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The School Feeding Programme in India



M S SWAMINATHAN RESEARCH FOUNDATION, INDIA



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Chapter 1: The School Feeding Programme in India

V B Athreya¹

Introduction

Across the world, school feeding programmes (SFP) have been seen both as a social safety net for vulnerable sections of the population and as an educational intervention aimed at ensuring that children go to school and that their learning is improved by elimination of hunger in the class room. The role of SFPs as social safety nets may have been enhanced on the context of the recent and persisting global food, fuel and financial crises and high rates of food inflation in most parts of the world. In this context, the experience of a large and populous developing country like India with respect to SFPs becomes relevant for other countries seeking to initiate or to strengthen and expand such programmes. This paper provides a descriptive summary of India's experience with SFPs, focussing mainly on the period since 1995, the year that saw the launch of a national initiative in this regard.

Evolution of SFPs in India

Two key problems relating to children in India are the large numbers of children out of school and the considerable extent of under-nourishment among children. In 2004, around 15 per cent of children in the age group of 6-14 years were out of school (Right to Food Campaign, 2006). According to the third national family health survey (NFHS 3, 2007) which has 2005-06 as its reference period, 46 per cent of India's children under 3 years of age are underweight. The corresponding figure is 30 per cent in Sub-Saharan Africa while China records 8 per cent and Pakistan 37 per cent (Lal, 2007). India was home to 57 million - or more than a third - of the world's 146 million undernourished children (NFHS 3, 2007). Nutritional anaemia is also widespread among children. The figures imply serious consequences for human resource development and productive potential of the nation. More importantly, they also imply denial of basic human rights to children, such as access to food and education. The policy challenge, in this context, is to address both the educational needs and the nutritional needs of the children in the school-going age group.

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Successive governments at the Centre and in the States have taken various measures to enhance enrolment and retention of children in schools with some degree of success. One of the strategies adopted to improve enrolment and retention of children in schools has been the provision of mid-day meals for children in schools. While there is a long history of such initiatives, among the most well-known one is the state-wide noon meal scheme for school children initiated by the state of Tamil Nadu way back in 1982. By the mid-1980s, the governments of Tamil Nadu, Kerala and Gujarat had put in place a universal 'noon meal' scheme providing hot cooked food for children in primary schools. By 1990-91, the number of States with such provision, either universally or on a large scale, was twelve. Five other States were also implementing similar programmes, with either international funding or a combination of own resources and international funding. It was in such a situation that the Government of India launched the National Programme of Nutritional Support to Primary Education (NPNSPE, popularly known as Mid-Day Meals Scheme or MDMS) on August 15, 1995.

The objective of the NPNSPE was stated as follows:

“The programme is intended to give a boost to universalisation of primary education, by increasing enrolment, retention and attendance and simultaneously impacting on nutrition of students in primary classes” (GoI, 1995).

The scheme sought to integrate the noon meal schemes being already implemented by some states and to cover all the states. It involved central support to the States by way of free supply of 100 grams of food grain per child per day and subsidy for transport of grain from the nearest distribution point of the Food Corporation of India. The State governments were required to meet the costs of infrastructure and the cooking cost. To begin with, the scheme was introduced in the 2,368 development blocks. Local bodies were declared to be the implementing agencies, with supervision from the district and state levels of the government's administrative machinery.

Initially, the state governments were advised to derive finance from then existing central government funded poverty alleviation schemes for providing necessary infrastructure and meeting their share of per child infrastructure costs. But, from April 1999 onwards, responsibility for raising their share of funding was transferred to States/UTs. Some states facing financial

difficulties continued with the scheme of distributing foodgrains at 3 kg/student /month as an interim measure. However, in 2003, Planning Commission of India asked the states to earmark a minimum of 15 per cent of additional central assistance (ACA) under a central government scheme for the financial requirements of converting grains into cooked meals².

Universalising the scheme to all States proved difficult since many states were not in a position to meet the costs of cooking and to build the necessary infrastructure. Some States did not implement the scheme at all. Some states (like Madhya Pradesh) provided uncooked grains at the rate of 3 kg per month (100 grams per day) per child as take-home rations. It took a long time and a change of government for the central government to respond to the fiscal constraints the states faced in providing children a hot cooked meal at school. The scheme was modified only in 2004 to address this issue. It was modified further in 2006, improving its content and providing greater support to states than earlier. However, long before the central government took these steps, an important judgment of the highest court of the country, the Supreme Court, delivered in November 2001 as interim orders in a public interest litigation filed in April 2001 by the Peoples Union for Civil Liberties (PUCL), went a long way towards converting the MDMS from a mere scheme into a legal entitlement of school children.

The Supreme Court Orders

In 2001, a public interest petition was filed by a civil society organization in the Supreme Court, the highest court in India, against distributing uncooked grains to school children and against states not implementing MDMS³. In an interim order dated 28 November 2001, the Supreme Court ordered that cooked meals had to be given to children and asked all states to implement the programme of MDMS.

Specifically, the Supreme Court directed the state governments and Union Territories “to implement the Mid-Day Meal Scheme by providing every child in every Government and Government assisted primary school with a prepared mid-day meal with a minimum content of

² The scheme was known as *the Pradhan Mantri Gramodaya Yojana* (PMGY)

³ WP (c) 196/2001 People’s Union for Civil Liberties (PUCL) Vs. Union of India and others

300 calories and 8 – 12 grams of protein each day of school for a minimum of 200 days”⁴. In subsequent orders, the Supreme Court further strengthened the right of children to a mid-day meal at school. In its orders of 20 April 2004, the Court observed, *inter alia*, that:

- ‘The conversion costs for a cooked meal, under no circumstances, shall be recovered from the children or their parents’.
- ‘The Central Government... shall also allocate funds to meet the conversion costs of food-grains into cooked mid-day meals’.
- ‘In drought affected areas, mid-day meals shall be supplied even during summer vacations’.
- ‘In appointment of cooks and helpers, preference shall be given to Scheduled Castes and Scheduled Tribes’.
- ‘The Central Government shall make provisions for construction of kitchen sheds’.
- ‘Attempts shall be made for better infrastructure, improved facilities (safe drinking water etc.), closer monitoring (regular inspection etc.) and other quality safeguards as also the improvement of the contents of the meal so as to provide nutritious meal to the children of the primary schools’.

One of the key commitments of the common minimum programme (CMP), of the United Progressive Alliance (UPA) which formed the government at the Centre in late May 2004, hardly four weeks after the Court’s orders quoted above, was the following:

A national cooked nutritious mid-day meal scheme, funded mainly by the central government, will be introduced in primary and secondary schools. An appropriate mechanism for quality checks will also be set up.

Revisions in Guidelines

Subsequently, in line with the Supreme Court orders and the CMP commitments, the central government released new guidelines for NP-NSPE in 2004. The guidelines observed that:

⁴ The primary school in India refers to a school offering instruction for students of classes 1 to 5.

“A large number of States continued to face financial difficulties in meeting cooking cost and providing cooked meal to their students, and accordingly distributed only foodgrains @ 3kg per student per month, as was envisaged in para 12 of the (NP-NSPE) Guidelines, as an interim measure. To ameliorate this situation, Planning Commission asked State Governments in December, 2003, to earmark a minimum 15 per cent of Additional Central Assistance (ACA) under the Pradhan Mantri Gramodaya Yojana (PMGY) from the financial year 2004 – 05, for meeting cooking cost under Mid-Day Meal Scheme” (GoI, 2004).

Invoking Articles 38 (f) and 47 of the Indian Constitution⁵, the document noted that

“...even nine years after the commencement of the NP-NSPE, 1995, serving of cooked meal could not be universalized in six States which included certain major States. In many of the remaining States, quality of the meal served to children was not satisfactory. Keeping these aspects in view, changes in the Scheme had become necessary. Hon’ble Supreme Court has also been seized of the matter, and has been giving certain directions in this regard in its orders passed from time to time...” (GoI, 2004b).

The scheme’s basic objectives were to boost universalisation of primary education (classes I-V) by improving enrolment, attendance, retention, and learning levels of children, especially those belonging to disadvantaged sections, improve nutritional status of students of primary stage, and provide nutritional support to students of primary stage in drought-affected areas even during the summer vacation when schools would be closed.

According to the 2004 guidelines, the school lunch should provide 300 Kcal and 8-12 grams protein per primary school child per day. This programme was to be implemented in all government (including local bodies) and government-aided primary schools as well as the Alternate and Innovative Education (AIE) centres under the Education Guarantee Scheme

⁵ Article 39 (f) states: “The State shall, in particular, direct its policy towards securing - ... that children are given opportunities and facilities to develop in a healthy manner and in conditions of freedom and dignity and that childhood and youth are protected against exploitation and against moral and material abandonment. Article 47 states: “The State shall regard the raising of the level of nutrition and the standard of living of its people and the improvement of public health as among its primary duties ...”

(EGS). The responsibility for implementing the scheme was vested in the State Government/Union Territories. The central government allotted 100 grams of grain per day per child and Rs.50 per quintal of grain as transportation cost. Total assistance per child per day was Rs.2.21 (Rs. 1.11 for foodgrains; Rs. 1 for cooking cost; 8 paise⁶ for transport subsidy; and 2 paise for management, monitoring& evaluation).

New guidelines were issued in 2006. Noting that, ‘Today, the NP-NSPE is the world’s largest school feeding programme reaching out to about 12 crore⁷ children in over 9.50 lakh schools/EGS centres across the country’, the *Guidelines* stated: “There is also evidence to suggest that apart from enhancing school attendance and child nutrition, mid-day meals have an important social value and foster equality. As children learn to sit together and share a common meal, one can expect some erosion of caste prejudices and class inequality. Moreover, cultural traditions and social structures often mean that girls are much more affected by hunger than boys. Thus the mid-day meal programme can also reduce the gender gap in education, since it enhances female school attendance” (GoI, 2006).

The Guidelines identified three important grounds for revising the norms and modalities of the MDMS since the previous amendments in 2004. The provision for cooking cost of one rupee was rather inadequate. Second, the lack of kitchen sheds was a major problem, leading to use of class rooms for storage, and even, in some instances, for cooking, thus disrupting the educational process significantly, besides being fraught with risk. Third, professional opinion strongly suggested the need for revision of nutritional norms upwards, and for adding components of micronutrient supplementation and deworming. Following the recommendations made in this regard by the National Steering and Monitoring Committee (NSMC) for the NP-NSPE, the Central government revised the scheme and its norms through the issue of new guidelines.

Under the new guidelines of 2006, the nutritional norm in respect of calories/student/day was revised to a minimum of 450 from 300 in 2004. Protein intake norm per student per day was also increased from 8-12 grams in 2004 to a minimum of 12 grams in 2006. In order to meet the new

⁶ ‘Paise’ is plural for ‘paisa’, and ‘paisa’ is one-hundredth of the Indian rupee

⁷ One crore equals 10 millions

norms, a minimum of Rs.2 per child per day was allotted for cooking expenses- an increase of Re.1 from 2004 (Table 1.1). Of this, the central government provided, per day per child, Rs.1.80 to specified vulnerable states and Rs.1.50 to other states. The balance would be met by the States as appropriate.

Table 1.1: Central Government norms for per child allotment under MDMS

Sl. No.	Category	2004 guidelines (per child per day)	2006 guidelines (per child per day)
1.	Protein	300 Kcal	450 Kcal
2.	Nutrients	8 – 12 grams	Minimum 12 grams
3.	Micronutrients	Not prescribed	Adequate quantities of micronutrients like iron, folic acid, vitamin-A etc.
4.	Cooking cost	Re.1	Rs.2

The revised guidelines also provided for central support under the MDMS scheme, up to a maximum of 60,000 rupees per shed, for the construction of kitchen sheds (to serve as kitchen-cum-store) wherever the State/Union Territory was unable to meet the cost through convergence with other centrally funded programmes. The new guidelines provided for a one-time grant of Rs.5,000/- per school towards ‘..assistance for cooking/kitchen devices [gas stove with connection, stainless steel water storage tanks, cooking and serving utensils, etc.]’. They also provided rupees 100 per quintal for 11 special category states and 75 rupees per quintal for other states towards meeting the cost of transport of grain. Finally, the central government provided 1.8 per cent of scheme cost to the States/UTs for management and monitoring and evaluation (MME), with the Centre spending 0.2 per cent of scheme cost towards MME⁸.

While the new guidelines vest the overall responsibility for the scheme with the States/UTs, they also provide for a detailed programme management structure, from the national right down to the

⁸ During the financial year 2006-07, the Central government allocated 21.6 lakh metric tonnes of grain and rupees 2607 crores towards recurring expenses for cooking cost, transport subsidy and management, monitoring and evaluation. It provided an additional assistance of 1586 crore rupees for infrastructure spending for kitchen sheds and devices. (MoHRD presentation, Delhi, September 28, 2007)

level of local bodies, as well as guidelines for associating non-governmental organizations (NGOs) in the scheme. A particularly innovative aspect here is the activity mapping exercise suggested for application by the State governments with a view to enhancing the involvement of local bodies and the community in the scheme. The guidelines also provide for systematic concurrent monitoring and evaluation, using detailed formats and reporting systems.

Since 2006, when the guidelines described above were issued, there have been further initiatives and modifications in the MDMS. In October 2007, the scheme was expanded to cover children in upper primary (classes VI to VIII), initially in 3479 ‘educationally backward blocks’ (EBBs). Around 17 million upper primary children were included. Beginning with the financial year 2008-09, the programme covers *all children across the country* studying in Government, Local Body and Government-aided primary and upper primary schools and the EGS/AIE centres. The calorific value of a mid-day meal at upper primary stage has been fixed at a minimum of 700 calories and 20 grams of protein by providing 150 grams of food grains (rice/wheat) per child/school day. During 2009, the food norms were revised to provide more pulses and vegetables and to lower the quantity of oil and fat. The cooking costs were revised upwards in December 2009 and again with effect from the beginning of the financial year 2009-10 on April 1, 2010. Further, a decision was taken to revise cooking costs upwards by 7.5% from April 1, 2011 to account for inflation. A separate cost component for payment of honorarium at 1000 rupees per month per cook was also introduced in December 2009. Norms for engagement of cooks and helpers, linked to enrolment, have also been specified. The cost norms for construction of cooking shed-cum-store have also been revised to reflect local realities in the states and to provide some flexibility to the states. The transportation cost norms have been revised upward for states with difficult geographical terrains. The payment of cost of food grains to the Fertilizer Corporation of India (FCI) has been decentralized to the district level. The MDMS has now become more or less universal across the country, with broadly similar norms⁹.

It is thus evident that, over the last decade or so, the national school feeding programme has come to stay, thanks to governmental initiatives, judicial intervention and social movements for

⁹ The scheme is also referred to as the CMDM scheme, meaning the *cooked* mid day meal scheme, to distinguish it from schemes serving dry rations or ready-to-eat food, and to emphasize that, at least in rural areas, cooking is done on the school campus.

the right to food. While it may be too early to assess the functioning and the impact of the MDMS in a comprehensive manner, especially in terms of long term aspects like nutritional improvement, it is nonetheless useful to undertake a preliminary exploration.

