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## **Knowledge Regarding Lactation Diet Among Caregivers of Postnatal Mothers in** a View to Develop Information Booklet

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#### **KEYWORDS**

Booklet.

# Caregivers, Diet reported cultural

#### ABSTRACT

Background: The role of primary caregiver is crucial in providing care to primigravida mothers in improving during lactation, Self- health by supporting breastfeeding. According to UNICEF poor nutrition taken by lactating mother is more affecting on infants as well as mothers health. Caregivers are most responsible for provision of postnatal care practices, Information at hospital and at home too as they used their previous experiences during taking care of postnatal mothers. Food taboos during lactation are stronger than the pregnancy period. According to ministry of family and health welfare it is important to fill the gap between knowledge and practices. The aim of this study is to assess the knowledge and self-reported cultural practices regarding diet during lactation among caregivers with a view of developing information booklet. Methodology: Quantitative research approach is been adopted wherein the non-experimental exploratory research design was used for this study. Approval was taken from IEC, BV (DU) CON, Pune. Non-probability purposive sampling technique was used to collect data from caregivers which was validated from the experts and reliability, pilot study was done to conduct the study. The study was conducted on 200 caregivers of primipara postnatal mothers from selected hospitals of Pune city. The collected data was analyzed using descriptive and inferential statistics. Result: Majority (73%) findings of the caregivers have average knowledge regarding diet during lactation and also it showed significant association between age, religion, relationship with postnatal mother and dietary pattern of postnatal mother. Conclusion: To conclude this study on basis of above findings, the aim of this study is achieved. Hence researcher has developed information booklet to update complete knowledge regarding diet during lactation also myths were discussed with the help of evidences.

## 1. Introduction

Women in the postnatal period need to have balanced diet just like they have during pregnancy. Womens who are lactating require additional food and sufficient water to produce milk also they have to add galacto-gogues food as per their doctors advice according to health-line, use of galacto-gogues food during lactating phase helps in increasing milk supply. Caregivers of postnatal mothers are more responsible for provision of postnatal diet at hospital as well as at home after the discharge. Caregivers are the womens specially her mother or mother in law or any family relative it might be her sister, aunt or any other female who assist them in doing their daily activities during this phase. Caregivers use their previous experience during her lactating period. According to UNICEF poor nutrition is taken by lactating mother is more affecting on infants as well as mothers health. Breastfeeding depends on what type of diet caregivers providing to mother during postnatal period. Nutrient comes in the breast milk is totally depend on the diet of mother. Every society/culture has its own traditional practices related to postnatal diet. They follow diet practices according to their traditions and this traditional practices reflects on their postnatal diet and it will also help them to increase milk supply.

## Need of the study

According to WHO postnatal period is the normal physiological process starts soon after the birth of the baby and extent till 6weeks. Referring WHO (2016) recommendation, pregnant and lactating women have to eat four times a day but postnatal mothers only eat two times a day. Ministry of Health and Famliy Welfare found that there was a gap between knowledge and practice where the women take the proper nutrition during pregnancy and lactation period without knowing the reason. Maternal nutrition is related with many biological and sociocultural factors adapted in the living community that affect women's dietary pattern, habits and practices. Food taboos during lactation are stronger and more in number as compared to pregnancy period so these should be assessed too and if they are harming the postnatal mother or her baby caregiver of postnatal mother should be advised against them. A lactating postnatal mother will loose weight about 08 to 09 kgs if she chooses a wellbalanced diet with nutrients, even with the increase intake foods like galactogogues may alter the production of



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breast milk. It is very important to drink plenty of water and caffeine and alcohol should be avoided. Kapil.U, Bhasin.S, states that the health education campaign must be conducted and evacuate incorrect dietary beliefs and re in force correct beliefs.

Aim of the studyTo assess the knowledge and self-reported cultural practices regarding diet during lactation among caregivers of primipara postnatal mothers in a view to develop information booklet.

## 2. Research Methodology

## Research objectives:

- 1. To assess the level of knowledge regarding diet during lactation among caregivers of primi-para postnatal mothers from selected Hospitals of Pune city.
- 2. To determine the association between knowledge with selected demographic variables.
- 3. To develop and validate the information booklet on diet during lactating period.

## Research Approach:

The research approach is adopted for this study is Quantitative Approach.

Research Design:

Non-Experimental exploratory research design

Research Setting:

Selected Hospitals of Pune City.

Population: Caregivers of primipara postnatal mothers from selected Hospitals of Pune city.

Sample size: 200

Sampling Technique:

Non probability purposive sampling technique

Inclusion/Exclusion Criteria:

#### **Inclusion Criteria:**

- 1. Female caregivers who are taking care of primipara postnatal mothers in Hospitals.
- 2. Those who can understand and read Marathi or English or Hindi language.
- 3. Those who are present at the time of data collection.

