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Original Research Article

Barriers in utilization of fortified take home ration through integrated child development service in urban heath training centre field practice area of Bhavnagar, Gujarat

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ABSTRACT

Background: The integrated child development services (ICDS) in the State of Gujarat, India, freely provides a take home ration to pregnant mother, adolescent, lactating mother and children. Objective was to explore the perception of program functionaries and beneficiaries regarding barrier in utilization of take-home ration infield practice area of urban health training center of Bhavnagar.
Methods: We have conducted eighteen in depth interviews of program functionaries and beneficiaries residing in urban health primary centre field practice area regarding barrier in utilization of take-home ration.
Results: Wastage, bad taste, sweetness, futile and unawareness were the main reason for non-utilization of take-home ration.
Conclusions: There is need for behaviour change communication in the community regarding the correct and optimum use of take-home ration.

Keywords: ICDS, Fortified take home ration, THR

INTRODUCTION

The Indian government implemented a variety of policies in the 1970s with the objective of improving public health and reducing the prevalence of malnutrition. The National Policy for Children, which was adopted in 1974 to improve children's growth and health as well as their access to food, was one of these initiatives.[1] A program known as the integrated child development services (ICDS) was introduced in 1975 as a result of this approach.[2]

India's integrated child development services (ICDS) was established in 33 projects in 1975 and is spread over 22 states; 67 additional projects were begun in 1977, and over the next 2 years; 100 additional projects were added.[3] Preliminary results from the fifth National Family Health Survey (NFHS-5) indicate that some dimensions of nutrition have worsened recently: 13 of 22 states in Rajasthan report an increase in childhood stunting in the last five years. Under India's National Nutrition Mission (NNM), also called POSHAN Abhiyaan, the country has set targets to reduce stunting, undernutrition, anemia, and low birth weight in children by 2022.[4]

The purpose of ICDS is to provide a number of basic nutrition, health, and early child development services to children from birth to 6 years of age and to pregnant and lactating mothers.[4,5] Take home rations (THR) programme provides fortified rations for home use for children aged between 6 and 36 months, and pregnant and lactating women.[6] Main aims of THR to fill in the nutrition gap among infants and young children by way of complementary feeding.[6] The THR products are distributed out during crucial physiologic times when dietary needs are high, and if they have the proper

nutritional give, they can be very helpful in reducing malnutrition and enhancing pregnancy outcomes.[6]

ICDS is sponsored 100% by the status and uniquely relies on the honorary Anganwadi worker (AWW), who is a woman, recruited and chosen by the community, aged 21-45 years and middle school educated. The AWW was responsibility for 2000 households or 1000 persons in rural areas and 700 persons in tribal areas. The AWW is crucial to the functioning of the program and receives an honorarium of Rs. 225-275/month for implementing the ICDs program; AWWs have helpers who are paid Rs. 110/month.[3]

According to India's Ministry of Women and Child Development, it is estimated that more than 1.3 million AWCs are operating in India, making ICDS one of the largest delivery platforms in the country.[7] The ICDS program has been successful in many ways, but still faces a number of implementation and operational challenges.[8]

It is found that although ICDS program appear to be well design and well placed to discourse multidimension cause of malnutrition in India, there are incongruity between program design and implementation that prevent it from reaching its potential.[8] This study may also help to highlight the need to address the barriers and take necessary measures for improving utilization rates. Utilization determines effectiveness of any intervention.[9]

The goals of the project were to increase the production capacity of take-home ration, upgrade the quality assurance and control systems, and improve the nutritional content and packaging of take-home ration.

The main objective of the research was to find out barrier in utilization of take-home ration infield practice area of urban health training canter of Bhavnagar.

METHODS

Research team

The first author was the principal investigator of the study. Author was aware about qualitative research methods. All the in-depth interviews were conducted by the first author. The first author is Assistant Professor in Community Medicine department, Government Medical College Bhavnagar. She is the in charge of Urban Primary Health Centre. Before conducting this research author discussed the purpose of conducting this research and the potential benefits of its findings in the future with program functionaries. The discussion gave a clue to the potential study participants who were likely to be more vocal.