MDMS: Promise and Performance

The stated objectives of MDMS, as we have seen, include:

- i) An increase in number of school going children, in terms of both attendance and enrolment
- ii) Improvement in nutritional status of the children
- iii) Promotion of social equity in terms of gender and caste

There have been several evaluation studies of the working of MDMS in recent years. Some data on school enrolment and attendance is also available. These make possible a preliminary assessment of MDMS.

A study in Birbhum district of West Bengal found, in its evaluation of MDMS that the scheme had led to a significant increase in enrolment and attendance of children, the increase being particularly marked in the case of girls and children from the scheduled castes and scheduled tribes. It also found that the MDMS had averted severe under-nourishment, reduced social distances and curbed teacher absenteeism (Pratichi Trust, 2005).

Similar findings have been reported from studies in Rajasthan, which have found that more than two-thirds of parents found the quality of the mid-day meals to be satisfactory and 85 per cent wanted the scheme to continue (Mathur et al., 2005). A survey in seventy 'most backward' villages of Madhya Pradesh reported that 90 per cent of teachers and cooks said the meal was being regularly provided, and that 96 per cent of parents wanted the scheme to continue. Also, 63 per cent of parents and 74 per cent of teachers felt that the meal has helped improve the children's learning abilities. There was a 15 per cent increase in overall enrolment. The increase was much higher in the case of SC and ST children (43 per cent), girls (38 per cent), SC and ST girls (41 per cent) (Jain and Shah, 2005).

A study of MDMS in rural Rajasthan (Blue, 2005) reported that:

- Cooked mid-day meal had become a permanent part of the daily routine of rural primary schools in Udaipur.
- There were efforts in introducing variety of menus.
- Meals were helping nutritional needs of poor children.
- Enrolment and attendance had increased.

Afridi (2005) reports improved functioning of MDMS in Madhya Pradesh while noting that there is room for further improvement. Rama Naik (2005) reports that the MDMS had led to a considerable increase in student enrolment and a decrease in teacher absenteeism in Karnataka. She also found that mid-day meals were being served regularly and that there was a high degree of satisfaction with the scheme on the part of both parents and students.

A study in Chittorgarh district Rajasthan found that:

“...overall implementation of MDM scheme is good and has had some impact on enrolment, retention and attendance of students in primary schools. The quality of education, nutrition and health has also improved to some extent. But the schools are still lacking in infrastructure facilities like kitchens, storerooms, latrines and sufficient classrooms. Water facility is also not available in many schools” (CART, 2006).

The study, covering 211 schools in 14 blocks of Chittorgarh district also found that the enrolment and retention had increased in about 64 per cent of the schools over the last three years (Drèze and Goyal, 2003).

In an earlier study conducted between January and April 2003 and covering 27 randomly selected villages in the three states of Chhattisgarh, Rajasthan and Karnataka, Drèze and Goyal found that in 76 out of 81 sample schools, mid-day meals were being regularly served (Drèze and Goyal, 2003). Taking the 81 sample schools together, Class 1 enrolment rose by 15 per cent between July 2001 and July 2002, with the rise in female enrolment in Chhattisgarh (17 per cent) and Rajasthan (29 per cent) being even higher. Drèze and Goyal observe that provisional enrolment data for the states of Chhattisgarh and Rajasthan, supplied by the Education

Department, suggested major jumps in female enrolment, in 2002-03 over 2001-02 at 19 per cent and 18 per cent, respectively. According to them, ‘There is a striking break here from the trend increase in school enrolment (about 2 per cent per year in the 1990s), and the bulk of this break is likely to reflect the impact of mid-day meals.’(Ibid).

Table 1.2: Students Covered under Mid-Day Meal Scheme in India

Sl. No.	States	2001-02	2002-03	2003-04	2004-05	2005-06
1.	Andhra Pradesh	7758454	7456254	7717673	9081299	6361814
2.	Assam	3057221	3149361	3210526	3387583	4795759
3.	Bihar	7252547	8095780	8868044	9791760	12638429
4.	Gujarat	4856615	3259341	3004496	3011034	5132959
5.	Haryana	1617412	1538006	1578538	1627834	1645509
6.	Himachal Pradesh	668604	639974	614847	590351	577998
7.	Jammu and Kashmir	716592	821890	738777	738777	1028425
8.	Karnataka	5585159	5621960	5349540	5126042	4962764
9.	Kerala	2334680	2355686	2166510	2116354	1907000
10.	Madhya Pradesh	7482769	7579750	7729652	7649784	8665342
11.	Maharashtra	10125032	9930938	9721167	9665362	9779283
12.	Odisha	4423250	4621934	4631826	5151346	5156154
13.	Punjab	1659750	1620811	1559682	1498697	1552404
14.	Rajasthan	6221663	7177718	7678153	7662192	10215570
15.	Tamil Nadu	5800543	5401644	5529945	4305932	4152167
16.	Uttar Pradesh	763093	14855697	16374892	16996916	18644467
17.	West Bengal	9581419	10563148	10268683	10290761	10886311
	India	103452587	103594682	105665960	108727254	119391681

Note: The numbers relate to children in primary schools

Source: Ministry of HRD, Government of India

The MDMS evaluation study carried out by NIPCCD in Madhya Pradesh during 2005-07 found that the scheme played an important role in reducing drop-out rates, especially among girls. The evaluation concluded that the MDMS scheme increased social equity by bringing children from

different social groups and letting them sit under the same roof. The report noted that the MDMS contributed to gender equity both by improving female enrolment rates and by providing employment to rural and tribal women (NIPCCD, 2007).

Increase in enrolment

It is clear from available data that since the initiation of the National Programme of Nutritional Support to Primary Education (NP-NSPE) in 1995, and with its further strengthening consequent to the Supreme Court orders, there has been a steady increase in the number of children covered under the mid-day meal scheme across many States in the country.

States such as Tamil Nadu and Kerala, where a universal or near universal MDMS had been in operation for a long time and where the demographic regime had stabilized and the population in the primary school age group was not increasing, do not show dramatic changes in mid-day meal participation for obvious reasons. On the other hand, in states where the NP-NSPE of 1995 had been indifferently implemented or remained largely unimplemented on account of financial constraints arising from the fact of non-provision by the Central government of assistance toward cooking costs, there is a clear improvement after the coming into force of the NP-NSPE guidelines of 2004. The improvement comes in the aftermath of the Supreme Court judgment of November 2001, but compliance with the historic judgment remained poor or lukewarm prior to 2004. This is especially evident when one looks at the figures for states such as Rajasthan and Bihar. In Rajasthan, the number of children getting a hot cooked meal in the school increased from 62.22 lakhs in 2001-02 to 71.78 lakhs in 2002-03 following the Supreme Court judgment of November of 2001, and further to 76.76 lakhs in 2003-04 before falling marginally in 2004-05 to 76.62 lakhs. But it jumped to 102.16 lakhs in 2005-06, following the implementation of the NP-NSPE guidelines of 2004 by the Centre. Bihar shows a similar picture, but with a more steady expansion from 72.53 lakhs in 2001-02 to 97.92 lakhs in 2004-05, and a big jump, as in the case of Rajasthan, to 126.38 lakhs in 2005-06. Uttar Pradesh and Madhya Pradesh also show considerable increase in the number of children reached under the MDMS in 2005-06 as compared to 2004-05 and earlier years. States such as Maharashtra, which has only partially implemented the MDMS do not show improvement while the large fall in Andhra Pradesh in 2005-06 as compared to 2004-05 is puzzling.

At the level of India as a whole, the number of children covered under the MDMS rose gradually from 10.36 crores in 2001-02 to 10.87 crores in 2004-05, and then registered a sharp increase to 11.94 crores in 2005-06 (Table 1.2).

Data on gross enrolment ratios, presented in Table 1.3, confirm a significant rise between 2001-02 and 2007-08, especially among girls from the socially disadvantaged scheduled tribes and scheduled castes. This is especially striking at the primary stage, but is significant at the upper primary stage as well.

Table 1.3: Primary (Classes 1 to 5) and Upper Primary (Classes 6 to 8) Gross Enrolment Ratios, India 2001-02 and 2007-08, per cent

Category	2001-02		2007-08	
	Primary	Upper Primary	Primary	Upper Primary
Scheduled Castes, Boys	103.1	80.3	132.3	84.1
Scheduled Castes, Girls	82.3	57.7	116.7	67.7
Scheduled Tribes, Boys	106.9	82.1	134.4	80.2
Scheduled Tribes, Girls	85.1	57.3	124	68.2

Source: *Selected Educational Statistics*, Ministry of Human Resource Development, Government of India, 2005-06, 2006-07 and 2007-08

MDMS contributes not only to increase in school enrolment but also increases regular attendance by providing cooked meals on all working days at the school itself. The alternate policy of providing dry rations of grain once per month would presumably be less effective in this regard, besides not ensuring that the grain thus distributed was actually consumed by the children for whom it was intended. Several studies and reports have reported that MDMS increases regular attendance in MDMS implementing centres.¹⁰ According to the Department of Basic Education, the agency for implementing MDMS in Uttar Pradesh, the large rise observed in school attendance during 2005-06 and 2006-07 was mainly due to MDMS, which was started in the state in 2004 in the state (Awasthi, 2007).

¹⁰ School Health (2006); Drèze and Goyal(2003); The Assam Tribune (2007); Khera (2006); Blue (2005).

MDMS also has the potential for creating awareness among the children about hygiene and clean environment. The mid-day meal in school provides an opportunity to educate students about the importance of washing hands and plates, of hygienic toilets and of maintaining a clean environment in and around the school. Similarly, a participatory MDMS, where parents are involved in monitoring the programme, can play an indirect role in improving basic knowledge about nutrition and elementary education among the parents of school going children.

Class room hunger

While it is too early to judge the long term impact of mid-day meals on child nutrition in the age group of 6-14 years, there are clearly a priori arguments which strongly suggest that it would be positive, especially in the case of vulnerable sections of the population. As Drèze and Goyal point out, ‘...mid-day meals facilitate the abolition of classroom hunger. Many Indian children reach school on an empty stomach in the morning, as early morning breakfast is not part of the household routine. In the absence of a mid-day meal, pupils often go hungry after a few hours and find it hard to concentrate.’ Further, “...in the more deprived areas, the mid-day meal is a protection against hunger in general. This year, for instance, mid-day meals have helped to avert an intensification of child undernutrition in many drought-affected areas. Similarly, poor households such as those headed by widows or landless labourers value the assurance of a free lunch for their children. The contribution of mid-day meals to food security seems to be particularly crucial in tribal areas, where hunger is endemic” (Drèze and Goyal, 2003).

Studies show that MDMS has benefited children whose parents work as casual wage labourers. A comprehensive evaluation of MDMS carried out for the government by the Programme Evaluation Organization (PEO) of the Planning Commission, based on a multistage random sampling procedure and covering 48 districts in 17 states, found that 43% of the households to which the children benefiting from MDMS belonged were rural labour households. Another 31% were farmers, mostly small and marginal ones with very small holdings. The MDMS thus seems to have reached the working poor to a significant extent. These children are generally hungry during the day, because their parents work as wage labourers either far away or go for work early. Other studies of MDMS have also shown that it is the weaker sections who avail the MDMS regularly (NIN, 2003; Blue, 2005).

MDMS and Social Equity

A central social problem in India is that of pervasive caste discrimination. In particular, discrimination against scheduled castes (SCs) and scheduled tribes (STs) is a striking feature, especially sharp in rural India. Particularly abhorrent is the practice of untouchability and social segregation of SCs from caste Hindus. Mid day meals, by getting children to eat together regardless of caste divides, and by involving SCs along with other communities in the operation of the scheme including cooking, can contribute to breaking barriers of caste and help promote egalitarian values among children. This is of course far from being an automatic process. Available evidence does point to considerable resistance to elimination of social discrimination in the MDMS. As Drèze and Goyal note, ‘... mid-day meals can also be a tool of reinforcement of prevailing social inequalities. For instance, during the pilot survey in Rajasthan, we found one village (Joz in Rajasamand district) where *SC* children had to drink from separate pitchers. This is an abominable instance of caste discrimination in the classroom, which defeats the socialisation role of mid-day meals. Further, there does seem to be much upper-caste resistance to the appointment of *SC* cooks. In Karnataka, half of the cooks in the sample were *SC*, and there seems to be wide social acceptance of this arrangement. In Chhattisgarh and Rajasthan, however, cases of *SC* cooks were largely confined to schools with no upper-caste children. We also noted instances of active parental resistance to the appointment of *SC* cooks, as in Kolu Pabuji (Jodhpur district, Rajasthan) where a Rajput parent had thrown sand in the mid-day meal because it had been cooked by a Meghwal woman’ (Drèze and Goyal, 2003).

However, Drèze and Goyal also note that, ‘The survey evidence suggests that open discrimination is rare. For instance, we did not find any cases of separate sitting arrangements or of preferential treatment for upper caste children. Pupils of all social backgrounds seem to be quite happy to sit together and share the same food. Parents, too, claim to welcome the arrangement in most cases. Teachers confirmed that parents rarely objected to their children sharing a meal with children of other castes. And among disadvantaged castes, very few parents felt that their children had ever experienced caste discrimination in the context of the mid-day meal’. (ibid.).

A survey conducted by the Indian Institute of Dalit Studies in five States (Lee and Thorat, 2004)¹¹, found that UP and Bihar where one third of the country's dalit population is concentrated, are being denied access on the one hand by the refusal to implement the cooked meal scheme; and there is caste discrimination in the distribution of dry grains to government school children. The survey also found that in the other three states, viz. Rajasthan, Tamil Nadu and Andhra Pradesh, opposition to dalit cooks, segregated seating and segregated meals and unfavourable treatment in food allotment are the means of caste discrimination observed.

The PEO evaluation, cited earlier, found that 23 per cent of beneficiary children were from scheduled castes, 15 per cent from scheduled tribes and 40 percent from other backward classes, thus confirming the fact that MDMS particularly benefits the socially disadvantaged sections. It makes the point that, ‘..there has been no evidence at an all India level to suggest that a particular social group has not been allowed to eat meals at schools. This suggests that the children in selected schools eat their meals together, thereby promoting social harmony’¹² As the MDMS is strengthened over time, and as the community comes to ‘own’ it, one hopes that it will play a role in breaking down caste barriers and discrimination.

Impact of MDMS on gender equity

The impact of MDMS on gender equity can, on the other hand, be expected to be unambiguously positive. There is clear evidence of significant increase in female enrolment when MDMS gets implemented (Drèze and Kingdon, 2001; Khera, 2006; Drèze and Goyal, 2003; Afridi, 2005). MDMS employs women for cooking and for helping with cooking and also as local organizers. This will also contribute to empowerment of women and to addressing the issue of gender inequality.

MDMS helps address the issue of child labour as well. The dire economic status of many poor households forces children of these households to work for survival rather than go to school.