#### **Exclusion Criteria:**

1. Care givers of the postnatal mothers with the postnatal complications.

#### Description of Tool:

#### Section I: Demographic data

(Consisting of 10 items that is type of delivery of the PNC mother, age, religion, education, additional qualification in nutrition and dietetics, occupation, type of family, relationship with postnatal mother, dietary pattern of postnatal mothers and family income)

Section II: Structured questionnaire on knowledge regarding diet during lactation. (Tool consisting of 20 questions on postnatal diet, nutrients requirements, sources of nutrients, food to be consumed during lactating period, foods to be avoided during lactating period)

Scoring of knowledge questionnaire:

- 1 Mark for correct answer
- 0 mark for incorrect Answer



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• Good Knowledge: 15-20

• Average Knowledge: 7-14

• Poor Knowledge: 0-6

Validity: Content validity was done. Tool was given to 35 experts of different departments in nursing .The Content Validity Index (CVI) was 0.98, which said that tool is valid to collect the data

Ethical Consideration: Approval was taken from Institutional Ethics Committee of BV(DU) CON, Pune Permission was obtained from authored of selected hospitals in Pune city

Reliability: The reliability of assessment tool was calculated by test re-test methodology using Karl Pearson Coefficient formula. Reliability score for the assessment is 0.85 which means tool was reliable.

Pilot Study: A total of 20 samples were selected for the pilot study from caregivers of primipara postnatal mothers. Based on the analysis the study were found to be feasible.

### 3. Result of the study

Section I: Description of caregivers of primipara postnatal mothers based on their personal characteristics in terms of frequency and percentage

N = 200

Sr. No	Demographic variable	Freq	%		
2.1	Type of delivery of PNC mother	L 1			
	Normal delivery	116	58.0%		
	LSCS	83	41.5%		
	Instrumental delivery	1	0.5%		
2.2	Age	•	0.070		
2.2	Below 35 years	48	24.0%		
	36 to 45 years	90	45.0%		
	46 to 55 years	50	25.0%		
	Above 56 years	12	6.0%		
2.3	Religion	12	0.070		
	Hindu	175	87.5%		
	Christian	9	4.5%		
	Muslim	16	8.0%		
2.4	Education	10	6.070		
2.4	Informal education	33	16.5%		
	Primary Secondary	57 80	28.5%		
	~				
2.5	Higher secondary	30	15.0%		
2.5	Additional qualification in nutrition and dietetics		1 0 00/		
	Yes	0	0.0%		
	No	200	100.0%		
2.6	Occupation				
	Employed	40	20.0%		
	Unemployed	2	1.0%		
	Self employed	23	11.5%		
	Homemaker	135	67.5%		
2.7	Marital status				
	Married	197	98.5%		
	Unmarried	3	1.5%		
2.8	Relationship with postnatal mother				
	Mother	92	46.0%		
	Mother-in-law	66	33.0%		
	Any other relative	42	21.0%		
2.9	Dietary pattern of PNC mother				
	Vegetarian	52	26.0%		
	Mixed diet	148	74.0%		
	Any food allergies to PNC mother.				
	No	195	97.5%		
	Yes	5	2.5%		
	Allergies to PNC mother.				
	Paneer	1	0.5%		
	Pea nuts & tur dal	1	0.5%		
	Pea nuts	1	0.5%		
	Tur dal	2	1.0%		
2.10	Monthly Family income				



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Below Rs.10000	44	22.0%
Rs.1100020000	74	37.0%
Rs.21000 - 30000	46	23.0%
Above Rs.30000	36	18.0%

Above table shows demographic characteristics of caregivers and postnatal mothers in terms of frequency and percentage

Section II: Analysis of data related to overall knowledge regarding diet during lactation among caregivers of primipara postnatal mothers from selected Hospitals of Pune city

N = 200

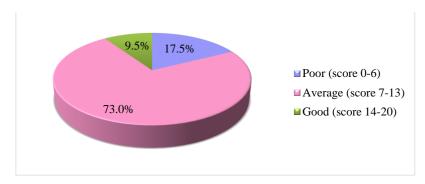


Fig. No. 1: pie chart represent the knowledge regarding diet during lactation among caregivers

Fig. No. 1 depicted that 17.5% of the caregivers of primipara postnatal mothers had poor knowledge (score 0-6), 73% of them had average knowledge (score 7-13) and 9.5% of them had good knowledge (score 13-20) regarding diet during lactation. Average knowledge score was 8.28 with standard deviation 2.88

#### Section III

Item wise analysis of knowledge regarding diet during lactation among caregivers of primipara postnatal mothers from selected Hospitals of Pune city.

Table 3: Frequency and percentage of Knowledge item analysis

N = 200

Sr. No	Knowledge item	Freq	%
3.1	Lactation diet	120	60%
3.2	Purpose of taking healthy diet	155	77.5%
3.3	Importance of lactation diet	100	50%
3.4	Lactation food helps	101	50.5%
3.5	PNC Mothers need to take balanced diet	87	43.5%
3.6	Mother take dairy products daily during lactation	128	64%
3.7	Type of diet postnatal mother should take	78	39%
3.8	Food to be consumed during lactation period	155	77.5%
3.9	Food to be avoided	84	42%
3.10	Calcium rich diet during lactation is required for	65	32.5%
3.11	High fibre diet is important during lactation	102	51%
3.12	Essential nutrients should be included in lactating die	124	62%
3.13	Sources from which a mother get required Kcal	81	40.5%
3.14	Foods are rich in sources of protein	47	23.5%
3.15	Foods sources rich in iron helps in	117	58.5%
3.16	Rich sources of vitamin	51	25.5%
3.17	Sources of good fibre diet which required during lactation	99	49.5%
3.18	Foods rich in minerals	77	38.5%
3.19	Number of meals taken during lactation period	75	37.5%
3.20	Amount of fluid should be taken by postnatal mother per day	81	40.5%

