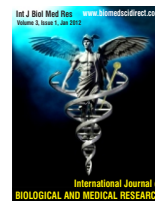


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### Original Article

## Practice of breast feeding and infant feeding among female paramedical workers of tumkur, karnataka.

Girish B<sup>a</sup>, Rajanna MS<sup>b</sup>, Sarwar Khan Tharin<sup>c</sup>, Ohurrat Ul Ain Afshan<sup>c</sup>, Barun Garg<sup>c</sup>, Priyanka<sup>c</sup>

Assistant Professor, Dept. of Community Medicine, SSMC, Tumkur

Professor & Head, Dept. of Community Medicine, SSMC, Tumkur

Sarwar Khan Tharin, Ohurrat Ul Ain Afshan, Barun Garg, Priyanka, Interns, SSMC, Tumkur

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#### ABSTRACT

**Abstract:** Background: Breast feeding is most important determinants of child survival, birth spacing and prevention of childhood infections. It allows mother and baby to emotionally bond in a special way that cannot be matched, since it meets both the nutritional and nurturing needs. Paramedical workers help to impart correct knowledge and practice among women beneficiaries {pregnant, lactating mothers and women in reproductive age group}. It is important for the health workers to have adequate scientific knowledge about infant breast feeding. The present study is to assess the knowledge and attitude of health workers with regard to infant feeding and also to identify gaps in their knowledge. Objectives: 1. To assess the practice of breast feeding in female paramedical workers. 2. To assess the practice of infant feeding in female paramedical workers. Methodology: A Cross Sectional Analytical study was conducted for 2 months in Tumkur taluk, Karnataka. Paramedical workers having at least one child were included in the study. A pre-tested questionnaire was used to interview the paramedical workers. Results: Majority (52%) of the paramedical workers are in the 31 to 40 age group. Most of the interviewed paramedical workers were nurses and ANMs. Majority (64%) had two or less no. of children that shows good family planning practice. 38% started breast feeding within half an hour which is a good practice. Majority (82%) of the population studied avoided pre-lacteal feed which is a good practice and among those who fed, honey was the most common pre-lacteal feed given. Approximately 1/3rd of the population studied had breast fed exclusively for 6 months which is recommended practice, while 46% started weaning earlier than 6 months due to various reasons. 56% avoided the practice of bottle feeding which is a good practice. Majority of the workers avoided using pacifiers which is a good sign. 68% of paramedical workers stopped breast feeding of the children age of less than two year which is in advised.

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### 1. Introduction

**BREAST FEEDING :** Breast feeding is most important determinants of child survival, birth spacing and prevention of childhood infections. It allows mother and baby to emotionally bond in a special way that cannot be matched, since it meets both the nutritional and nurturing needs.

**PARAMEDICAL WORKERS:** includes nurses, ASHA workers, Anganwadi workers, lab technicians & other health workers. Their work includes health and nutrition education and services on various aspects of health of a mother and child. [1]

**WHAT IS BREAST FEEDING?** Normal way of providing young infants with the nutrients they need for healthy growth and development. It is ideal and most natural food for baby, which provides medical and psychological advantages, important for health, nutrition, and development of a baby's trust and sense of security with overall development and learning readiness. [2]

#### EXCLUSIVE BREASTFEEDING

- It is practice of feeding only breast milk.
- Ideally recommended for 6 months of age.
- Initiated within half an hour of birth.
- It is important in reducing child mortality and morbidity.
- Exclusive breastfeeding rate is only 28% at 4-5 months of age.[3][8]

\* Corresponding Author : Dr. Girish .B

Assistant Professor,

Department of Community Medicine,

Sri Siddhartha Medical College, Tumkur - 572 107,

Karnataka

Mob: 09964623764

E-mail: [girish.b24@gmail.com](mailto:girish.b24@gmail.com)

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#### ADVANTAGES OF BREASTFEEDING FOR CHILD:

- Safe, clean, hygienic, cheap and easily available at correct temperature.
- Fully meets nutritional requirements of infants.
- Contains antimicrobial factors such as macrophages, lymphocytes, secretory IgA, anti-streptococcal factor, lysozyme and lactoferrin.
- Easily digested and utilised by both normal and premature babies.
- Promotes bonding between mother and infant.
- Sucking helps in development of jaws and teeth of babies.
- Protects babies from tendency to obesity.
- Prevents malnutrition and reduces infant mortality.
- Provides biochemical advantages:- prevention of neonatal hypocalcaemia and hypomagnesaemia.
- Special fatty acids in breast milk lead to increase I.Q and better visual acuity. [3][4]

#### FOR MOTHER:

- Helps in spacing by prolonging the period of infertility.
- Lowers mother's risk of PPH and anemia.
- Boosts mother's immune system.
- Reduces the insulin of diabetic mothers.
- Protects from ovarian and breast cancers.
- Protects from osteoporosis.
- Helps in involution of uterus.
- Helps to shed extra weight gained during pregnancy. [4]

#### COMPOSITION OF BREAST MILK

- Carbohydrates-lactose[6-7g/dl]
- Proteins[0.9-1.1g/dl]- lactalbumin, lactoglobulin
- Fats-PUFA, omega 2, omega 6
- Amino acids- taurine, cysteine
- Water-88%, Vitamins, Minerals, Electrolytes
- Enzymes, Immunological factors[3][8]

Colostrum- yellow and thick milk secreted during initial 3-4 days after delivery and contains more antibodies & cells & increased amounts of vitamins A, D, E, K. [4]

#### GOOD PRACTICE OF BREAST FEEDING

1. First feed-within half an hour of normal delivery & 4 hrs of caesarean delivery.
2. Position of mother and baby-sitting or lying down with good support.
3. Good attachment and effective suckling.
4. Frequency-8-12 feeds/24 hrs and on demand.
5. Duration-5-10 minutes at each breast.
6. Night feeding[5]

Difficulties in breast feeding

#### DUE TO MOTHER:

1. Reluctance or dislike to breast feed
2. Following operative delivery
3. Inadequate milk secretion
4. Inadequate emptying of breast
5. Anxiety and stress
6. Lack of night feeding

7. Breast ailments- cracked nipple, breast engorgement, depressed nipple mastitis

#### DUE TO CHILD

1. Poor infants attachment
2. Temporary illness-infections, oral thrush, lethargy, nasal obstruction
3. Low birth weight babies
4. Over-distension of stomach with swallowed air
5. Congenital malformations-cleft lip, cleft palate

#### OTHERS

1. Prelacteal feeds- honey, sugar water, gripe water
2. Dummies, pacifiers, bottles
3. Formula feeds or breast milk substitutes [3]

#### NEED FOR THE STUDY –

Paramedical workers help to impart correct knowledge and practice among mother beneficiaries {pregnant, lactating mothers and women in reproductive age group}. It is important for the health workers to have adequate scientific knowledge about infant breast feeding. The present study is to assess the knowledge and attitude of health workers with regard to infant feeding and also to identify gaps in their knowledge. [1][7]

#### WORLD BREAST FEEDING WEEK

It is an annual celebration which is being held every year from the 1st to 7th August. It was first celebrated in 1992 by World Alliance for Breastfeeding Action {WABA} and is now observed in over 120 countries with the support of UNICEF & WHO. Its goal is to promote exclusive breastfeeding for the first six months of life which yields tremendous health benefits and then supplemented breastfeeding for atleast 1 year and upto 2 years or more. [2]

#### AIMS & OBJECTIVES:

1. To assess the practice of breast feeding in female paramedical workers.
2. To assess the practice of infant feeding in female paramedical workers.

#### 2. Materials and methods

STUDY DESIGN: Cross Sectional Analytical study.

STUDY AREA: Tumkur taluk.

STUDY PERIOD: 2 MONTHS (August to September, 2012)

SAMPLE SIZE: 50

INCLUSION CRITERIA: Female paramedical workers having atleast one child.

EXCLUSION CRITERIA: Female paramedical workers not willing to take part in the study.

STATISTICAL ANALYSIS: percentage and proportions.

METHODOLOGY: The list of Paramedical workers working in different PHCs of Tumkur taluk was obtained from the THO office. All the PHCs were visited for interview. All the paramedical workers in the PHC according to the inclusion criteria were included in study. A pre-tested questionnaire was used to interview the paramedical workers. Data was entered in the MS Excel 2007 and analysis was done.