¹¹ www.righttofoodindia.org

¹² Programme Evaluation Organization, Planning Commission, Government of India (2010), *Performance Evaluation of Cooked Mid day Meals (CMDM)*, p.56

Evidence of MDMS impact from NSS Data

Data from the 61st round of the NSSO for reference year 2004-05 suggest that 22.8 per cent of India's rural households had at least one member benefiting from the MDMS (Table 1.4). One needs to keep in mind that these are percentages of all households. The eligible households-those with one or more children attending primary school-would of course be a subset of all households, and so effective coverage figures would be higher than the numbers given here. The proportion varied across states, with 40.6 per cent for Chhattisgarh to 3.1 per cent and 1.3 per cent respectively for Punjab and Jammu and Kashmir. Karnataka reported 33.4 per cent, Madhya Pradesh 32.3 per cent and Tamil Nadu 31.8 per cent. West Bengal followed closely with 29.8 per cent. However, the states of Bihar, Jharkhand and Uttar Pradesh, where the programme is most urgently needed, lagged behind at 10.7 per cent, 11.2 per cent and 16.1 per cent respectively.

Table 1.4: Percentage of households with at least one member benefiting from MDMS during the last 365 days – Rural

Sl. No.	States	MDMS
1.	Andhra Pradesh	21.6
2.	Assam	18.0
3.	Bihar	10.7
4.	Chhattisgarh	40.6
5.	Gujarat	27.2
6.	Haryana	15.8
7.	Himachal	27.7
8.	Jammu and Kashmir	1.3
9.	Jharkhand	11.2
10.	Karnataka	33.4
11.	Kerala	21.7
12.	Madhya Pradesh	32.3
13.	Maharashtra	26.6
14.	Odisha	26.5
15.	Punjab	3.1
16.	Rajasthan	21.6
17.	Tamil Nadu	31.8
18.	Uttar Pradesh	16.1
19.	West Bengal	29.8
	All India	22.8

Source: NSS Report No. 510, GoI, 2007

The 61st round NSS data also show that the MDMS is availed to a proportionately greater extent by the STs (28.8 per cent) and SCs (25.3 per cent) – Table 1.5¹³. It is likely that, with NP-NSPE 2006 coming into implementation, these figures may have improved somewhat, but it is also clear that, despite the Supreme Court's unambiguous directives for universal provision of hot cooked meals for children at primary schools across the country, the programme is far from being universally implemented. The other point which emerges from the NSS data as far as social exclusion is concerned is that the OBCs, SCs and STs avail MDM to a significantly higher extent than do others.

Table 1.5 presents data on percentage of rural households with at least one member benefiting from MDMS by monthly per capita consumer expenditure decile category. As in the case of ICDS, it is clear that a higher proportion of the households who constitute the bottom thirty percent in terms of MPCE avail MDMS services as compared to the upper deciles, the proportions being 50 per cent and above in Chhattisgarh, Gujarat, Himachal Pradesh, Karnataka, Tamil Nadu and Kerala. In Andhra, Madhya Pradesh, Maharashtra and West Bengal, the figure exceeds one-third. The proportion exceeds 25% in most States, the only States falling below this figure being Punjab, Bihar and Jammu and Kashmir. In the case of the next four MPCE deciles also, the MDM reach is not too bad. It exceeds 30% in the states of Chhattisgarh, Gujarat, Himachal Pradesh, Karnataka, Kerala, Madhya Pradesh, Maharashtra, Rajasthan, Tamil Nadu and West Bengal.

¹³ The proportion for agricultural labour and other labour households is 29.1 per cent and 26.4 per cent respectively, as against the overall average of 22.8 %

Table 1.5: Percentage of households with at least one member benefiting from MDMS

Sl. No.	States	ST	SC	OBC	Others
1.	Andhra Pradesh	23.1	26.2	22.9	14.7
2.	Assam	17	22.7	17.5	17.6
3.	Bihar	8	13.4	10.8	6.5
4.	Chhattisgarh	38.1	48.3	42.1	26
5.	Gujarat	40.4	24.4	29.9	13.4
6.	Haryana	19	25.4	16.6	8.1
7.	Himachal	24.8	34.8	27.2	24.8
8.	Jammu and Kashmir	0	0.6	0.6	1.7
9.	Jharkhand	12	11.4	11.2	8.6
10.	Karnataka	45.6	33.6	33.9	29.7
11.	Kerala	35.8	29.7	23.5	14.4
12.	Madhya Pradesh	38.9	34.4	29.4	25.7
13.	Maharashtra	28.6	29.1	25.6	25.9
14.	Odisha	27.2	29	26.4	22.9
15.	Punjab	0	4.1	5.3	7
16.	Rajasthan	24.7	23.1	22.9	13.3
17.	Tamil Nadu	31.8	41.1	29.1	7.1
18.	Uttar Pradesh	10.8	20	15.8	11.6
19.	West Bengal	26.9	28.7	31.9	30.6
	All India	28.8	25.3	22.1	19.1

Source: NSS Report No. 510, GoI, 2007

Table 1.6 presents data on percentage of rural households with at least one member benefiting from MDMS by monthly per capita consumer expenditure decile category. As in the case of ICDS, it is clear that a higher proportion of the households who constitute the bottom thirty percent in terms of MPCE avail MDMS services as compared to the upper deciles, the proportions being close to 50 per cent and above in Chhattisgarh, Gujarat, Himachal Pradesh, Karnataka, Tamil Nadu, Rajasthan and Kerala. In Andhra, Madhya Pradesh, Maharashtra and West Bengal, the figure exceeds one-third. The proportion exceeds 25% in most States, the only States falling below this figure being Punjab, Bihar, Jharkhand and Jammu and Kashmir. In the case of the next four MPCE deciles also, the MDM reach is not too bad. It exceeds 30% in the states of Chhattisgarh, Gujarat, Himachal Pradesh, Karnataka, Kerala, Madhya Pradesh, Maharashtra, Rajasthan, Tamil Nadu and West Bengal.

Table 1.6: Percentage of Households with at least one member benefiting from MDMS- MPCE class wise- Rural

Sl. No.	States	Bottom 30%	Middle 40%	Top 30%	All
1.	Andhra Pradesh	34.76	23.84	11.75	21.60
2.	Assam	28.63	19.83	11.54	18.00
3.	Bihar	12.65	10.53	5.95	10.70
4.	Chhattisgarh	52.62	30.77	24.44	40.60
5.	Gujarat	50.14	36.07	12.03	27.20
6.	Haryana	27.85	27.69	9.76	15.80
7.	Himachal	56.72	41.92	19.05	27.70
8.	Jharkhand	14.69	10.11	5.83	11.20
9.	Jammu and Kashmir	3.19	0.65	1.56	1.30
10.	Karnataka	49.82	33.09	16.78	33.40
11.	Kerala	41.30	35.63	16.26	21.70
12.	Madhya Pradesh	41.81	31.01	15.00	32.30
13.	Maharashtra	42.74	26.74	15.26	26.60
14.	Odisha	30.06	25.27	15.84	26.50
15.	Punjab	3.41	7.40	1.26	3.10
16.	Rajasthan	36.52	25.40	12.72	21.60
17.	Tamil Nadu	49.61	36.29	15.49	31.80
18.	Uttar Pradesh	24.14	16.88	7.89	16.10
19.	West Bengal	42.38	32.60	19.11	29.80
	All India	33.40	24.68	12.58	22.80

Source: NSS Report No. 510, GoI, 2007

Some Weaknesses in MDMS

Within a general picture of progress in MDMS, there have been limitations as well. Lack of universal implementation as brought out from the NSS data is one important weakness of the MDMS at present. The PEO study, conducted with 2000-2006 as the reference period, found that, while coverage was near universal in the 48 sample districts that it surveyed, there were still quite a few schools left uncovered by the cooked mid day meals programme.

There are several other weaknesses of MDMS, both in implementation on the ground and in its concept and design. The MDMS has addressed to some extent the nutrition security of nutritionally deprived school children. But it does not cover children out of school. When we

move away from an instrumentalist understanding of MDM as merely an instrument to get children into school, and adopt a rights-based viewpoint that regards the nutrition security of the child as a human right, the need to expand the MDMS to cover out-of-school children becomes evident. The PEO study cited earlier found that the average and median annual incomes of households of children who were either out of school or had dropped out after enrolling were significantly lower than those of MDMS beneficiaries. The most vulnerable children in rural India are denied both the right to food and the right to education.¹⁴ This issue needs to be addressed and the MDMS redesigned accordingly. A working group of the Planning Commission has noted that the number of children in the primary school age group either out-of-school or studying in non-fee charging private schools would not amount to more than 10 to 12.5 million, and recommended the expansion of the MDMS to cover these segments (GoI, 2006e).

A key problem in implementation has to do with both the quantum of funds required and the flow of funds in the scheme. Until the revised norms of 2006 came into effect, the States, on their part, pleaded serious financial constraints in mobilizing the resources for cooking costs. Subsequent experience has shown that even the revised norms do not solve the resource problem completely. Even without ensuring legal minimum wages for cooks and helpers, the cooking costs have been going up. The cost estimates for food grain and other ingredients going into the mid day meal also face upward pressure in view of the uncertain situation on the grain front and inflationary pressures in the economy. Even in 2006, the Planning Commission working group noted that ‘A large number of states continue to face financial difficulties in meeting cooking costs and providing cooked meals. Central assistance to meet cooking cost is much lower than the actual requirement’ (ibid.). It also recommended that ‘The minimum cost norm for mid-day meals should be raised from the present “Rs.2 per child per day” to “Rs.3 per child per day”’ and that ‘...this norm should be automatically adjusted for inflation every two years using the food component of the Wholesale Price Index’. (ibid.)

On the other hand, there have been complaints that the delays in disbursement of funds to the implementing agencies at the field level from the State government impact negatively on the

¹⁴The category of vulnerable children ought to include street children, homeless ones, those in chronic hunger, children of migrant labourers, child workers and differently-abled children.

scheme in many States. As can be seen from Table 1.7 below, perhaps as a result of such delays or of financial constraints of States, the offtake of grain under the MDMS has consistently fallen short of allocation, the ratio of the former to the latter varying between 75 per cent and 78 per cent during the period 2002 to 2005, and showing only a modest improvement after the Supreme Court verdict of November 2001. The PEO study found that in the utilization of food grains averaged 76% in the 48 sample districts it covered. Utilization was especially low in tribal and backward districts such as Madhepura in Bihar (7%) and Adilabad in Andhra Pradesh (17%)¹⁵.

Table 1.7: Allocation and Offtake of Foodgrains under MDMS (in lakh tones)

Sl. No.	Allocation			Offtake		
	Rice	Wheat	Total	Rice	Wheat	Total
2001-02	18.67	9.96	28.63	13.48 (72.2)	7.28 (70.9)	20.76 (72.51)
2002-03	18.84	9.4	28.24	13.75 (72.98)	7.45 (79.26)	21.20 (75.07)
2003-04	17.72	9.08	26.8	13.49 (76.13)	7.20 (79.30)	20.69 (77.20)
2004-05	20.14	7.35	27.49	15.41 (76.51)	5.92 (80.54)	21.33 (77.59)
2005-06	17.78	4.72	22.5	13.64 (76.74)	3.63 (76.89)	17.28 (76.77)

Note: Figures in parenthesis are percentage of offtake from total allocation

Source: 1) Department of Food and Public Distribution, GoI

2) Ministry of Human Resource Development, GoI

The issue of adequacy or otherwise of resources also arises with respect to provision of infrastructure such as cooking sheds, cooking devices such as smokeless *chulahs* as well as utensils for food preparation and serving¹⁶. Moreover, schools need to make provision for plates to be used by the children to ensure uniformity and minimize social distances under the MDMS. There needs to be provision for training and skill upgradation for staff in the scheme and for information, education and communication expenses, especially to disseminate messages of

¹⁵ Programme Evaluation Organization, Planning Commission, Government of India (2010), *Performance Evaluation of Cooked Mid day Meals (CMDM)*, Table 4.3, p.34

¹⁶ A field study in Kerala found the funds allotted by the government to be inadequate and also reported delay in the transfer of contingency fund to schools (Gangadharan, 2006).

health and nutrition. It had been noted in 2007 that even the revised funding norms and provisions of the NP-NSPE 2006 need to be re-examined in the light of these needs¹⁷.

Some Design and Implementation Issues

Since 2006, the MDMS has been modified in terms of its design and implementation structures and cost norms to respond to these emerging issues. After the scheme became universal for upper primary schools as well from April 1, 2008, food norms were revised in 2009 to provide for the upper primary children 30 grams of pulses, 75 grams of vegetables accompanied by a reduction in oil and fat from 10 grams to 7.5 grams. Cooking cost norms per child per meal excluding labour and administrative charges were revised upward in December 2009 from 1.68 to 2.5 rupees for primary schools and from Rs.2.20 to 3.75 for upper primary children. They were further enhanced to 2.69 and 4.03 respectively from April 1, 2010. They have been revised upward by 7.5% from April 1, 2011. Earlier, the honorarium for the cooks and helpers employed in the scheme was paid from the labour and other administrative charges at the norm of 0.4 rupee per child per day, but since this was found to be very insufficient, a separate component for payment of honorarium at Rs.1000 per month per cook-cum-helper was introduced from 1.12.2009. One cook- cum-helper for up to 25 students, 2 if the student strength is between 25 and 100, and one additional cook-cum-helper for every 100 students thereafter has been provided in the scheme . Other cost item norms-such as for transportation-have also been revised from time to time. Decentralization of operations in several respects has also helped smooth the flow of funds and materials in the scheme. An important point to note is that the scheme now provides employment for more than 26 lakhs cook-cum-helpers engaged by the State/UTs during 2010-11 for preparation and serving of school meals. A significant percentage of the cooks and helpers are women. A good proportion of them are from the scheduled castes and other vulnerable social groups.

An elaborate implementation and monitoring mechanism is now in place for MDMS. The scheme is operated by the nodal department of school education and literacy under the ministry of human resource development at the level of the central government. There is a National Steering and Monitoring Committee (NSMC), and corresponding bodies at the level of the State

¹⁷ MSSRF (2007), *Draft Report on the State of Food Insecurity in Rural India*

governments. Inter- departmental cooperation is involved at the central level with the central government-owned Food Corporation of India which is to deliver the grain through its country-wide network of fair price shops to the school. The nodal department also coordinates with other central government departments running various infrastructure funding schemes for the purpose of providing the kitchen and store facilities at the school level. State governments are on board throughout and are also represented in the NSMC. The programme approval board (PAB) for MDMS at the central level is chaired by the secretary of the department of school education and literacy and consists of key officials of other concerned departments such as the department of rural development and panchayati raj, the department of women and child development, the Planning Commission and the Food Corporation of India. Each state/union territory submits an annual work plan and budget, which is to be approved by the PAB at the beginning of the financial year. The nodal department at the Centre coordinates with the designated nodal department for MDMS at the state level. Every State Government/UTs has to authorize one of its departments as the nodal department to take overall responsibility for implementation of the programme. Implementation cells are required to be set up by nodal department to monitor implementation of the programme at the school level. Nodal officers for the scheme have also to be identified and designated at the district and the development block levels. The guidelines of the scheme state that, in States which have devolved the function of primary education to Panchayats and Urban Local Bodies, the responsibility of implementation and day to day supervision of the programme shall rest with them. They may in turn constitute Standing Committees to oversee the implementation of the MDMS. At the school level, the responsibility rests with the school management and development committee (SMDC) or the village education committee (VEC) or the parent-teacher association (PTA), with these being accountable to the elected local panchayat. The scheme guidelines also provide for the involvement of non-government voluntary organizations in MDMS implementation, with the modalities being flexible in this regard. These entities may be involved in the supply of cooked meal, and provision of resource support to the programme.