Table no 3: shows correct responses by the caregivers in terms of frequency and percentage

60% of them understood lactation diet. 77.5% of them knew the purpose of taking healthy diet during the lactation period. 50% of them knew the Importance of lactation diet. 50.5% of them knew what the lactation diet helps in. 43.5% of them knew why PNC Mothers need to take balanced diet during lactation. 64% of them knew why 5 should a mother take dairy products daily during lactation. 39% of them knew type of diet postnatal mother should take during lactation period. 77.5% of them knew the food to be consumed during lactation period. 42%



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of them knew the food to be avoided during lactation period. 32.5% of them knew why calcium rich diet during lactation is required. 57% of them knew why high fibre diet is important during lactation. 62% of them knew the essential nutrients should be included in lactating diet. 40.5% of them knew sources from which a mother gets required kcal. 23.5% of them knew foods rich in sources of protein. 58.5% of them knew how foods sources rich in iron help. 25.5% of them knew rich sources of vitamin. 49.5% of them knew sources of good fibre diet which is required during lactation. 38.5% of them knew foods rich in minerals. 37.5% of them knew number of meals taken during lactation period. 40.5% of them knew amount of fluid to be taken by postnatal mother per day.

Section IV: Analysis of data related to the association between knowledge and selected demographic variables N=200

Sr.No	Demographic variable		Knowledge			Association	
			Poor	Average	Good	p-value	
5.1	Type of delivery of	Normal delivery	18	87	11		No Association
	PNC mother	LSCS	17	58	8	0.769	
		Instrumental delivery	0	1	0		
5.2	Age	Below 35 years	12	35	1		Significant
		36 to 45 years	9	72	9	0.006	Association
		46 to 55 years	11	34	5	0.006	
		Above 56 years	3	5	4		
5.3	Religion	Hindu	26	135	14		Significant
	[	Christian	3	2	4	0.001	Association
		Muslim	6	9	1		
5.4	Education	Informal education	9	17	7		No Association
		Primary	10	45	2	0.054	
		Secondary	13	59	8	0.054	
		Higher secondary	3	25	2		
5.5	Occupation	Employed	5	31	4	0.407	No Association
	1	Unemployed	0	2	0		
		Self employed	7	16	0	0.407	
		Homemaker	23	97	15		
5.6	Marital status	Married	34	144	19	0.612	No Association
		Unmarried	1	2	0	0.613	
5.7	Relationship with	Mother	11	73	8		Significant
	postnatal mother	Mother-in-law	21	39	6	0.006	Association
		Any other relative	3	34	5	1	
5.8	Dietary pattern of	Vegetarian	15	36	1	0.000	Significant
	PNC mother	Mixed diet	20	110	18	0.008	Association
5.9	Any food allergies	No	34	143	18		No Association
	to PNC mother.	Yes				0.410	
						0.410	
			1	3	1		
5.10	Monthly Family	Below Rs.10000	8	30	6		No Association
	income	Rs.1100020000	17	49	8	0.262	
		Rs.21000 - 30000	7	35	4	0.202	
		Above Rs.30000	3	32	1		

Table No. 5: Shows the demographic variables age, religion, relationship with postnatal mother and dietary pattern of PNC mother were found to have significant association with the knowledge among the caregivers of primipara postnatal mothers.

Section VI: Analysis of validation of Information Booklet

Experts Validation		
S-CVI	0.784	

Above table shows S-CVI of information bookle

#### 4. Discussion:

This study results that 17.5% of the caregivers of primipara postnatal mothers had poor knowledge (score 0-6), 73% of them had average knowledge (score 7-13) and 9.5% of them had good knowledge (score 13-20) regarding diet during lactation. Average knowledge score was 8.28 with standard deviation 2.88. Previously study conducted in South Africa states that primary care givers shown general knowledge regarding diet during early postnatal period.

Result of this present study shows that demographic variables i.e., age, religion, relationship with postnatal



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mother and dietary pattern of PNC mother were found to have significant association with the knowledge among the caregivers of primipara postnatal mothers.

#### 5. Conclusion:

The findings of the study provides that majority (73%) of the caregivers have average knowledge regarding diet during lactation and 17.5% of the caregivers had poor knowledge, as a health care provider we should focus on lacking aspects like sources of nutrients (calcium, protein, vitamins and minerals), number of meals to be taken by the lactating mother. Hence considering above findings of the study, researcher has developed information booklet to update complete knowledge regarding diet during lactation and also some myths of the society were illustrated with the help of scientific facts.

Conflict of interest: The author certify that there us no any involvement in any other organization or entity with any financial or non financial interest in the subject of matter or material discussed in this study.

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