

## Take Home Rations (THR) and cash transfers for maternal and child nutrition in India

A synthesis of evidence and recommendations for policy



### In brief

- In India, 38.4 percent of children under the age of five are stunted, i.e., have impaired growth and development, rising to 41.2 percent in rural areas.
- India ranks 134th out of 151 countries that measure stunting – lower than Bangladesh, Nepal, and most Sub-Saharan African countries.
- To address challenges with child and maternal health, the Government of India has a long history of interventions focused on maternal and child health.
- One major government programme focuses on providing women and children food rations, while another administers cash transfers to pregnant and lactating mothers.
- This brief, summarising an IGC-commissioned synthesis of existing evidence, analyses both the ‘Take Home Rations (THR)’ and cash transfer approaches and provides a set of recommended policy actions.

## Introduction

According to the National Family Health Survey (NFHS-4) in 2015-16, 38.4 percent of children in India under the age of five are stunted, i.e., have impaired growth and development. This rises to 41.2 percent in rural areas, ranking India 134th out of 151 countries that measure stunting – lower than Bangladesh, Nepal, and most Sub-Saharan African countries. Further, 35.8 percent of all children remain underweight (with India ranked 9th lowest), and 21 percent are wasted, i.e., have low weight for height (with India ranked 3rd lowest).

Devoting public resources to reducing micronutrient deficiencies in children is essential for improved health, and is associated with large economic returns in the long-run through better productivity, lower health costs, and intergenerational transmission of these benefits. It is also well understood that early interventions, i.e., those focused on pregnancy and the first 1,000 days of life, are far more effective than later interventions.

The Government of India has a long history of interventions focused on maternal and child health. A key component of the former has been the provision of food rations under the Integrated Child Development Services (ICDS) scheme's Supplementary Nutrition Program (SNP), established in 1975. Currently, as part of the SNP, pregnant women and mothers of children aged 6 months to 3 years receive monthly Take Home Rations (THR), and children aged 3-6 years receive a daily hot meal at the anganwadi (or crèche). Apart from this nationwide in-kind support, the central government also administers cash transfer programmes for pregnant women and lactating mothers. The Janani Suraksha Yojana (JSY) programme delivers cash conditional on an institutional birth.

While the specific goals and administration of each programme may differ, they all aim to ensure maternal and child health and nutrition. There have been extensive debates on the effect of health and nutrition-based, in-kind transfers versus cash transfers in India, and each comes with their own set of successes and challenges. In 2019, the International Growth Centre (IGC) commissioned a synthesis of existing evidence on both types of programmes, with a particular focus on ICDS/THR and JSY, along with a set of recommended policy actions. There is almost no evidence from studies that compare THR directly to JSY, so we rely on studies that look at each programme separately. Both programmes are distinctively pro-poor and have wide outreach in India.

## Cash transfers through Janani Suraksha Yojana (JSY)

By many accounts, JSY has an impressive reach and is pro-poor in most states in India, but its implementation has been far from encouraging, as has been the case with other maternity entitlements. Evidence on implementation shows:

- **Delays in payments:** Many people face significant delays in receiving cash. Estimates suggest that for those who receive cash within a month, the mean time is 12 days after birth. However, around 30 percent of those who identified themselves as beneficiaries did not receive it even a month following delivery.
- **Inadequate financial coverage:** Even when the cash transfer amount accrues fully, studies suggest it is inadequate to cover the intended costs. The mean expense incurred on a delivery of a baby in a public institutional facility is Rs.3,197. In contrast, the JSY only provides Rs.1,400 for rural institutional deliveries (Rs.500 for home deliveries for those below the poverty line) and Rs.1,000 for urban areas. Our estimates suggest that for those who receive the JSY, the transfer covers the out-of-pocket expenses associated with a delivery (institutional or not) for only 39 percent of the beneficiaries.
- **Evidence of health impact is mixed:** JSY's impacts are also widely debated. There is agreement that while uptake of institutional delivery for women increased, particularly among poor and marginalised women, along with immunisation rates and breastfeeding, its impacts on stillbirths and deaths in the first week of life, perinatal mortality (PMR) and deaths within the first 28 days, and neonatal mortality (NMR) are less clear and more controversial.
- **Money is usually spent on beneficial goods:** Existing evidence from India suggests that women are able to direct these payments to health expenditures, savings, and food for themselves and their child. Around 58 percent of respondents in one survey mentioned that they used the money for medical expense and 44 percent mentioned food items. Many women were also able to take out loans during delivery because they are sure of reimbursement by the scheme.
- **Similar programmes show mixed impact as well:** As for other similar cash transfer programmes run by the states, we find no impacts on institutional delivery rates or maternal health outcomes in Gujarat (Chiranjeevi Yojana) and Karnataka (Thayi Bhagya Yojana). A recent study on the Mamta scheme in Odisha that is targeted at pregnant and lactating women found that conditional cash transfers can increase the likelihood of receiving ante-natal services and folic acid tablets, and decrease household food security. The limited effectiveness of these cash transfers on child measurement is believed to be on account of significant

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barriers to access these conditionalities and the poor quality of services. There is also some evidence on the barriers faced by women in accessing cash due to restrictive social norms – for example, those that prevent them from traveling to the bank on their own.

## **In-kind transfers through Take Home Rations (THR)**

Like the JSY, the THR programme enjoys widespread coverage and is also pro-poor, but faces its own unique set of challenges, mostly to do with implementation and quality. Evidence on implementation reveals:

- **Some evidence of positive impact:** Studies show THR is associated with small but statistically significant gains in height for children, and increases average Height-for-Age (HAZ) scores by approximately 6 percent with bigger impacts in poorer areas. Another study finds that girls 0-2 years old receiving supplementary feeding intensely are at least 1 cm taller than those not receiving it in rural India. The estimates are similar for boys aged 0-2 but less robust.
- **THR is routinely shared with other family members:** Evidence from several Indian states suggest sharing is common. However, most women consume at least some of the THR meant for them when they receive it during pregnancy and lactation. In contrast, children consume it less than women, with Uttar Pradesh having the lowest child consumption rate at 25-40 percent of the allotted ration. The THR is commonly shared with other family members in Odisha, MP, and Bihar. Another study in Bangalore suggests that although THR was distributed to 95 percent of the beneficiaries, only 26 percent of it was consumed by the beneficiary. The rest was typically shared by the whole family.

Interestingly, in response to the problem of THR-sharing, several states have moved towards including spot feeding and “wet” meals for pregnant and lactating mothers, for example Telengana and Andhra Pradesh. These meals include eggs, milk, and green leafy vegetables, among others protein and calcium intakes for pregnant and lactating women. They involve visiting the anganwaadi centre to consume the meal, and are often accompanied by various behavioural change and educational interventions at the centre.

- **Low quality:** Another issue with THR is that the fortified pre-mixes often fall short of international recommendations and also fall short of norms prescribed by the Indian Council of Medical Research. There is wide variation in quality across states. Historically, maintaining quality has been a key challenge, and there have been scams where unscrupulous private contractors supplied poor quality THR. Several surveys also record beneficiary dissatisfaction with THR quality. Some studies show large percentages of beneficiaries not consuming any of the food received or not consuming the entire food supplement citing poor quality. In other states, however, such issues do not seem to arise, for example, with the Balamrutham version in AP/Telangana.

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## Recommendations for policy

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In light of the mixed evidence on both approaches and well documented failures with regards to implementation and quality, choosing one system to replace another is not advisable. Much depends on context such as quality of alternative choices, market structure, and the strength and integrity of institutions – all of which vary considerably across states. Recent innovations in technology through Direct Benefit Transfers have shown some promise, but studies still show that overall, they are fraught with problems as well.