The scheme guidelines state categorically that teachers should not be assigned responsibilities in MDMS that will interfere with the teaching/learning process. Community support for the scheme is to be mobilized by motivating parents, especially mothers, to get involved with the mid-day meal process at the school level. The scheme is also seen as an opportunity for women's

self help groups (SHGs) to ‘take responsibility for regular the procurement, cooking and distribution process’. The MDMS, is also to be ‘complemented with appropriate interventions relating to micronutrient supplementation and de-worming’¹⁸.

Viability

The MDMS has now been in existence for nearly a decade, having been expanded considerably after the Supreme Court judgement of November 28, 2001 cited earlier. The expansion of MDMS has been especially rapid since 2004. Table 1.8 provides details of expenditure on the scheme by the Union government since 1998-99.

It can be seen that the outlays remain fairly stagnant between 1998-99 and 2004-05. The outlays rise more rapidly from 2005-06 as more and more States and Union Territories move towards near-universal provision of cooked mid-day meals. Between 2005-06 and 2007-08, the expenditure (revised estimates) practically doubles from 3010.76 crore rupees to 6004 crores. It increases by 20% in 2008-09 over 2007-08 on account of universal coverage of upper primary schools from April 1, 2008. It increases by a further one-sixth on account of revision of cost norms and some expansion in the number of children availing the scheme. The number of children availing the mid day meals rose from around 9 crores in 2007-08 prior to extension to

Table 1.8: Expenditure by Government of India on Noon Meal/Nutritional Support to Education, 1998-99 to 2010-11 (Amounts in Rs. Crores).

Year	Budget Estimate	Revised Estimate
1998-99	1092.15	1400.15
1999-2000	1031.10	1500.00
2000-01	1090.00	1300.00
2001-02	930.00	1031.24
2002-03	1330.00	1237.00
2003-04	1200.00	1375.00
2004-05	1675.00	1507.50
2005-06	3010.76	3010.76
2006-07	5813.20	5813.20
2007-08	6591.60	6004.00
2008-09	7200.00	7200.00
2009-10	7024.10	6916.73
2010-11	8370.20	8393.78
2011-12	9210.75	---

Source: Union Budget, Government of India, Various years, accessed at indiabudget.nic.in

¹⁸Government of India (2006), *National Programme of Nutritional Support to Primary Education, 2006 [Mid-Day Meal Scheme]*, p.34

upper primary schools to 11.19 crores in 2008-09. It was 11.04 crores in 2009-10 and was set to touch 11.36 in 2010-11¹⁹. The combined expenditure of the Union and the State/Union Territory governments on MDMS would be in the neighbourhood of 17,000 crore rupees for 2010-11. The cost per beneficiary thus works out to around 1500 rupees per child per year or 125 rupees per month, roughly three US dollars. Of course, these are all approximate figures, but they do suggest that the financial viability of the MDMS is really not an issue for the Indian economy with an annual GDP growth rate of around 7% or more since 2003-04 and a per capita income of.....

In fact, government spending in India on education has been rather low by international standards and MDMS accounts for a minuscule share of the expenditure on education. The relevant figures for the period from 2004-05 to 2009-10, a period of relatively rapid growth of expenditures on education by the Union government, are shown in Table 1.9. It is clear that both the ratio of expenditures on education to total central government expenditure and that on MDMS as a percentage of expenditure on education have been rising in this period, but the levels of expenditure on MDMS are so low that there is hardly any fiscal threat to MDMS at the moment²⁰.

Table 1.9: Union Government Expenditures, Total and Education, 2004-05 to 2009-10
Expenditures in Rs. Crores

Year	Total Expenditure	Expenditure on Education	Expenditure on School Feeding
2004-05 (Actual)	8,69,757	84,111	1507.50
2005-06(Actual)	9,59,855	96,365	3010.76
2006-07(Actual)	11,09,174	1,14,744	5813.20
2007-08(Actual)	12,95,903	1,27,547	6004.00
2008-09(Revised Estimates)	16,59,109	1,67,981	7200.00
2009-10 (Budget Estimates)	18,70,955	1,98,842	6916.73 (Revised Estimates)

¹⁹ Official Presentations at the National Steering and Monitoring Committee Meetings of 20-10-2009 and 03-12-2010

²⁰ It must be noted, however, that the combined expenditure of central and State governments, though rising in absolute terms, have not increased consistently as a share of GDP. The total is a very low share of GDP, not even reaching 4 %. Even the eleventh Plan allocation for MDMS at 48,000 crore rupees from 2007-08 to 2011-12 is unlikely to be fully spent.

Financial viability does not seem to be a critical issue for MDMS at the moment. The country-wide demographic transition, evident in the preliminary figures of the 2011 Census, suggests that MDMS may remain financially affordable in the coming decades as well.

A Note on rethinking school feeding, based on the Indian Experience

The recent and evolving Indian experience with school feeding confirms many of the points made in the World Bank-WFP document *Rethinking School Feeding*²¹. The Indian experience highlights ‘...the centrality of the education sector in the policy dialogue on school feeding’²². It confirms the point made by Bundy et al that ‘the transition to sustainable national programs depends on mainstreaming school feeding into national policies and plans, especially education sector plans’²³. ‘It supports the argument that ‘Policy analysis also shows that the effectiveness and sustainability of school feeding programs is dependent upon embedding the programs within education sector policy’.

Bundy et al make four generalizations:

- School feeding programmes in low income countries exhibit large variations in cost
- As countries get richer, school feeding costs become a much smaller proportion of the investment in education.
- The main preconditions for the transition to sustainable national programs are mainstreaming school feeding in national policies and plans, especially education sector plans; identifying national sources of financing; and expanding national implementation capacity.
- It is important to both design long-term sustainability into programs from their inception and revisit programs as they evolve.

The Indian experience supports all the points made except the one about large variations in cost. While there are variations across States in the cost of the SFP, these have been minimized by the adoption of national nutritional and cost norms in India.

²¹ Donald Bundy et al (2009)

²² Ibid, p2

²³ Ibid, p5

Bundy et al highlight the capacity of the government at different levels to manage the program using its staff, infrastructure, and accountability systems in designing an appropriate SFP. They make the point that ‘... programs that have transitioned to national ownership show that effective programs have a designated national institution, usually the education sector, and well-developed capacity at the subnational levels’. Both these observations are validated by the Indian experience. However, the fact that nodal sector at the state level in Tamil Nadu has not been the education sector but the social welfare department has not rendered the programme ineffective. It was something of a historical accident and a reflection of the implicit social protection framework that the SFP in Tamil Nadu was not vested with the school education department. However, with the simultaneous implementation of both the scheme of *sarva shiksha abhiyan* (SSA, OR education for All) and the SFP, the school education department has become more involved with SFP in terms of infrastructure provision and the role of parent teacher associations, at least on paper, in the SFP. The basic and continuing weakness in the SFP in Tamil Nadu is that there is little involvement of elected local bodies.

Bundy et al argue that

‘...local procurement is the most common approach within national programs and is emerging as the more common approach overall. Local procurement is being actively evaluated as a means to achieve sustainable school feeding programs and, at the same time, to use the purchasing power of the program as a stimulus for the local agricultural economy’.

This is not the case in India, at least with respect to grain for the SFP. The massive public distribution system based on procurement of vast quantities of grain from farmers at minimum support prices makes the SFP much less important as a source of demand for grains. On the average, the government of India procures anywhere between 25 and 30 per cent of the domestic production of rice and wheat for its various food grain/food distribution programmes²⁴. Of this quantum, MDMS accounts for a small portion. But the basic point here is that finding markets

²⁴ Arvind Kumar (Government of India), PowerPoint Presentation entitled ‘India: A case Study of the Mid Day Meal Programme’, presented at the Global Child Nutrition Forum, “Scaling Up Sustainability: Linking School Feeding with Agriculture Development to Maximize Food Security” in Nairobi, Kenya, May 3 – May 7, 2011.

for farmers' produce is not a part of the motivations for the school feeding programme in the Indian context. The logistics of the massive programme and the need for quality control and reasonably standardized implementation make it somewhat difficult to decentralize grain procurement to school or local community levels, and there is no compelling rationale for it either.

However, there is scope for local procurement of vegetables and condiments as well as additional items (such as eggs and bananas in Tamil Nadu). These need to be explored.

Summing Up

Our quick review of the profile of the school feeding programme in India suggests that the intervention is financially affordable and highly positive in its impact on enrolment, elimination of class room hunger and promotion of gender and social equity. It is too early to assess its nutritional impacts. The links with health and nutrition can be strengthened considerably by better inter-sectoral coordination. The poor levels of community participation and the relative non-involvement of elected local bodies are weaknesses that need to be addressed urgently. But, overall, the scheme is here to stay, and well worth the resources expended on it.

References:

- Afridi, F (2005): "Mid-Day Meals in Two States; Comparing the financial and institutional organisation of the programme", *Economic and Political Weekly*, vol.40, no.5, April 9, pp 1528-1534.
- Awasthi, Puja (2007): "Mid-Day Meals – Hunger persists, attendance record patchy", *India Together*, March 31, www.indiatogether.org
- Blue, Julia (2005): "An Assessment of Program Implementation and Impact in Udaipur District", *Right to Food India*, www.righttofoodindia.org
- Bundy, Donald., Burbano, Carmen., Grosh, Margaret., Gelli, Aulo., Jukes, Matthew., and Drake, Lesley., (2009), *Rethinking School Feeding*, World Bank and World Food Programme.
- CART (2006): Measuring Effectiveness of Mid-day Meal Scheme in Rajasthan, CUTS Centre for Community Action, Research and Training, Jaipur,

www.cuts-international.org

- Drèze, Jean and Geetha Kingdon, (2001): “School Participation in Rural India”, *Review of Development Economics*, vol.5, no.1, pp 1-24.
- Drèze and Goyal, (2003): “Future of Mid-Day Meals”, *Economic and Political Weekly*, vol.38, no.44, November 1, pp 4673-4683.
- Government of India (1995): *Guidelines of National Programme of Nutritional Support to Primary Education launched in August*, Department of School Education and Literacy, <http://education.nic.in/mdm/>
- Government of India (2004): *Revised Mid-Day Meal Scheme Guidelines – 2004*, Ministry of Human Resources Development, New Delhi.
- Government of India (2006): *Report of the Eleventh Plan Working Group of Integrated Smart Card System*, Planning Commission, New Delhi.
- Government of India (2007): “Public Distribution System and Other Sources of Household Consumption, 2004-05”, *Report N0.510, 61st Round NSSO*, Ministry of Statistics and Programme Implementation, New Delhi.
- Jain, Jyotsna and Mihir Shah (2005): Mid-day Meal in Madhya Pradesh, *Samaj Pragati Sahyog*, Bagli.
- Khera, Reetika (2006): “Mid-day meals in Primary Schools: Achievements and Challenges”, *Economic and Political Weekly*, vol.41, no.46, November 18, pp 4742-4750
- Lal, Neeta (2007): *The Children of Hungry India*, March 25, www.boloji.com
- Lee, Joel and Sukhadeo Thorat, (2004): *Dalits and the Right to Food: Discrimination and Exclusion in Food Related Government Programmes*, Right to Food Campaign, www.righttofood.org
- Mathur, Beena (2005): *Situation Analysis of Mid-day Meal Programme in Rajasthan*, University of Rajasthan and UNICEF.
- National Family Health Survey (2007): *National Family Health survey, 2005-06*, International Institute for Population Sciences, Mumbai and ORC Macro, Maryland, USA.
- National Institute of Public Cooperation and Child Development (2007): *Annual Report, 2006-07*, New Delhi, <http://nipccd.nic.in>

- Pratiche Trust (2005): *Cooked Mid-day Meal Programme in West Bengal – A study in Birbhum District*, Kolkata.
- Naik, R (2005): *Report on Akshara Dasoha Scheme of Karnataka*, University of Dharwad.
- Right to Food Campaign (2006): *Convention on Children's Right to Food*, April 7-9, Hyderabad.

Website references:

- <http://www.akshayapatra.org/indias-mid-day-meal-scheme>
- <http://www.cardiff.ac.uk/cplan/research/fundedprojects/homegrowschoolfeeding.html>
- Gelli, Aulo et al (2010), *Home Grown School Feeding: linking small holder agriculture to school food provision*, PCD Working Paper 212
- http://hgsf-global.com/en/bank/comms/doc_download/14-home-grown-school-feeding-mapping-report
- http://hgsf-global.com/en/component/docman/doc_details/91-the-nutritional-status-of-school-aged-children
- James Sumberg and Rachel Sabates-Wheeler (2010), *Linking Agricultural Development to School Feeding*, Working Paper 012, accessed at www.future-agricultures.org
- MHRD, GoI (2010) *Mid-day Meal Scheme* Accessed at <http://education.nic.in/Elementary/mdm/downloads.htm>
- National Portal Content Management Team (Reviewed on: 19-01-2011), GoI, *Mid-Day Meal Scheme* Accessed at http://india.gov.in/sectors/education/mid_day_meal.php
- Peixinho, Albaneide (2007), PNAE: *Brazil School Feeding Programme*. Accessed at http://hgsf-global.com/en/component/docman/doc_details/67-brazil-national-school-feeding-program
- Rachel Sabates-Wheeler (2010), *Home Grown School Feeding and Social Protection*, Accessed at http://hgsf-global.org/en/bank/downloads/doc_download/56-home-grown-school-feeding-a-social-protection
- Rachel Winch (2009), *International Approaches to School Feeding: Country Experiences from Mali, Chile, and India*. Accessed at

http://hgsf-global.org/en/bank/downloads/doc_download/112-approaches-to-school-feeding-experiences-from-mali-chile-and-india

- WFP (2008), *Home-Grown School Feeding: A Framework To Link School Feeding With Local Agricultural Production*. Accessed at <http://www.schoolsandhealth.org/sites/ffe/key%20information/homegrown%20school%20feeding%20a%20framework%20to%20link%20school%20feeding%20with%20local%20agricultural%20production.pdf>

Chapter 2: The School Feeding Programme in Tamil Nadu

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Introduction

The provisional population figure from the 2011 population Census of India, for the state of Tamil Nadu, located in the southern peninsula of India, stands at 72.14 million persons²⁶. This makes the State comparable in terms of population to Germany and the United Kingdom. Its experience with school feeding programmes will certainly be of relevance to many developing countries. Being a constituent State within the Indian Union, the State has limited policy space. Nevertheless, there is some scope for experimenting and innovating, and for setting and implementing policy priorities. The area of school feeding is one where the State has been a pioneer among the Indian States, and its policy initiatives have subsequently provided the basis for national school feeding policies. In this paper, we shall provide a profile of the school feeding programme and practice on the State.