Study design

In-depth interviews were conducted among program functionaries- helper and Anganwadi worker, beneficiaries of ICDS (adolescent girl, pregnant and lactating mother, child) residing in field practice are of Urban health training center to explore their perceptions on barriers in utilization of take-home ration.

Study setting and study population

The study was conducted among 16 beneficiaries and 9 program functionaries (Anganwadi worker and helper) during November 2022- January 2023 in Vadava UHTC field practice area, which is affiliated to community medicine department, Government Medical College, Bhavnagar. The Medical College is functional since the year 1995 and tertiary care hospital is attached with it. In our field practice area of urban health training center there were total 21 Anganwadis. Each Anganwadi intended to cover 200 household. Total population of field practice area was thirty thousand. Those who were willing to participate in the study were included. Study duration was 3 months.

Data collection

The data were collected between November 2022-January 2023 by the investigators themselves. We conducted in-depth interviews of 18 beneficiaries and program functionaries The IDI took nearly 15 minutes to complete. All the IDIs were conducted in the local language (Gujarati) and were audio-recorded with permission.

Ethical considerations

The approval to conduct this study was be taken from Ethics Committee of Government Medical College, Bhavnagar. Confidentiality was maintained. Written Informed Consent was collected from all study participants. Consent was taken from all study participants regarding recording.

Variables

Outcome

Perception of Anganwadi worker, helper and beneficiaries regarding barriers in utilization of take home ration.

Exposure

Anganwadi worker, helper and beneficiaries.

Data analysis

The first stage in this analysis was data preparation, which involved segmenting interview transcripts by learning goals, which served to better organize the dense narratives of information. Then, we paraphrased to capture the respondent's meaning in a clear, concise way, without omitting any information.

RESULTS

For exploring the perspectives of the barriers in utilization of take-home ration we enrolled 16 beneficiaries and 9 program functionaries. All residing in Vadava field practice area of UHTC Bhavnagar. Among the service providers, four were the helper and 4 was the Anganwadi worker.

Table 1: Socio demographic profile of study participants.

Variables	Number (%) or mean (SD)
Beneficiaries	16 (64)
Program functionaries	9 (36)
Age	25 (±5)
Religion	
Hindu	20 (80)
Muslim	5 (20)
Caste	
General	18 (72)
Other backward class	6 (24)
Schedule caste/schedule tribes	1 (4)
Socio economic class (Modified BG Prasad)	
Class II	8 (32)
Class III	13 (52)
Class IV	4 (16)

Table 2: Perception of beneficiaries and program functionaries regarding barriers in utilization of take home ration.

Category	Code
	Wastage
	Feed the cattle
	Sweetness
	Bad taste
	Sell
	Sell it in exchange with buttermilk
	Crushed
	Futile
	Unaware
Suggestion	Change taste
	Awareness
	Preparedness of take-home ration
	Come regularly

Wastage

Some of the anganwadi worker and helper perceived that beneficiaries waste the take home ration and not utilized it.

"*We are distributing matru shakti, purnashakti and Bal shakti properly. In our Anganwadi we are celebrating every Tuesday, suposhan divas, anna prasan divas, baltula divas. On every Tuesday we are distributing take home ration. But they are not using it and wasted take home ration*" (Anganwadi worker and helper infield practice area).

Feed the cattle

Some of the Anganwadi worker and helper perceived that beneficiary not utilized take home ration. They feed the cattle.

"*They though protein in the take home ration is high and if protein is fed to cattle, it will give good milk. So, they can earn well*" (Anganwadi worker and helper infield practice area).

Sweetness

Some of the beneficiaries perceived that taste is one of the reasons for non-utilization of take-home ration.

"*We make something out of that take home ration, that is very sweet and we don't like sweet food*" (beneficiaries in field practice area).

Sell it in exchange with butter milk.

Some of the Anganwadi worker perceive that we are distributing take home ration properly and on time but they not utilizing it.

"*We are distributing take-home ration to the beneficiaries but they sell it to other in exchange with butter milk and so they can earn it well*" (Anganwadi worker in Vadava).

Crushed

Beneficiaries perceive that while using four of take-home ration we can't using it properly.

"*If we try to make something from flout it crushed and we can't use it properly*" (beneficiary in Vadava field practice area).