- **Aadhaar may not be a silver bullet:** Amongst efforts to plug leakages in existing cash and in-kind transfer schemes in India, the use of *aadhaar*, India's unique biometric identity project, is widely debated. In the Indian context, the emergence of new technologies, with the stated objective of reducing leakages and corruption, have had controversial impact. Although some studies claim that smart cards and biometric-based payments reduce leakages and ghost beneficiaries, they find that gains in these schemes in terms of speedier payments are perhaps due to other institutional innovations. In general, *aadhaar*-enabled payments systems (AEPS) have caused considerable disruption in social protection programmes. For example, a study based on proprietary data from a payments enabler suggests that 34 percent of the transactions fail. Seventeen percent of failures are a result of biometric mismatch, 3.7 percent are due to other technical reasons (failures such as bank system failures, internet connectivity issues), and the remaining 13.3 percent are because of non-technical reasons. These problems could be transitional issues and might improve with time, but it is too early to tell if this is indeed the case.
- **Assessing costs between the programmes is tricky:** A key driver of debates on cash versus THR has been with respect to costs and many arguments speak in terms of savings that can be achieved with switching from THR to cash. For a programme that aims to reduce maternal and child nutrition, however, the key concerns should be the cost effectiveness of a programme and the relative cost effectiveness of cash and THR. Cost effectiveness relates to the cost of delivery per unit of benefit, which may be significantly high for THR, enough to justify such expenditure. One study estimates a benefit-cost ratio for the ICDS and suggests it offers a 3.75-fold return. Comparable figures from cash schemes are not available. A cautionary note is that these cost-benefit estimates are tricky and require careful assessment.

The other aspect is the relative cost effectiveness – can cash transfers deliver the same benefit at lower cost? There is almost universal agreement that the costs of delivering cash are significantly lower than delivering in-kind transfers. At the same time, few studies in the Indian context have been able to estimate this with any rigour.

- **The role of women in the household is a key factor to consider:** A significant barrier with cash transfers in lieu of THR pertains to the relatively low agentive capacity of young mothers, the intended recipients of the transfer. Their limited capacity to access banks, freedom to visit the market, and their restricted role in intra-household decision-making are likely significant barriers, especially in contexts where such programmes are most needed. Labelling, earmarking money to women, and counselling can strengthen these impacts to some extent but cannot be expected to overturn deeply entrenched norms. Young women, the intended beneficiary of cash transfers, face particularly severe constraints in their ability to address their own needs during pregnancy and lactation.
- **Combining cash and in-kind transfers is an attractive option that warrants further study:** It is important to recognise that cash and in-kind transfers often serve complementary needs, especially in the context of maternal and infant nutrition. A pregnant/nursing woman needs, on the one hand, appropriate nutritious food, supplements, and medicines that might not be available at public health centres, but on the other, might also be in need of cash to travel to the health centre. Too often women are also unable to prioritise their own health and nutrition in the context of restrictive social norms. Without an entire array of interventions – for better nutrition, health care, institutional deliveries, health education, breastfeeding practices, etc. – it is unlikely that significant strides are made in terms of nutritional outcomes of mothers and children.

THR and/or “wet feeding” would be a necessary part of this for a host of reasons. Not only does it directly provide appropriate food, including those that might be fortified, to address specific needs, it is also an essential way to attract them to “health and nutrition days”, in ways that might be far more effective than cash incentives. THR and/or wet feeding offer opportunities to change norms and resilient beliefs around what foods are appropriate during pregnancy and nursing. It also provides the foundation for other interventions like the distribution of iron and folic acid tablets, and other activities like weighing and vaccination.

In summary, this paper questions whether we have enough confidence about the superiority of cash transfers to recommend them instead of THR. More research is certainly required and welcome on the impacts, interplay, and complementarity of cash and in-kind transfers on maternal and child nutrition. It is imperative that policy changes are based on stronger evidence than currently available.



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