Among the Indian States, Tamil Nadu is one of the better performers in respect of human development. The state's literacy rate in 2011, measured as the percentage of population aged 7 years and above that is literate, is provisionally placed by the Census of India at 80.3% (India: 74.4%), the third highest among major States²⁷. While male literacy rate is higher at 86.8% (India: 82.1%), the female literacy rate is 73.9% (India: 65.5%). The urban literacy rate is higher than the rural, but the gap has been declining. The State has the highest percentage of urban population to total among the major Indian States. At least some part of the State's relatively better standing in terms of literacy-especially female literacy- among Indian States can be ascribed to its long record of school feeding programmes (SFP) which has helped improve enrolment, attendance and retention of children in school.

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²⁶ *The Census of India 2011*

²⁷ The term 'major State' here refers to all States of India with a population exceeding 20 million in 2001.

Evolution of School Feeding Programmes in Tamil Nadu

School meals were introduced in 1956. The coverage expanded with public and private contributions, both from within the State and from outside. These early efforts, while laudable, were not sustainable. They were not integrated into the education and social policies of the government. Things changed dramatically in 1982 when the government started the noon meal scheme. As has been noted, 'The introduction of the noon meal scheme in 1982 was a watershed which marked the beginning of a continuous expansion to the pre-school ages, moving towards universalisation, provision of dedicated staff and infrastructure, systematic training, and budgeting for recurring and non-recurring expenses'²⁸.

The government of Tamil Nadu started the noon meal scheme, to begin with, for children aged 2 to 5 years (preschool) and 5-9 years (primary school) in *rural* areas. This scheme started on July 1, 1982. From September 15, 1982, the scheme was extended to *urban* areas as well. Citizens above 60 years of age who were eligible for old age pension were allowed to take their meals from the noon meal centres from January 15, 1983. It was then extended to *children in the age group of 10 to 15 years* from September 15, 1984. From December 7, 1995, pregnant women beneficiaries of the National Maternity Benefit Scheme (NMBS) were allowed to take their meal at the noon meal centres²⁹.

One can immediately see that the scheme had a holistic social protection approach underlying it, since it started with pre-primary and primary school children, and was later extended not only to students in elementary and high schools, but also to old age pensioners and pregnant women. Besides, the State also implemented the centrally funded Integrated Child Development Services (ICDS) scheme which addressed, among other things, the needs of the 0-2 age group. A recent document of the government of Tamil Nadu describes the objectives of the programme thus: 'The foremost objective of the Nutritious Meal Programme is to motivate children from economically backward families to pursue education by providing adequate nutritious meal to them in order to reduce school dropout rates. It also aims to eradicate malnutrition and increase literacy rates. With a view to enhancing enrolment, retention and attendance and simultaneously

²⁸ Anuradha Khatri Rajivan (2006)

²⁹ Government of Tamil Nadu (2001)

improving nutritional levels among children, Puratchi Thalaivar MGR Nutritious Meal Programme was launched on 01.07.1982³⁰.

The coverage of the school meal component alone, even leaving out the pre-school part, has been quite massive throughout. In 2001-02, the nutritious meal scheme for school children aged 5 to 15 years covered 6.46 million beneficiaries, consisting of 5.98 million in rural areas and the rest in urban areas. However, with the State undergoing a demographic transition, the numbers have since declined. In 2010-11, there were 42, 824 meal centres covering 5.77 million children, with 5.47 million of them coming from rural areas. In terms of the stage of education, 3.20 million were in the primary schools of classes 1 to 5, 1.82 million in the elementary education stage of classes 6 to 8 and the remaining 0.75 million were in classes 9 and 10.

Over the years, the meal quality has also improved in terms of nutrition content. The feeding scale in 2001-02 was 100 grams of rice, 15 grams of pulses and 1 gram of oil per child for children from classes 1 to 8. The scale was the same for children of classes 9 and 10 except for a higher allocation of rice of 120 grams per day per child. Besides, there was a provision for vegetables, condiments and fuel at a flat monetary rate per child, the same for all classes. In 2002-02, this was 0.23 rupee. In 2010-11, the food basket for the noon meal had been strengthened by the provision of three eggs a week or bananas in lieu of eggs for children who do not consume eggs. The provision for vegetables, condiments and fuel had been enhanced to 0.44 rupee, intended to cover for inflation, but possibly being inadequate in that respect. Some further supplements were introduced between 2001 and 2010. These included provision of special pulses at the rate of 20 grams per child on one day of the week and 20 grams of potatoes on another day. Besides, all school meals were prepared with double fortified salt, to meet iron and iodine deficiencies. Financial provisions were also made for the routine sanitary maintenance and upkeep of the noon meal centres. By 2010-11, each child was receiving per day 476 calories and 15.34 grams of protein. This was a nutritionally important supplement for the children, given the prevalence of protein energy malnutrition in the State earlier and even now.

³⁰ Government of Tamil Nadu (2011)

Developments since 1995

Though successive elections to the state legislature have thrown up frequent changes of government, the commitment to finding the fiscal resources for the school feeding programme and enhancing the entitlements from time to time has been sustained. More recently, with the government of India taking the cue from the positive experience of Tamil Nadu with school feeding, the fiscal requirements have also eased.

After the introduction of the National Programme of Nutritional Support to Primary Education (NPNSPE) in 1995 by the government of India, the state was eligible to receive grain free of cost from the Central government. With the revised guidelines of 2004 and then 2006, the State also became eligible for assistance in respect of transport of grain, construction of kitchen sheds and cooking cost. These developments have reduced to some extent the expenditure to be incurred by the State government from its own resources, besides strengthening the quality of the programme.

Throughout the 1990s, the total state government expenditure on nutrition (of which the school feeding programme forms the biggest component) as a share of the state government's expenditure on social services varied between 6.8% and 9.5%. As a share of the government's overall revenue expenditure, it was even smaller at between 2.5 and 3.8 per cent over the period from 1997-98 to 2002-03. The school feeding programme alone involved an expenditure that varied between 0.17 per cent and 0.30 per cent of the state's net domestic product. As a share of the state's revenue receipts or expenditure, it varied between 1 and 2 per cent. As a share of the state's own revenue, it varied between 1.39 per cent and 2.4 per cent. By 2010-11, the expenditure on the school feeding programme has declined further as a share of every one of the relevant fiscal magnitudes. The fiscal sustainability of the school feeding programme is thus a non-issue, has always been so and will increasingly be so as the state moves further on the road of demographic transition. The gains, on the other hand, have been significant, by all accounts.

Some Specific Features of the SFP of Tamil Nadu

While the central government, in its policy documents on school feeding programmes has acknowledged the experience of Tamil Nadu with SFPs as an important input into the initiation

and design of the national programme, the SFP in Tamil Nadu differs in some respects from the national programme guidelines. The scheme at the national level is anchored in the Literacy and School Education department of the Union Ministry of Human Resource Development. It has been made an integral part of the government's education policy, with the main goal of impacting upon enrolment and retention. By contrast, the Tamil Nadu programme has always been under the department of social welfare and viewed first and foremost as a social protection intervention, even though goals pertaining to education were also part of the stated objectives of the scheme from its inception. It has not been mainstreamed into the education policy of the government. The education department figures mainly in the involvement, if any, of the school teachers in the daily noon meal process, the site of which is the school. Involvement of teachers in the implementation of MDMS is minimal. While some may regard the location of the nodal department for implementing a SFP outside the education sector as a weakness, the prestige of the scheme in the state has been high, as it is a pioneer programme of the State government, and is immensely popular with the people, especially so in rural areas. It is now regarded as an irrevocable scheme and is likely under most conceivable circumstances, to be strengthened and not phased out as happens to many social protection or educational interventions across the world when governments are perceived to face fiscal crises.

A second feature of the SFP in Tamil Nadu is that it has also been viewed along with other nutrition-related interventions such as those of ICDS and the school health programme of the health and family welfare. While the MDM provides food and nutrition, the school health programme provides for deworming. The lunch menu of the MDMS has been repeatedly upgraded, from the viewpoint of ensuring adequate nutrition, including the provision of micronutrients.

A third feature of the SFP in Tamil Nadu is that it has a set of paid functionaries to take care of all work related to the cooking of the noon meal on the school campus. There is a full time noon meal organizer (NMO) for every feeding centre. Cooks and helpers are engaged as paid workers to cook the meal and to carry out the task of cleaning up afterwards. This arrangement ensures that teachers do not have to divert time from teaching to the work of procuring the inputs for the noon meal and organizing the cooking-tasks which are performed by the NMO. The actual

cooking is done by the cook, with the aid of a helper who also takes care of the washing and cleaning that follows the serving of the meals. There are norms for employment of cooks and helpers, with the numbers to be hired, linked to the number of children to be fed. Here is a description of the implementation arrangements for MDM in Tamil Nadu from the evaluation report of the Planning Commission of India:

‘The Noon Meal Organizer (NMO) works at the school/centre level, coordinating the work with block level officials. The NMO is assisted by cook and a helper at the school level. Every school with less than 500 students has been provided an organizer, a cook and a helper while schools with more than 500 students are provided with an organizer, two cooks and two helpers. Records are maintained by the NMO. *The foodgrain is supplied by the Tamil Nadu Civil Supplies Corporation (TNCSC) from the block godown directly to the centers.* Tamil Nadu was found to have the least number of intermediaries in the procedure of flow of foodgrain from State nodal agency to school³¹’.

The question of inter-departmental/sectoral coordination does not figure prominently in the implementation of MDMS in Tamil Nadu. This has not been seen, in practical terms, as a major problem. The overall nutrition policy in the state rests on a life-cycle based approach to nutrition wherein the nutritional needs of pre-school children under six years of age and pregnant and lactating mothers are sought to be covered under the integrated child development services (ICDS) programme.

An important feature of the school feeding programme in the state of Tamil Nadu is that it is run entirely by the government with staff exclusively assigned to run the programme. It is also the case that the programme runs in a uniform manner throughout the State. There is no outsourcing of whole or part of the programme anywhere in the state in the name of involving self-help groups or of so-called ‘public-private participation’. With state support to grain prices-mainly paddy and wheat-coming from the central government in the form of massive procurement, the school feeding programme is not seen as a marketing opportunity for grain-producing farmers. Not surprisingly, farmers are not in any way factored into or involved with the programme.

³¹ Government of India (2010)

While the State has been a pioneer in being the first to implement a universal school feeding programme in the country, there has been little experimentation or built-in flexibility allowing for local initiatives and innovation. In order to find material for innovative case studies, therefore, we have turned to the neighbouring area of Puducherry, consisting of the Tamil-speaking regions of the Union Territory of Puducherry. This area is culturally very similar to Tamil Nadu, so that the lessons drawn from here can be relatively easily applied to Tamil Nadu.

Some criticisms of the Tamil Nadu SFP

The scheme has generally been welcomed in the state since its inception, notwithstanding some derisive responses from political opponents at the time of its introduction in the state. Indeed, this response was the key reason for the fact that those political outfits that derided it when in opposition, sought to own and strengthen it when in office. But there have been criticisms of the manner of its implementation and questioning of the myriad benefits claimed for the scheme by successive governments. Some of the criticism has centered around the alleged non-transparency in sharing the information on the programme or on the inconsistencies in the data pertaining to the scheme from different sources in the government. The persistence of malnutrition among children is cited by some to question the claims of the scheme in relation to nutrition. Some have argued that the school feeding programme has failed to ensure universal enrolment, attendance and retention. But even these critics have conceded, apparently rather grudgingly, that ‘... providing noon-meal may have helped to bring down the drop-out rate to some extent³²’. This paper does not go into an analysis of these criticisms, except to say that the school feeding programme, *by itself*, cannot obviously solve the nutritional challenges of any society nor ensure universal enrolment and attendance, much less retention or achievement. The points about the need for consistent data and for transparency are of course valid, but they do not constitute a criticism of the scheme as much as they do of the government and the bureaucracy implementing it. Instead, we turn to some recent evaluations of the functioning of the MDMS in Tamil Nadu by independent academic institutions as part of the national steering and monitoring process of MDMS in place since 2006.

³² Padmini Swaminathan et al (2004)

Monitoring of Tamil Nadu SFP

The national guidelines for the MDMS provide for monitoring systems to be put in place to ensure the smooth implementation of MDMS across various States. There is a National Steering and Monitoring Committee which is chaired by the secretary of the Department of Literacy and School Education of the government of India, the nodal department for the MDMS. The guidelines provide for the establishment of corresponding steering and monitoring committees at the level of the States, and corresponding ones at sub State levels such as the district, the development block and the village panchayat or the corresponding elected urban local body. The formal constitution of such committees at the state and sub state levels has not been complete. Moreover, even when they have been constituted, many of them do not meet regularly nor do they function effectively. Tamil Nadu is no exception in this regard. The 2010-11 policy note of the social welfare department of the state government, the nodal department for the SFP in the state, states: 'A State Level Steering cum Monitoring Committee has been constituted to ensure that adequate quantity of quality food is served to the beneficiaries. The State Level Committee Meeting was held on 22-10-2009 under the Chairmanship of Chief Secretary to Government to review the functioning of the programme. District / Block / Corporation /Municipality and Panchayat Level Committees have also been formed to monitor the functioning of school Nutritious Meal Programme Centres. Elected representatives of local bodies have been nominated to the above Committees along with Officials'. However, the monitoring process on the ground is rather weak. In particular, the elected bodies are marginal to the functioning of the programme. The MDMS in Tamil Nadu has historically been an essentially government-run programme, and the state government has appointed full and part time functionaries to ensure the delivery of the noon meal programme at the school level on a daily basis. Such monitoring as occurs is essentially by bureaucrats at different levels, even though the central scheme envisages entrusting of responsibility for managing and monitoring the MDMS at the village level to the village panchayat. Since primary and secondary schools are not under the purview and control of elected local bodies in the State, elected local bodies are not involved in MDMS in any statutory manner. The monitoring process in the state for MDMS is largely run by bureaucrats.

Evaluation of SFP in Tamil Nadu

Under the new national guidelines for the MDMS across the country notified in 2006, there is a system of concurrent evaluation by independent agencies of the ongoing MDMS in every State, funded from the 2% of the total MDMS budget set apart for management, monitoring and evaluation (MME). Under this provision, there have been several rounds of concurrent evaluation of the SFP in Tamil Nadu by external evaluation agencies. Their evaluation reports of this agency provide us with a picture of how the scheme is being implemented in the state. Several points emerge from a perusal of the evaluation reports over the period from 2007 to 2010³³.

