years⁵. Weaning or complementary feeding is the process of gradually replacing milk with solid food as the primary source of nutrition. It refers to the administration of any nutrient-rich foods or liquids other than breast milk⁶.

The addition of energy and non-energy containing fluids, non-human milk, and semi-solids or solids to a child's diet is referred to as complementary feeding by the WHO. Weaning is made simpler if the infant has already consumed milk from a source other than the mother's breast⁷.

It's a smart idea to give the baby an occasional bottle drink of breast milk from 4 to 7 months (or longer if you want to wean earlier) even if you want to begin breastfeeding, this will help with the weaning process in the future. Although still breastfeeding on demand, natural weaning happens when the baby accepts increasing quantities and forms of complementary feedings⁸.

Full weaning usually happens between the ages of two and four where natural weaning is used. Expected weaning occurs as a mother starts to wean without receiving signals from her baby that he is going to stop breastfeeding. The most critical reasons for weaning are due to returning to work, a new born baby, insufficient

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breast milk or unpleasant feedings, mastitis and poor development of child⁹.

Weaning is influenced by a number of factors, including maternal physiology, nutritional requirements, and developmental status of the infant, such as the biting habit and cultural problems. Due to religious and cultural beliefs, the incidence and extent of breast feeding vary by region. In various cultures around the world, weaning delays, early introduction of alternative feeds, and incorrect weaning from breast milk are all common practices¹⁰.

For weaning, the texture and consistency of the food is important; specially, soft and yummy foods, such as mashed fruits and vegetables, are preferred. Wheat, gluten, almonds, peas, liver, seafood, shellfish, dairy products and unpasteurized cheese are most recommended foods for weaning by the National Health Service (NHS) of the United Kingdom¹¹.

In Pakistan, the annual child mortality rate estimated about as about 76 per thousand live births. This death ratio indicates that almost 400,000 people would die in their first year of life. According to a survey by the UNICEF, in developing nations, primarily breast-feeding for the first 6 months reduces under-five mortality rates by 13%.⁽¹²⁾

During the weaning process, mothers typically use a variety of foods such as Khichdi, mashed potatoes, bananas, and eggs, as well as cereal and porridges. Meat consumption is uncommon in Pakistan due to its high cost. Tea, crackers, and rusk are often used during the weaning period in disadvantaged households because they are inexpensive and readily available.⁽¹³⁾ Most important purpose of this research was to find out the infant mothers' knowledge of the value of weaning correlated with their educational level, work, and maternal physical and financial health of families. The research also looked at the evidence and how these conditions affect the start of the weaning process at the appropriate age and period, as well as their own health.

MATERIAL AND METHODS

The conducted study was cross sectional. Data on weaning and infant feeding habits were collected from 100 mothers of infants under the age of 12 months who lived in Quetta City by using a pre-design proforma. The multiple rounds of data collection were done. The data was analyzed by

SPSS 20. Statistical test like Chi-square test was applied to obtain the required results.

Many researchers explore different research variables like age, religion, schooling, profession and monthly family income were included in the earlier literatures. (Qamer et al., 2018)⁽¹²⁾, the current investigation was undertaken to ascertain the relationship between literacy level, job load, physical and financial wellbeing of mothers of children. The weaning phase of infants and mothers' literacy levels were used as dependent and independent variables, respectively, in this analysis, whereas physical and financial fitness, level of consciousness, and jobs were used as irrelevant variables. Mothers with infants 6-12 months of age who were agreed for participation were taken as sample and different languages like English, Urdu and Punjabi was used for communication. Those mothers who were seriously ill or not willing to participate were excluded. Their personal records of participants and physical appearance were assessed to judge their maternal health.

RESULTS

Total 100 babies consist of 41(41%) male and 59(59%) female enrolled. Results showed that mothers of 6-8 months' kids 18(45%) fully aware about the importance of weaning and feed their children with different soft food along with breast feeding which increased at the age of 8-12 month as 22(73.33%). (Table-1)

18(18%) of the mothers were illiterate and 14(14%) of the mothers had primary and middle education and poor information regarding weaning, and 39(39%) mother had matric and intermediate education had sufficient information as compare with graduate mother 29(29%) had well educated (Table-2).

The average age of research participants of the study was 27.2±4.2 years with age range was <20 to 40 years. The basic characteristics included occupation of mothers, social status and awareness about proper child feeding and weaning practice. Majority of mothers, i.e. 63% were housewives. Most of the mothers belonged to the middle class income group as 41%. The results showed that 61% mothers had inadequate knowledge about proper child feeding and weaning practice compare with other group as 39% with p-value 0.01 (Table-3).