**RESULTS:****Table 1 : Distribution of Age Group of Paramedical Workers For The Study**

AGE GROUP(YEARS)	FREQUENCY	PERCENTAGE
21 – 30	13	26
31 – 40	26	52
41 – 50	10	20
51 – 60	01	02

Majority (52%) of the para-medical workers are in the 31 to 40 age group.

**Table 2: Distribution of designation among the paramedical workers**

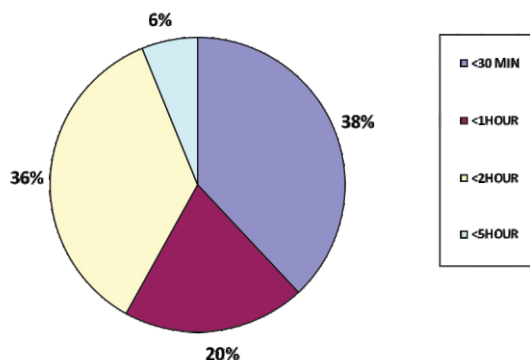
DESIGNATION	FREQUENCY	PERCENTAGE
ANM	18	36
ASHA	4	8
HEAD NURSE	9	18
NURSE	19	38

Most of the interviewed paramedical workers were nurses and ANMs.

**Table 3: Distribution of Total No. of Children Among Female Paramedical Workers**

DESIGNATION	FREQUENCY	PERCENTAGE
1	11	22
2	21	42
3	13	26
4	5	10

Majority (64%) had two or less no. of children that shows good family planning practice.

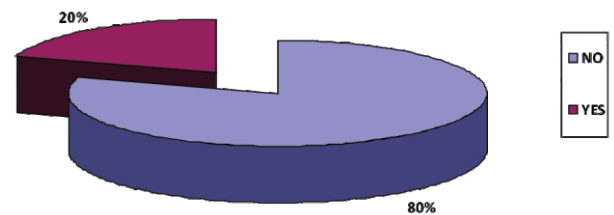
**Fig.1: Pie Chart Showing Onset Of Breast Feeding**

Majority (38%) started breast feeding within half an hour which is a good practice

**Table 4: Showing practice and type of prelacteal feed**

TYPE OF PRELACTEAL FEED	FREQUENCY	PERCENTAGE
GOAT'S MILK	1	2
HONEY	7	14
SUGAR WATER	1	2
NOT PRACTICED	41	82

Majority (82%) of the population studied avoided prelacteal feed which is a good practice and among those who fed, honey was the most common prelacteal feed given.

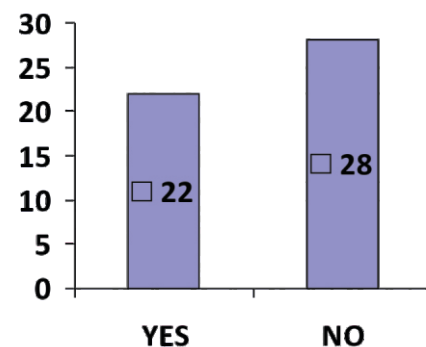
**FIG 2. PIE CHART SHOWING PRACTICE OF PRE-LACTEAL FEEDS**

Majority (80%) of the paramedical staff avoided prelacteal feed which is a good practice and 20% still followed the practice of prelacteal feed.

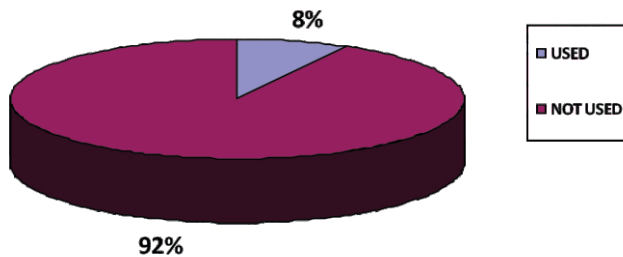
**Table 5: Showing The Duration Of Exclusive Breast Feeding**