One point that comes through in all reports is that all schools serve hot cooked meals with significant variety. Besides the mandated rice and lentils-based gravy dish (known as *sambhar*), schools serve vegetables and greens such as carrots, beet root, brinjal, okra, spinach and so on in cooked form. They also serve potatoes in cooked form from time to time. Nearly all schools serve three eggs a week or equivalent quantities of fruits. The general feedback from students is that the noon meals served to them are tasty and of good quality and adequate quantity. Similarly, the grain management seems well streamlined. Almost all the sample schools in various survey rounds have reported that they get the grain delivered well in time and most have reported that they keep a month's stock of grain with them to handle any contingency. Kitchen sheds that also provide the space for storing food items have been constructed in a large number of schools using central government assistance, though in a quarter of the sample schools, safe storage space for food items is a problem, involving sometimes the use of class room space. Cooks have been sanctioned and are in position in most schools. The percentage of persons belonging to SC/ST communities is higher than their population share in all districts, and much higher in some. Noon meal organizers are present in all sample schools. The process of preparing and delivering to children a meal of specified quantity, variety and quality seems to have been firmly established successfully.

³³ I have relied mainly on the detailed reports prepared by the Indian Institute of Management, Bengaluru of several rounds of evaluation, based on field visits, discussions with officials, interviews with teachers and students and secondary data made available by the officials concerned.

There are many unresolved problems as well. Cooking costs, even when the Central government has released its share well in time, do not seem to reach many schools in time, though it must be stated that the position in this respect varies a great deal across districts. Problems of adequate availability and safety have not been entirely resolved. Deworming and distribution of micronutrient supplements is yet to be systematized and there is a case for stronger coordination between education, health and social welfare departments in this regard. Hygienic conditions and observance of clean practices remain a challenge. Firewood continues to be the main fuel and this raises issues of both health and environmental hazard. Safety in the cooking area remains a matter of concern in some of the sample schools. Perhaps the single most important negative aspect of the performance of MDMS in the state is the near complete absence of community participation either in the form of elected local bodies-such as the village panchayats-monitoring the programme either directly or through their standing committees-or in the form of sustained involvement of parents of children benefiting from the SFP. There is much talk of ‘community participation’ but little evidence of it occurring. Moreover, even the evaluation agencies tend to view community participation only in terms of the community contributing to the programme expenses-recurring and non-recurring- in cash or kind rather than in more holistic terms.

Summing Up

The experience of the south Indian state of Tamil Nadu with school feeding programmes is instructive in many ways. It demonstrates the point that most such programmes in contemporary developing countries go through a process of evolution before they become embedded in the policy framework. Second, it shows the importance of sustained political will as well as the virtues of active political competition in a pluralist democracy where the poor are under-represented in most public spaces and forums. Third, it shows that fiscal constraints do not constitute a strong argument against the initiation and universalization of a school feeding programme. The per capita income of the state of Tamil Nadu was not very different from the all India average-it was possibly marginally lower-through the period from the late 1950s to the mid-1980s when the programme made a big leap. But political will led to the introduction of the statewide, state funded programme in 1982 and subsequent experience has shown that the fiscal commitment involved in running the scheme is eminently manageable. Expenditure on SFP in the state is a small share of the government’s expenditure on social services, an even smaller

share of its total revenue expenditure and a miniscule percentage of the state's net domestic product. The benefits of the SFP, on the other hand, accrue to a large section of the population. Further, the section benefited being children in the age group of 2 to 15 years, the scheme constitutes a valuable investment in human development and in the country's future. It is also a partial fulfilment of the State's responsibilities toward children, both in terms of international covenants to which India is a signatory and in terms of the constitutional mandate of ensuring the right to life which includes, as the Supreme Court has reminded everyone, includes the right to food. While there is considerable scope for improving the design and delivery of the SFP in the state and the lack of any involvement of elected local bodies is a serious flaw, the fact still remains that the SFP has contributed significantly to an increase in enrolment, attendance and retention of children in schools.

One can see that the number of beneficiaries of the school feeding programme has declined over the period 1997-98 to 2009-10 even while the amount of expenditure on the programme has increased nearly four-fold in nominal terms. Several factors underlie these trends. One is that there is demographic transition well under way in the state since the 1980s. One indicator of this is the fact that the number of children aged 6 years or less has **declined in absolute terms** between 2001 and 2011 from 72,35,160 to 68,94,821³⁴. The number of school age children must also have either declined or increased only marginally, but the age distribution data from Census 2011 is not yet available. Longer term data indicate that the number of enrolled students in all schools in the state grew from 82,98,675 in 1977 to 98,70,049 in 1983 to 1,15,71,340 in 1988 to 1,28,96,084 in 1992³⁵. However, total enrolment in 2005-06 was only 1,30,20,000. In 2009-10, total school enrolment in the state in the age group of 6 to 16 years was 1,38,30,000. The quality of the data, taken from the government website, is not certain, but this is what we have to work with. The spurts in enrolment between 1977 and 1992 may be partly attributed to the introduction of the school feeding programme in the state in 1982 and its universalization by 1984. The more recent spurt may partly be attributed to a new government initiative called *sarva shiksha abhiyan* or movement for universal (school) education. The recent spurt notwithstanding, it is clear that the proportion of students enrolled in government and government-aided schools is

³⁴ *Census of India*, 2001 and 2011

³⁵ P. Duraisamy, et.al. (1998)

declining in recent years, and even the absolute numbers may be stagnant or declining. An important reason here is that in recent years-for more than a decade now-there has been a huge growth of unaided schools taking in students in the entire school-going age group of 6 to 18 years. This is a factor in reducing the rate of increase of students in schools where the government-run school feeding programmes are operating. In addition, a general improvement in living standards among sections of the population of the state over the last two decades may also have led to rising aspiration levels and thereby to a proportion of enrolled and eligible students opting out of the school feeding programme. But these observations must necessarily remain somewhat speculative, since we do not have clinching evidence here.

Why have the costs gone up? First, a part of the increased expenditure reflects the impact of inflation. A part, constituting an increase in real terms, reflects the enhanced meal provisions, including eggs/banana. Another reason for the rise in expenditures in real terms even while the number of students being fed is declining could be the provisions now made for better infrastructure including for cooking sheds, utensils and gas stoves. There is also the increase in real terms in the compensation paid to employees in the programme. Since the original compensation levels were quite meagre, this was inevitable.

Notwithstanding the increase in per beneficiary expenditure in nominal and, to a lesser extent, in real terms, the school feeding programme in the state of Tamil Nadu is a very small proportion of the state government's expenditure, both total and that related to the social sector, and of course a tiny proportion of the state's net domestic product. This is money well spent, in view of its impact, not just in terms improving enrolment, but also in terms of reducing class room hunger, helping break down caste and other social barriers peculiar to the Indian context and encouraging healthy socialization among school children.

References:

- Duraisamy, P., Estelle James, Julia Lane and Jee-Peng Tan (1998), “*Is there a quantity-quality trade-off as pupil-teacher ratios increase?; Evidence from Tamil Nadu, India*”, International Journal of Educational Development, Vol 18, Issue 5, September, pp 367-383.
- Government of India: *Population Census Reports 2001*, Registrar General of India, New Delhi.
- Government of India: *Provisional Population Totals Paper 1*, 2011, Registrar General of India, New Delhi.
- Government of India (2010): Programme Evaluation Organization, ‘*Performance Evaluation of the Cooked Mid-day Meal (CMDM)*’, Planning Commission, p.30, para 4.3.14, emphasis added.
- Government of Tamil Nadu (2001): *Policy Note* of the Department of Social Welfare and Nutritious Meals Programme.
- Government of Tamil Nadu (2011): *Policy Note* of the Department of Social Welfare and Nutritious Meals Programme.
- Rajivan, K. Anuradha (2006): “*Tamil Nadu: ICDS with a difference*”, Economic and Political Weekly, August 26, pp. 3684 to 3688.
- Swaminathan, Padmini, J Jeyaranjan, R Sreenivasan and K Jayashree (2004): “*Tamil Nadu’s Mid day Meal Scheme: Where assumed benefits score over hard data*”, Economic and Political Weekly, October 30, pp. 4811 to 4821.

The School Feeding Programme in Tamil Nadu: Some Trends

A look at the numbers of the school feeding programme in Tamil Nadu throws up some puzzles.

The basic data is provided in Table 2.1.

Table 2.1: Some Data on the School Feeding Programme in Tamil Nadu, 1997-98 to 2009-10

Year	No. of Centres	No. of Beneficiaries	Expenditure in Rupees Crores*
1997-98	40,035	65,68,403	101.53
1998-99	40,176	65,73,664	116.80
1999-2000	40,427	63,89,589	155.22
2000-01	41,057	64,60,223	166.01
2001-02	41,012	64,91,662	155.18
2002-03	41,118	65,04,642	175.51
2003-04	41,336	62,96,809	252.79
2004-05	41,738	62,62,333	198.94
2005-06	39,597	54,98,309	219.72
2006-07	39,522	55,51,011	288.73
2007-08	41,916	58,69,910	506.90
2008-09	42,078	56,41,502	550.74
2009-10	42,824	57, 74,673	788.35
3 Year Average ending 1999-2000	40,213	65,10,552	124.52
3 Year Average ending in 2009-10	42,273	57,62,028	615.33
Change, %	5.12 %	-11.50%	394

***1 crore equals 10 million**

Source: Performance Budgets for various years, Department of Social Welfare and Nutritious Meal Programme, Government of Tamil Nadu.

Chapter 3: Salient Aspects of School Feeding Programme in Puducherry³⁶

G Anuradha & R Rukmani³⁷

The Union Territory of Puducherry comprises of four coastal districts, namely, Puducherry, Karaikal, Yanam and Mahe. Puducherry and Karaikal districts are situated on the east coast adjoining Tamil Nadu while Yanam is also in the east coast, but adjoining Andhra Pradesh. Mahe is on the west coast adjoining Kerala. Puducherry is the capital of the Union Territory and is located at a distance of 160 km. to the south of Chennai, the capital city of Tamil Nadu. According to Census 2011, the total population of the Union Territory is around 1.2 million of which 76% are in the district of Puducherry and 16% are in the district of Karaikal. That is, nearly 92 percent of the population in the Union Territory of Puducherry resides in regions that are culturally very similar to the neighboring State of Tamil Nadu.

The school feeding programme of Puducherry is distinctly different from comparable programmes in the rest of the country. This note sets out to describe the major elements of this ‘state-led innovative model’ of Puducherry. The distinctiveness of the programme is with respect to the scope, coverage, funding sources and procurement methods.

Scope: The programme in Puducherry is much more comprehensive with the following three major components marking the difference:

1. Breakfast scheme, under which hot milk and biscuits are given to children in government and government-aided schools;
2. Centralized kitchens, where meals are prepared on a large scale in a clean environment and an industrial setting, using state of the art technology;
3. Evening milk scheme, under which hot milk is supplied to children in government and government-aided schools;

³⁶ Since October 2006, Puducherry has been renamed as Puducherry

³⁷ Senior Scientist, M S Swaminathan Research Foundation and Director-in-charge, Food Security, M S Swaminathan Research Foundation

Coverage: The programme is relatively much more inclusive as children from pre-primary classes as well as children from classes IX to XII are covered, in addition to children in classes I to VIII. In most States of the country children in classes I-VIII are only covered under the National Programme of Mid-Day Meals. In neighbouring Tamil Nadu, a pioneer state in this regard, students in government and aided schools are covered up to class X.

Funding: The Breakfast scheme as well as the Evening milk scheme are supported entirely by the Government of Puducherry while the mid-day meals are supported by funds from Government of India as well as the Government of Puducherry.

Procurement methods: Various articles-diet and non-diet- required for implementing the school feeding programme are procured largely from government-run cooperatives such as Puducherry Central Cooperative Processing Supply and Marketing Society , Puducherry Agro Products Food and Civil Supplies Corporation Limited, Puducherry Agro Service Industries Corporation Limited etc. While self help groups are involved in the supply of diet articles, the extent of their involvement is not very significant in the overall programme.

The three major components of the Puducherry School feeding programme, viz. Breakfast scheme, mid day meals, evening milk scheme-cover 126000 children studying from class I to XII in 463 Government/Government Aided Private Schools, in addition to children in pre-primary centres (*Balwadis*) as on March 2011. Details of these schemes are discussed below:

Breakfast Scheme: The breakfast scheme has been in operation in the Union Territory of Puducherry since the year 2002. The scheme entails distribution of 35gm of iron fortified glucose biscuits and 100 ml of hot milk per child on all school working days. Milk is supplied to the schools directly by the Puducherry Co-operative Milk Producers Union (PONLAIT) around 6 am on all school working days. Each school estimates the required quantity of milk for their school and sends their calculation to PONLAIT. Two persons per school are appointed by PONLAIT to boil the milk in the school campus and distribute the same to the students before the morning assembly, say, 15 minutes before the commencement of classes. On the part of the school administration, a teacher is assigned the responsibility of overseeing the milk distribution.

Milk packets are cut and boiled in the presence of the teacher. Biscuits are supplied by the government-owned Puducherry Agro Products Food and Civil Supplies Corporation Limited (PAPSCO).

The quantities and nutritional values per child of the items supplied in breakfast scheme are as shown below:

Item	Quantity	Energy K. Cal
Hot Milk	100 ml.	79
Biscuits	35 gms.	150

The cost involved in implementing the breakfast scheme is borne by the Government of Puducherry.

Mid-Day Meal Scheme: As per the guidelines of Government of India's National Programme for Nutrition Support to Primary Education (NPNSPE), the government of Puducherry receives central support in the form of free food grains for implementing the mid-day meal scheme. In addition, various other costs such as transportation of food grains, cooking cost, construction of kitchen cum store, utensils etc. are also supported by central government. In addition to central funds, state funds are allocated and spent for covering the children in pre-primary classes and higher-secondary classes as well as to improve the nutritional value of the meals. Since 2004, Central Kitchens, equipped with modern cooking range facilities, are in operation where mid-day meals are prepared and transported to schools in the neighbourhood. As on March 2011, mid-day meals are prepared in 12 central kitchens and 92 school canteen centres. Of the 126000 children who take mid-day meals in Puducherry, 96000 are served from the modern central kitchens while 30000 are served by school canteen centres. In the centralized kitchens, meals are steam cooked using huge steam boilers and this method of preparation ensures quality and hygiene. Moreover, large scale cooking helps in keeping costs down besides ensuring uniform quality. Of the 12 central kitchens, two are LP gas based while 10 are diesel based. Cooked meals from the central kitchens are distributed to all schools attached to them through vehicles. In one district of Puducherry region, viz. Puducherry district, the 304 schools covered by central kitchens are catered to by 29 vehicles. On an average, each vehicle supplies to 10 or more schools.

Mid-day Meal consists of rice, spicy gravy (*Sambar/Karakuzhambu*) and vegetable curry. In addition, 2 eggs per week per child are supplied.