Futile and unaware

Unawareness is also one of the concerns for non-utilization of take-home ration. Some beneficiaries perceive that take home ration is not worth using. They have no idea what to make from take home ration and how to make it.

"*We don't know what to make from take home ration and how to make. There is no usage of take-home ration*" (Beneficiaries residing in field practice area).

Bad taste

Bad taste is one of the barriers of utilization of take-home ration. Some beneficiaries felt that the taste was not good. Taste of food different from their daily food.

"*The food we make from it is not good. We feel different taste from our routine food*" (beneficiaries residing in field practice area).

"*We don't like food made from take home ration*" (beneficiaries residing in field practice area)

Awareness

Service provider and some beneficiaries believe that awareness regarding take home ration play an important role in utilization of take-home ration. It is because of many beneficiaries don't know which food to make and how to make. They don't know about what the nutritive benefit are of using take home ration. We can increase utilization of take-home ration by giving awareness.

"*We can increase utilization by giving message regarding what are the nutrition benefits and how to use it*" (Anganwadi worker in field practice area).

DISCUSSION

This qualitative research explored the perception of program functionaries and beneficiaries regarding the barriers in utilization of take-home ration.

Our study retorted that wastage, feed the cattle, sweetness, bad taste, sell, sell in exchange with buttermilk, crushed, futile, unaware were the main reason for non-utilization of take-home ration. While study conducted in Telangana reported that the irregular supply of the product to the beneficiaries and the intra-household sharing of the take home ration were the barriers in utilization of take home ration.[10] While other coverage evaluation survey reported that high coverage of iodized salt.[11] While study conducted in Madhya Pradesh found that after intervention coverage of supplementary nutrition program increased two to three folds in all categories of the target population.[12] Another study reported that after the intervention of ISDS coverage and nutrition status were improved.[13] Study conducted in rural block of Sanwer on utilization of ICDS scheme reported that underutilization of ICDS scheme and possible reason could be lack of aptitude, lack of knowledge and limited consecration of health and ICDS workers.[14] Study conducted in Chiri reported that 62% of women participate in supplementary nutrition program for more than 20 days per month and reason for non-utilization are illiteracy and insufficient knowledge.[15] Study conducted in Telangana found that 87% beneficiaries utilized supplementary nutrition and not liking taste and quality of food most common reason of non-utilization of services.[16]

Present research finds that taste is the barriers of non-utilization of take-home ration. Beneficiaries felt that they did not like taste of take-home ration. They feel that taste is very sweet. While counter result found by study conducted in Telangana.[10] They found that taste is one of the drivers of consumption of take-home ration. Another Maharashtra report found that taste is one of the barriers for non-utilization.[17]

Maharashtra report observed that there are several problems associated with the non-utilization of take-home ration.[17] One such issue was the presence of a sizeable migrant population. This has resulted in wide disparities in the consumption of THR and coupled with irregular delivery schedules of the THR delivery agency, leads to deficit stocks at the Anganwadi centers making storage difficult and the distribution mechanism somewhat irregular and inefficient. This has resulted, albeit on very seldom occasions, in skipping a part of nutrient and quantity testing process after-delivery to the Anganwadi centers. Furthermore, even if THR was taken home, the intended beneficiary was not able to consume the ration and reap the benefits, as he/she would have to share it with other family members.[17] Report found that ration was not reaching a certain section of the society (adolescent girls aged 15-18 years) in some of the districts of Maharashtra maybe because the funding for the same was by another Government scheme (SABLA).[17] Another study conducted in Maharashtra reported that lack of community participation, lack of knowledge regarding preparation, history of vomiting and diarrhea, lack of diversity and THR not being child's preference are the factor leading to underutilization.[9] Study in Jharkhand found that more than half of women reported that THR lasted them less than 3 days.

This study was qualitative study hence we cannot generalize our result.

CONCLUSION

Beneficences reported that bad taste of take-home ration. While program functionaries perceive wastage of ration. There is need for behaviour change communication in the community regarding the correct and optimum use of take-home ration. Aim should not be just implementation of program but should also attention toward uptake and utilization. Community should be involved in deciding the method of supplementary feeding.

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