Table 1: Characteristics of the participants (n=100)

Age in month	Male	Female	Breast Feeding	No Breast Feeding	Mixed Feeding
4-6 month	11(26.6%)	19(32.2%)	14(46.67%)	8(26.67%)	8(26.67%)
6-8 month	17(41.5%)	23(38.9%)	16(40%)	6(15%)	18(45%)
8-12 month	13(31.7%)	17(28.8%)	6(20%)	2(6.67%)	22(73.33%)
Total	41(41%)	59(59%)	35(35%)	28(28%)	37(37%)

Table 2: Literacy level and Awareness about weaning practice

Education's level	Awareness level	Proper time	Early	Delayed	Total Cases
Graduation	Well	24	0	5	29(29%)
Matric and Intermediate	Sufficient	3	14	22	39(39%)
Primary and Middle	Poor	0	4	10	14(14%)
Illiterate	Poor	0	6	12	18(18%)

Table 3: Late weaning by socio-economic and demographic variables.

Characteristics		Frequency	Late Weaning		p-value
			N	%	
Maternal Age	< 20	21	6	28.57	0.032
	20-24	35	11	31.43	
	25-29	32	9	28.13	
	≥ 30	18	5	27.78	
Maternal occupation	House wife	63	25	39.68	0.042
	Employed	37	8	21.62	
Social Status	Lower Middle Income	34	18	52.94	0.03
	Middle Income	41	13	31.70	
	Higher Middle Income	25	2	8	
Maternal knowledge about proper child feeding and weaning practice	Inadequate	61	15	24.59	0.01
	Adequate	39	7	17.95	

DISCUSSION

Breast feeding is free of contamination and full of nutrition which is required in the initial months of life. Some peoples considered breastfeeding a backward way while comparing with bottle feeding, which is believed to be sophisticated. Breastfeeding also prevents breast engorgement. The period from birth to 12 months of age includes the period of breastfeeding and the shift from breast milk to other foods (weaning period), during which children are at greater risk of developing malnutrition and becoming underweight.

The current study was a cross-sectional, quantitative, descriptive study with data collected at single point in time from OPD department of Sandeman Provincial Hospital, Quetta, Balochistan.

It is recommended by different research reports that after 6 months of age, gradual initiation of semisolid and solid food is needed for healthy and proper growth of babies, as only breast milk is insufficient to meet all basic needs and prevent various diseases.⁽¹⁴⁾ The results of current study showed that the mothers of 6-8 month kids 18(45%) fully aware about the importance of weaning and feed their children with different soft food along with breast feeding which increased at the age of 8-12 month as 22(73.33%).

Current study showed that the mean age of mothers in the study was 27.2±4.2 years with the age range of 20-40 years. Other maternal characteristics included maternal occupation, social status and maternal knowledge about proper child feeding and weaning practice. Majority of mothers, i.e., 63% were housewives and majority of respondents belonged to the middle income group as 41(41%). The analysis showed that 61% mothers had inadequate knowledge about proper child feeding and weaning practice compare with other group as 39% with p-value 0.01¹⁵.

Research conducted by Noor Pur Shahan, total 138 participants enrolled and asked questions regarding their breastfeeding and weaning practices. Research findings showed participant 'sage group 23-26 years. According to the study's findings, 93.4% of respondents agreed that breastfeeding is good for babies and 94.2% mothers in this study breast fed their child too¹⁶.

Duggal et. al (2018) illustrated their results as that 202 children, 103(51%) were boys. The average age of the participants was 14 and a half months. Among the mothers, 133 (66%) were literate and 121(60%) were from a low socioeconomic status. 145(72%) of the infants were

exclusively breastfed when they were six months old. Breast-feeding was not given in 51(25%) of the incidents. In 88 (44%) of the girls, weaning was sufficient¹⁷.

The results of current study showed that 18(18%) of the mothers were illiterate and 14(14%) of the mothers had primary and middle education and poor information regarding weaning, and 39(39%) mother had matric and intermediate education had sufficient information as compare with graduate mother 29(29%) well educated.

According to Umar et al (2013), the most likely causes for this irregularity can be due to illiteracy, work schedules, financial status, maternal and family health (9% early weaning initiation and 32% delayed weaning cases)¹⁸⁻¹⁹. Another study conducted by Hopkins et. al (2017) reported that some kids were not being weaned till 7 months because their mothers do not understand importance of weaning. Most mothers thought that breast milk sufficient for their kids²⁰.

The study conducted by Mohammed et. al (2012) also, all the mothers knew that breastfeeding is the best nutritional source for baby. Results of another study showed that about 79% of the participants knew that breast milk protects child from diseases²¹.

Safaa et al (2012).revealed the study which showed 42.6% mothers did not know the suitable age to start weaning. Nearly half (50.2%) of the mothers reported that baby must be weaned completely from breast milk at the age of 2 years, these findings support the results of current study²².

CONCLUSION

Mothers must be aware about the importance and effectiveness of weaning, suitable weaning diets and age for beginning. This task can be achieved by the help of social media and LHVs. It is important to stress the importance of continuing to breastfeed after weaning.

Various weaning techniques were used, and mothers found a number of obstacles to following proper breastfeeding procedures. The results emphasise the importance of mothers developing personal expertise in the preparation of nutritionally healthy diets.

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