The diet scale as of 2011 is as follows:

Sl. No.	Item	Class	Quantity
1.	Rice	I to IV	Not exceeding 130 gms. per student/day
2.	Rice	V to XII	Not exceeding 160 gms. per student/day
3.	Oil	I to XII	3-4 gms. per student/day
4.	Chilli Powder	I to XII	2.5 gms. per student/day
5.	Red Gram	I to XII	10 gms. per student/day
6.	White gram	I to XII	0.25 gms. per student/day
7.	Other Pulses (such as lablab)	I to XII	12 gms. per student/non-egg day
8.	Egg	I to XII	2 Eggs per week (weighing 50 gms. each)
9.	Tamarind	I to XII.	2-3 gms. per student/day
10.	Dry Chilly	I to XII	0.5 gms. per student/day
11.	Mustard	I to XII	0.25 gms. per student/day
12.	Turmeric Powder	I to XII	0.10 gms. per student/day
13.	Garlic	I to XII	3 gms. per student/day on days when extra spicy gravy (<i>Karakuzhambu</i>) is served
14.	Onion chips	I to XII	0.25 gms. per student/day on days when extra spicy gravy (<i>Karakuzhambu</i>) is served
15.	Salt (Double fortified)	I to XII	3 gms. per student/day
16.	Vegetables	I to XII	75 gms. per student/day

The nutritional value of the mid day meal in Puducherry, as of 2011, is as follows;

Group	Calories	Protein
<i>Standard I-IV on Vegetable day</i>	596	19 grams
<i>Standard I-IV on Egg day</i>	631	23 grams
<i>Standard V-XII on Vegetable day</i>	700	21 grams
<i>Standard V-XII on Egg day</i>	735	25 grams

As is clear from appendix 2 of Chapter 1, the nutritional value of mid day meal in Puducherry is relatively higher than what is provided in other parts of the country. In addition to rice supplied by Food Corporation of India (FCI), PAPSCO also supplies rice procured from the open market to mid day meal centres. Rice from FCI is polished in the PAPSCO mill before being sent to the central kitchen/school canteens. All other ingredients are supplied by M/s. Puducherry Agro

Service and Industries Corporation Limited (PASIC), Puducherry Agro Products Food and Civil Supplies Corporation Limited (PAPSCO) etc. Fresh vegetables and eggs are also supplied by PAPSCO to every kitchen. According to the Annual Work Plan and Budget, 2010-11 of State Union Territory of Puducherry, the cost of mid day meal for students in Class I to V works out to Rs.4.75/day when egg is not supplied and Rs.7.00/day when an egg is supplied. For students in class VI to XII cost per meal per student works out to Rs.4.40 on non-egg day and Rs.6.65 on days when eggs are supplied. The cost per meal excludes the cost of rice.

In Puducherry, the mid-day meal scheme is implemented directly by the Department of School Education. There is coordination with the Department of Health and the height and weight of the students are recorded once in 6 months and all the students are provided with a health card.

Evening Milk Scheme: Evening milk scheme is in operation in Puducherry since October 2005. As per this scheme 100 ml of milk (with 5 gms of sugar) per child per day is given after school hours, in the evening. As on March 2011, a total of 1,05,000 children studying in classes I to X are supplied with milk under this scheme. Implementation modalities of this scheme are similar to the morning milk scheme.

References:

- Executive Summary, Report of Senior Adviser to review the implementation of the Flagship Programmes of Puducherry, Planning Commission of India, 2009
- National Programme of Mid Day Meal in Schools (MDMS), Annual Work Plan and Budget 2010-11, Union Territory of Puducherry

Chapter 4: Mid Day Meal Programme in Andhra Pradesh

*K S Gopal*³⁸

Backdrop

The scheme of mid day or noon meal scheme was initially an effort of select state governments that later got central financial support and lead to its country wide adoption. The motivation of MDM was to draw children to school following poor primary school attendance. Upon the establishing of this validity in states like Tamil Nadu, it led to its universal adoption. Mid Day Meal (MDM) as a programme was introduced in AP in 1982 as an experiment in all Abhyudaya Pradhamika Patashalalu (Progressive Primary Schools) in the state and was because the earlier attempts to achieve wide participation, let alone universalization of elementary and secondary education through improving aspects such as access, enrollment, retention and achievement and in different schemes aimed at reaching primary and secondary education of the most needy and the disadvantaged sections in the society failed. Deprived populations felt it as economically burdensome to send children to school. But in 1985 this experiment in AP was abruptly closed under an explanation of inadequate finances leading to the experiment itself not completed.

In August 1995, AP began to implement the National Programme for Nutritional Support to Primary Education. Herein each child was provided with, 3 kgs of raw rice per month for a period of 10 months in a year. It was in 2003 that the State Government launched cooked MDM Programme to all primary school children in government, local body and the government aided schools. The big boost for its full and proper implementation came following the Hon'ble Supreme Court's direction in 2001 to provide cooked meal to school children and state officials were hauled up by the Court. Subsequently the provisions were extended to children enrolled in and under the Education Guarantee Scheme (EGS), Alternative & Innovative Education (AIE) Centres and Madarsas/Maqtabs.

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Caveats and bottlenecks in this Study

It is important that the issue under inquiry in this study are understood. It was in the period following 2003 coupled with the availability of women self help groups that were springing up under a World Bank assisted project, that AP received attention for implementing decentralized systems (excluding rice) as an opportunity to decrease food miles and kick start a process of a multiplier – benefit to local produce, better quality and higher community participation.

The current situation is, the supply side monitoring on implementation is by Supreme Court. This has lead to efforts by state government including bestowing adequate attention to effective implementation of MDM. Also the central government is providing enhanced funds for MDM. On the demand side a key aspect is the rising dalit assertion and aspiration among who being a major recipient of MDM seek to further their voices including emerging as a distinct political force whose cadre are better and constantly articulating needs of the recipient community.

The above provides the backdrop as this study has a purpose - to learn, examine and as needed promote de-centralized systems of managing MDM. AP, partly due to SHGs had some well publicized examples of decentralized supply of mid day meals. But during the study one finds the ground scenario of SHG involvements have changed considerable. However it got captured because the MDM as discussed earlier witnessed pressures from two sides leading to effective implementation. But one issue created problems for local providers. BCT in Vizag because the matter was under Supreme Court attention needing to state taking over food supplies being done but then while SHGs set up under Society for Elimination of Rural Poverty (SERP) who were cooking the meal faced prolonged delays in the payments to supplies by the government.

Thus the study found reality as different from its premise and hence the reason for not being able to learn the experience of decentralized and community based food supplies approaches. With the largest budgeted item and also the most expensive cost – rice supplied by state agency the govt. has ended up with large cooking institutions whose case studies are listed herein rather than what one hoped to understand and capitalize in this study. However labor provisioning in the making of cooked meal, the study brings out challenges and scope of promoting a decentralized procurement system for the commodities.

Status

The key and important objectives of this MDM programme are to motivate children belonging to disadvantaged sections to attend schools regularly and help them in concentrating on school and classroom activities, to improve the nutritional status of children enrolled in primary and secondary schools, and to improve their retention. The importance of these objectives becomes clear when we look at the existing literacy and nutritional status of the population, particularly rural people.

According to 2001 population census in AP 60.47 percentage of the population was literate. While among the males the literacy rate was 70.32% it was 50.43% among females. The literacy rate was even lower among the disadvantaged sections. Among the rural women literacy rate was only 23.97%. Among SC population literacy rate was 53.52%. While among the SC males the literacy rate was 63.51% it was 43.35% among SC females. Similarly, Among ST population literacy rate was 37.04%. While among the ST males the literacy rate was 47.66% it was 26.11% among ST females.

To this one need to add health status of the children, particularly the school going children. 70.8% of the children below 5 years were anaemic. Similarly, among the girls in the age group of 12-14 years 72.7% were suffering from anemia. (p.8, AWP&B 09-10, Andhra Pradesh www.education.nic.in.pdf)

The MDM programme was expected improve both literacy and health/nutrition status of children.

Coverage

Under MDM cooked food will be provided to the children studying in classes I – VIII in schools run by Government, Local bodies and Government Aided, Education Guarantee schools / AIE, Madaras & Maktabas and also children studying in NCLP centres. Later from October 2008 onwards the Government of Andhra Pradesh extended MDM programme to the children studying in class IX & X of Govt., Local body, and Govt. Aided schools on par with national programme on MDM from 13-10-2008 onwards. The State Government is providing MDM to

the Students of IX and X Classes in the high schools also by procuring rice from the open market through Andhra Pradesh Civil Supplies Corporation (A.P.C.S.C) from out of its own funds. All these students will be provided with MDM for 220 working days in an year.

Government of India directed that cooked meal should be provided with a minimum content of 450 calories and 12 grams of protein on each working day of the school to children studying in classes I to V and 700 calories and 20 grams of protein content is to be provided per child on each working day of the school for classes VI to VIII. The state government of AP claims that this has been ensured in the state.

According to the state government of AP standardized menu as planned by the National Institute of Nutrition, Hyderabad is being followed in the state in serving food under MDM. The menu is flexible with rice & sambar being the main menu with egg/banana twice a week. The implementing agencies cook sambar using the seasonally available vegetables .The wholesomeness of the meal provided will be checked at random by various officials visiting schools. Whenever the quantity/quality is not as per the guidelines, suitable action will be initiated against the concerned. All the eligible children are covered under this programme. However, a small percentage of children are not availing themselves of the Mid Day Meal as they prefer homemade meals. To ensure that two eggs /banana are served to children elaborate guidelines are issued for procuring eggs at the District level through tender system.

To improve nutritional status of the children, Britannia Industries, Naandi Foundation and Global Alliance for Improved Nutrition (GAIN) have volunteered collectively to provide the nutritious biscuits. In the first phase two Britannia Tiger Iron (5mg) Fortified Biscuits / Egg and Banana / Pickles are provided to each child once in a week in Hyderabad district. Providing tasty fortified biscuits along with Mid day Meal was expected to go a long way towards physical growth and mental development of the children. This programme was initiated in March 2007.

Table 4.1: Per child per day cooking cost of Meal as per State nutritional expenditure norms

Sl. No.	Food Items	Primary		Upper Primary	
		Quality	Cost Rs.	Quality	Cost Rs.
1.	Foodgrains (Rice)	100 grms	Free Supply	150 grms	Free supply
2.	Pulses	20	0.82	30	1.07
3.	Vegetables	50	0.53	75	0.63
4.	Oil & Pulse	5	0.46	7.5	0.52
5.	Sal & Condiments	-	0.14	-	0.14
6.	Fuel	-	0.03	-	0.03
7.	Egg/Fruits	Twice in a week	0.72	Twice in a week	0.72
8.	Other charges		*0.58		*0.58
	Total		3.55		3.96

*This amount can be utilized for purchase of Eggs / Fruits in addition to allotted amount for Eggs / Fruits.

Source: GoAP Mid Day Meal Scheme Guidelines 2010-11

The menu given in Table 4.1, is expected to provide per child per day 650 calories energy and 12 grms protein in primary sections and 900 calories of energy and 20 grms of proteins in upper primary sections. These are higher than the norms prescribed by the central government.

Before 1st December 2009 cooking cost for each child both in primary and upper primary sections was Rs.3.25 per student. From 1st December 2009 this was enhanced to Rs.3.55 per student in the primary sections and Rs.3.96 per student in the upper primary sections. Through G.O. Rt. No. 474 dated 17-08-2010 these rates were enhanced to Rs.3.69 and Rs.4.17 per student in the primary and upper primary sections respectively. In the case of students of classes of IX and X also the cooking cost was increased to Rs.4.17 through G.O. Rt. No.470 dated 16-08-2010.

Programme Administration

The implementation of MDM involves different stages and coordination among different government departments and also different wings within the same department. The Government of India releases sanctioned funds to the State Government based on the annual allocations. At the state level the Director of School Education receives these funds. The department of school

education prepares the budget for each year that includes requirement of rice and other cooking ingredients and the costs of administering the scheme with inputs on number of students to be fed under this scheme. Based on the requirements of each district the Director of School Education releases funds to the District Educational Officers on quarterly basis. The District Educational Officers in turn releases the funds to the Mandal Educational Officers. The Mandal Educational Officers collect bills from the implementing agencies in the Mandals and prefer the claims with the Pay and Accounts officers/ Treasury Officers. The Pay and Accounts Officers/ Treasury Officer pass the bills and issue the cheques to the implementing agencies.

Apart from the government officials and school headmaster and teachers the implementing agency plays crucial role in the success of the MDM scheme. In rural areas one of the agencies drawn from DWCRA/Self Help Groups/SEC/Other agencies like Temples, NGOs of proven track record, charitable Trusts/Group of Parents (in this order of preference) are to be identified by the Tahsildar of the Mandal as the implementing agencies. The Tahsildar of the Mandal in association with Mandal Prajaparishad Development officer and Mandal Educational Officer identify the Agency in a meeting at school level organized by Panchayat Secretary. Similarly, in Urban areas community development societies like (CDS)/NGOs/Urban SHGs/DWCUA/School Education Committees and other Agencies like Temples/NGOs of proven track record/charitable trusts/Group of Parents (in this order of preference) are identified as implementing agencies by a committee headed by the Tahsildar of the Mandal.

Experience in multi sectoral co-ordination

A) Procurement of rice

Government of India allocates rice based on the requirements submitted by the School Education Department of Andhra Pradesh through Food Corporation of India (FCI). Foodgrains will be allocated biannually by the Department of School Education & Literacy, MHRD, GOI with the concurrence of Department of Food & Public Distribution System. The first Six months allocation will be made in the 1st week of February of the previous year on the basis of number of children approved in PAB (Programme Approved Board) of that academic year and second six months will be made in the first week of August after deducting available unspent balances

with schools. To ensure timely allocation of foodgrains by the GoI, the concerned authority needs to submit Utilization certificate.

At the state level it is the responsibility of FCI to ensure continuous availability of adequate quantity of good quality of rice for the MDM scheme. The regional FCI will allow lifting of food grains as per allocation of the state and according to the lifting schedule drawn up by the District administration. At the district level the District Educational Officer is nominated as Nodal officer for implementation of the MDM scheme. He looks after all issues related to lifting, quality of rice and payment of cost of food grains lifted under MDM Scheme.

The District Managers of APCSC Ltd. lift the raw rice from FCI godowns and distribute it to the schools through Fair Price shops. Mandal Educational Officer in consultation with the Tahsildar of that Mandal allocate the foodgrains to the each school on the basis of enrolment. The Headmasters/implementing agencies receive the stocks as per their allocation. The implementing agencies are responsible for lifting rice from the Fair price shops. Rice so supplied should be stored at school level and they are to be taken care of by Head Master and implementing agencies. This rice and other ingredients used in cooking shall be stored in clean surroundings.

The Food Corporation of India supplies rice under MDM Scheme at the BPL rate. Grant of Central assistance towards transportation cost is based on flat rate of Rs.750/- per Mt. for A.P., as a whole or actual expenditure whichever is less. The Utilization of this grant should be commensurate with the actual quantity of foodgrains lifted and transported under this programme.

Is there any change in the procurement arrangement? What are the issues. Quantity of allocation/procurement over time.

B) System for procuring other cooking ingredients

The Implementing Agency is responsible for the purchase of other material – other than rice which is supplied by APSCSC - like dal, vegetables, cooking oil, sambar powder, fire wood etc.

from the DWCRA group/ Gruha Mitra/ Local Market etc., from out of the funds released to them. The implementing agency needs to maintain records of all these purchases.