DURATION OF EXCLUSIVE BREAST FEED	FREQUENCY	PERCENTAGE
LESS THAN 6 MONTHS	23	46
6 MONTHS	15	30
MORE THAN 6 MONTHS	12	24

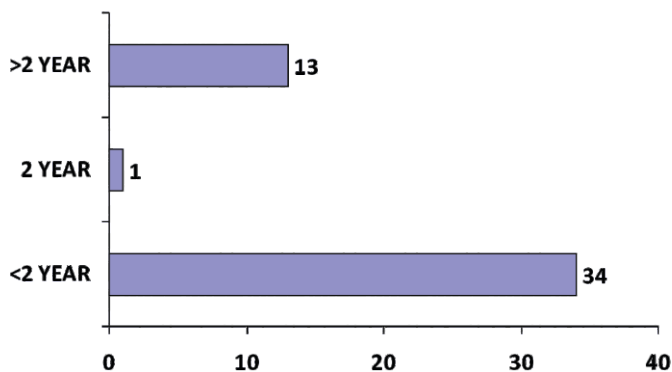
Approximately 1/3rd of the population studied had breast fed exclusively for 6 months which is recommended practice, while majority (46%) started weaning earlier than 6 months due to various reasons.

**Fig 3. Bar Chart Showing Practice Of Bottle Feeding**

56% avoided the practice of bottle feeding which is a good practice but a significant number of paramedical workers bottle fed that reflects lack of knowledge.

**Fig.4: Pie Chart Showing Usage Of Pacifiers**

Majority of the workers avoided using pacifiers which is a good sign.

**Fig.5: Bar Graph Showing The Age Of The Child At Which Breast Feeding Was Stopped**

Majority(68%) of paramedical workers stopped breast feeding at the infants age of less than two year which is inadequate.

#### 4. Discussion

According to study done by Renitha R et al in Puducherry, India among 81 children, in 90.1% breast feeding was initiated within 24 hours and 44.4% within first hour of life. However in the study done by Zodpey et.al. in Nagpur, india, 69.69% children out of 462, had breast feed after 24 hours and none of the children were breast fed within 2 hours of birth.

As for the duration of exclusive breast feeding, in the study by renitha et.al. 58.1% were exclusively breast fed for 6 months, while overall mean duration of exclusive breast feed was 5.3 months in the same study and the total duration of feed was 13 months. in the study of zodpey et.al. the exclusive breast feeding rate was 0.22, while the median duration of breast feeding was 23 months

According to this study 100% of the paramedical workers had breast fed out of which 74% had initiated within 2 hours. however the exclusive breast feeding duration for 6 months was done by only 20% and only 24% had continued it for more than 6 months. the total duration of breast feed was less than 2 years in 78% population while only 2% practiced it for 2 years.

As for prelacteal feed, 80% of the workers avoided prelacteal feed and among the rest 20%, honey was the most common prelacteal feed given.

96% of the population had fed colostrum as they considered it important.

Another good sign is reflected by the fact that 100% of the workers continued breast feeding during infants illness while 96% continued it during mothers illness and 98% fed their children at night i.e. night feeding

Only 20% of the workers started weaning by 6th month while majority 46% started before 6 months duration. goat's and cow's milk was the most common diet given for weaning

58% of the workers practiced bottle feed due to work commitment.

As for the contraception, 64% used it after delivery out of which 58% started within 5 months household work was resumed by 2nd month in 66% of the population and by 6th month in all the population.

96% couldn't breast feed during working hours as there was no facility available at work place.

#### 5. Conclusion

Early initiation of breast feeding, feeding colostrum and exclusive breast feeding are the good practices among the female paramedical workers in this study.

Even among Paramedical workers still there is practice of Pre-lacteal feeding, bottle feeding and use of Pacifiers. This practice need to be totally discontinued.

#### RECOMMENDATIONS

1. Facilities should be set up for breast feeding at work places.
2. Prelacteal feeds should be discouraged.
3. Breast feeding should be started as early as possible after delivery (within 2 hours).
4. Colostrum should not be discarded and its importance should be educated.
5. Exclusive breast feeding should be continued till 6 months
6. Use of bottle feeding and pacifiers should be strictly avoided to prevent infection and inadequate feeding.
7. Breast feeding should be continued for atleast 2 years.

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