C) System for cooking

In the past it was the responsibility of implementing agencies to cook mid day meal and serve it to the students. Either members of these agencies used to cook or hired cooks. Per child 25 paise was allowed as cooking cost. According to new rules laid by the government of India (GoI, MHRD, Department of School Education and Literacy, MDM Division Dt:30.04.2010) a separate provision for payment of honorarium to cook-cum-helpers @ 1000.00 (Rs.750/- Central share and Rs.250/- State share) per month has been made with effect 01.04.2010. State Government shall give priority to weaker sections of the society like women, SC, ST, OBC, and minority in engaging cook-cum-helpers. One cook -cum -helper shall be engaged to a school having up to 25 students. Two cook-cum-helpers for schools having 26 to 100 students. And one additional cook-cum-helper for every addition of 100 students.

Monitoring the MDM scheme

For effective implementation of the MDM scheme the Implementing Agencies at the school level need to maintain the relevant registers like, stock register, issue register, etc. The monthly reports based on these reports need to be submitted to the Mandal Educational Officers (MEO).

The mothers' committees and Gram Panchayats are responsible for supervision of MDM Programme at the school level. The Mothers' Committees are responsible for certifying the number of students who availed themselves of the Mid Day Meals and supervision of quality of food supplied to children. Head Masters of the respective schools are also responsible to monitor the Mid Day Meal programme in their school for effective implementation. These agencies need to ensure that, among other things, regular and wholesome meal is served to children, cooking in hygienic conditions and serving of vegetables, eggs / fruits twice in a week.

The Mandal level implementation committee is headed by MEO and this committee is expected to meet fortnightly to review the implementation of the MDM Programme in the Mandal. MEOs have to ensure, among other things, that monthly bills at the school level are prepared in time,

that food grain is received and stored properly, Head Masters supervise the programme effectively and the implementation agencies provide their services promptly.

The District Educational Officers (DEO) supervise implementation of the programme at district level. They coordinate with the APCSC/FCI District Manager for delivery of rice for the MDM programme in the district. They take the help of Deputy DEOs at the Division level. DEO also need to submit monthly reports to state government. General Body of the Zilla Parishad and the District Development Review Committee (DDRC) are also expected to review implementation of the Programme in the District.

Display of information

The guidelines on implementation of MDM indicate that school, mandal and district level information on MDM should be displayed on monthly/quarterly basis as suo - motu information under RTI Act. This information shall be displayed either on black board or display board. The information to be displayed shall include quantity and quality of food grains received and date of receipt, other ingredients purchased and utilized, number of children provided MDM, daily menu, assistance received from the government and paid to agencies, and community members' assistance and their involvement in MDM scheme.

Status of MDM in AP

Between 2004-05 and 2007-08 about Rs.1452 crore were allocated for mid day meal scheme in the state. Out of this only Rs.783 crore were spent. In 2006-07 only 52 percent of the allocated funds were used. In 2007-08 this has further declined to 37 percent. The last few years has also seen decline in state government funding for this scheme. While the state government allocated Rs.250 crore in the year 2004-05, this declined to Rs.205 crore in 2007-08.

Government of Andhra Pradesh has allocated an amount of Rs.294.50 crores for MDM Programme during the year 2008-09. Budget allocation for the year 2010-11 is Rs. 270 core, and for the year 2011-12 the budget allocation for MDM programme is Rs.372 crore.

Table 4.2: Enrolment of Students

		2002-03	2003-04	2004-05	2005-06	2006-07	2007-08	2008-09
Primary	No. of Schools	63362	63897	61680	62159	62162	62464	65609
	Boys	3197135	3006457	2779410	2720336	2788122	2719721	2875478
	Girls	3153937	2960553	2744953	2677672	2725033	2647228	2810567
	Total	6351072	5967010	5524363	5398008	5513155	5366949	5686045
Upper Primary	No. of Schools	15110	15215	16667	17290	17823	17957	14942
	Boys	1761580	1636883	1647443	1651337	1691111	1615903	1302469
	Girls	1627609	1513081	1525434	1511426	1554985	1494783	1189729
	Total	3389189	3149964	3172877	3162763	3246096	3110686	2492198
High School	No. of Schools	12570	13160	14342	15437	16195	16937	17376
	Boys	2233949	2341558	2472790	2551235	2604144	2646112	2747809
	Girls	1844409	1988921	2160752	2388008	2384647	2468330	2622153
	Total	4078358	4330479	4633242	4839243	4988791	5114442	5369962
Special Schools	No. of Schools	219	120	130	130	131	131	132
	Boys	7166	7275	8946	9852	8370	8101	8362
	Girls	4034	3539	4294	4990	4573	4440	4858
	Total	11200	10814	13240	14842	12943	12541	13220
Oriental Schools	No. of Schools	177	159	180	205	205	201	163
	Boys	21447	19457	19382	21289	21288	20705	16835
	Girls	22634	20696	21114	23431	23407	22639	18113
	Total	44081	40153	40496	44720	44695	43344	34948
Total	No. of Schools	91438	92551	92999	95221	96516	97690	98222
	Boys	7221277	7011630	6927671	6954049	7113035	7010542	6950953
	Girls	6652623	6486790	6456547	6505527	6692645	6637420	6645420
	Total	13873900	13498420	13384218	13459576	13805680	13647962	13596373

Between 2003 and 2009 there was no consistent trend in enrolment of students in the state (Table 4.2). The girl students accounted for 47 to 49 percent of the total enrolment. All the schools in the state are not covered under the mid day meal scheme. Only the government and government aided schools are covered under MDM. They account for more than 75 percent of the schools in the state.

In the year 2006-07 about 55 lakh children were beneficiaries of the mid day meal programme in AP. According to the Planning Commission Report during the year 2009-10 more than 60 lakh

students spread over 60,780 schools were served cooked food under MDM. According to the National University of Educational Planning and Administration's Annual Report 92.02% of the government and aided schools in AP are providing MDM in the year 2009-10. According to the GoAP's estimate during the year 59,98,715 students of I to VIII classes would receive cooked food during 2010-11 (Table 4.3). To this one need to add students of IX and X of government and government aided schools.

Table 4.3: Student strength in Primary and Upper Primary Classes during the year 2010-11

Sl. No.	District	Total No. of Institutions	Enrolment	MDM Opted
1.	Srikakulam	3282	259378	220471
2.	Vizianagaram	2472	217701	185046
3.	Visakhapatnam	3753	307533	261436
4.	East Godavari	3505	432985	368038
5.	West Godavari	2813	335425	285111
6.	Krishna	3123	323473	275231
7.	Guntur	3432	366760	312346
8.	Prakasam	3474	316375	269325
9.	Nellore	3546	246575	209868
10.	Chittoor	5062	337744	287104
11.	Kadapa	3437	220631	187894
12.	Ananthapur	3638	365717	311156
13.	Kurnool	2563	409422	348814
14.	Mahaboob Nagar	3361	413013	351451
15.	RangaReddy	2117	304121	259044
16.	Hyderabad	1098	220909	192837
17.	Medak	2528	312564	266154
18.	Nizamabad	1945	235507	204808
19.	Adilabad	2746	259406	220912
20.	Karimnagar	2601	285514	242788
21.	Warangal	2830	287322	244513
22.	Khammam	2695	247371	210372
23.	Nalgonda	3003	333319	283996
	Total	68754	7043265	5998715

Source: GoAP Mid Day Meal Scheme Guidelines 2010-11

Analysis

There is no denying the fact that the MDM helped to improve school education in the villages. This has helped to improve enrolment, attendance and retention. Field work done in three selected villages in Pulkal mandal, Medak District of AP School teachers working in these villages said that enrolment and attendance improved in primary as well as upper primary schools following the implementation of MDM. In the past only about 50% of the students used to attend school regularly. Now because of the MDM nearly 90 percent of the enrolled students attend school regularly.

Planning Commission study also found that MDM contributed to improvement in school education in the sample districts in AP. According to this report 70 percent of the sample schools reported improvement following the implementation of MDM in these schools. Nearly 80 percentage of this improvement is attributed to MDM. Similarly, 95 percentage of the sample schools reported improvement in attendance due to MDM. During the period 2000-06 97.5 percent of the sample schools in AP attributed an increase in retention rates to CMDM.

But the achievements would have been much better if the problems nagging the MDM programme were addressed. These problems include diversion of rice allotted to the MDM schools, lack of necessary infrastructure for cooking and serving the meals, lack of transparency in the implementation of the programme and near absence of local community participation in this programme.

During the field work done in three selected villages in Pulkal mandal, Medak District of AP teachers as well as the DWCRA members responsible for cooking the meal reported that the present rice allotment of 100 grams per student of the primary school was very inadequate and wanted it to be restored to 125 grams which was the case in the past. One reason for this coming informal coming down of this entitlement was partly because the state government was not able to make payments to those taking the responsibility of providing cooked food. The demand from the community was to stick to the original nutrition based intake needs.

Allotment of rice and other ingredients depends on enrolment and attendance. Fudging and corruption in a way starts from this stage. According to a social audit of MDM conducted by MVF³⁹ and its partners in AP on the day of the social audit in select schools 18889 children were found to be having the mid day meal where as the attendance registers showed that 21958 children were eating the mid day meal. This implies that consumption was over estimated by about 13%. One of the reasons for this over estimation could be corruption. Other reasons might be that they are trying to meet other genuine expenditure towards serving MDM in the school.

The Planning Commission conducted a study on implementation of MDM in select districts in some states. As a part of it four districts in AP were also studied. According to this study report during the period 2004-05 to 2006-07 while Rs.2869.76 lakhs were required in Adilabad Rs.2708.68 lakhs were allotted. Out of this Rs.2450.49 lakhs were utilized. This was 90.47 percent of the allotted funds. Similarly, in Anantapur district while Rs.2799 lakhs were required Rs.2758 lakhs were allotted. Out of this Rs.2744 lakhs were utilized. In Srikakulam district while Rs.3378.34 lakhs were required only Rs.2249.01 lakhs were allotted. This was 66.57 percent of the requirement. Out of the allotted funds in this district Rs.2227.91 lakhs were utilized. In the case of West Godavari district while requirement was Rs.1895.6 lakhs Rs.2428.32 lakhs were allotted. This was 128.1 percent of the required funds. Out of the allotted funds Rs.1895.6 lakhs were utilized. Though this was only 78.06 percent of the allotted funds it was equal to its requirement. This shows that in some districts allotment of funds were not in commensurate with their requirement.

In AP during the period 2004-05 to 2006-07 nearly 90 percent of the foodgrains allotted was utilized. At the district level there was some variation in utilization of foodgrains. While in Anantapur, Srikakulam and West Godavari districts all the food grains allotted were utilized in Adilabad district only 16.96 percentage of the foodgrains allotted were utilized. One of the reasons for not utilizing the allotted rice was less number of working days. While estimating the rice allotment 220 days of work is assumed. But actual number of days the schools functioned

³⁹ M. Venkatarangaiya Foundation (MVF) in collaboration with Foundation for Rural and Social Development (FRSD), Andhra Pradesh Academy of Rural Development (APARD) and SWC Consulting conducted a social audit of MDM in five districts in Andhra Pradesh covering 261 schools

were less. According to the Concerned Citizen's Collective's study the number of working days ranged from 195 days to 205 days.

According to the existing guidelines the APCSC distributes rice to the schools through Fair Price shops. The Headmasters/implementing agencies receive the stocks as per their allocation. The implementing agencies are responsible for lifting rice from the Fair price shops. Rice so supplied should be stored at school level and they are to be taken care of by Head Master and implementing agencies. But in practice this method is not being followed. Instead of storing rice at the schools it is stored at the fair price shop dealer or at the house of the person responsible for the implementing agency. The Planning commission study found that there was usually a pilferage of foodgrain ranging from 2 to 5 kg per almost every 50 kg bag due to non supply of foodgrain directly to school by the Fair Price Shop dealer (p.26).

The social audit conducted by MVF and its partners showed that in many schools the rice was stored at the agency's or dealer's house, with no transparency, nor accountability to the school. Only in 46.7% of the schools was the rice stored in the school. According to this social audit, "the headmasters in many schools were not properly monitoring the consumption of rice. The stock registers were filled at the end of the month based on calculations of the prescribed quantity rather than registering the actual consumption. It was also seen that, other than a few exceptions, the "green mark" rice provided for mid day meal was not reaching the school. The rice that was actually being used for mid day meal was of inferior quality... Discussions in the village revealed that there is a nexus between those working at the stock point and the ration dealers and the exchange happens even before the rice comes into the school. Release orders (ROs) were not available in most schools making it almost impossible to verify whether the rice supplied for the mid day meal was being properly utilized". (p.6) (reference year)

The guidelines indicate that rice as well as other ingredients should be stored in hygienic store rooms. The Planning commission study found that in AP only 27.5% of the schools have storerooms and out these storerooms 61.53 % were found in good condition. According to the social audit of MVF and its partners in less than 50% of the schools of which social audit was conducted, rice was stored in the school (p.21). But in this report it is not clear whether there is a

separate room for storing rice, and if it was there its condition. Apart from the store room kitchen shed is very important for the MDM scheme.

According to the National University of Educational Planning and Administration in the year 2009-10 in AP only 32.84% of the schools have kitchen sheds. According to the Planning commission's study only 37.5% schools have kitchen sheds and in the schools where kitchen sheds are available only in 76% of them are in good condition. According to the social audit of MVF and its partners kitchen shed was available only in 52% of the schools studied and in 33% of the schools the cooking was done in the kitchen shed. Even the available kitchen sheds were of bad quality with poor ventilation. In the remaining schools cooking was done either in the open air or in the cooking agency's house.

Except in some urban areas where big organisations like Naandi and ISKON are involved in cooking at a central place and distributing cooked food to schools in all other places usually women self help groups (SHG)/DWCRA are selected as implementing agencies to cook and serve food at the schools where MDM is being implemented. Under the present system while rice is provided by the government other items like red gram, cooking oil, tamarind and vegetable need to be purchased by the group members from the market from the funds allotted by the government. But these funds are barely sufficient to meet this expenditure and no surplus is left for the members who are involved in cooking. In order to earn something usually the DWCRA members supply less quantity than prescribed. The persons responsible for cooking are given Rs.3.25 per student. In this while Rs.3 are towards purchase of all items other than rice, 25 paise are for the service rendered by the persons entrusted with cooking. This 25 paise per student was not sufficient for the women who attend to the MDM work at the school. The Planning Commission study also found that it was difficult to hire a cook with such a small honorarium (p.48). To assure a certain return to people engaged in providing hot cooked meal the state government has developed guidelines for cooks and helpers of what wages they will be paid and this will be determined according to the Planning Commission assessment of 1.07 cooks and 0.07 for helpers and per school.

The following are the observations flowing from social audit of MDM conducted by MVF and its partners in AP: “The cooking agency in most of the schools were women SHGs. Usually one or two women took the responsibility of cooking and the agency was given in their name, with the bank account also being opened in their name. Although, these people were members of an SHG there was no formal relation between the self help group and the cooking agency as such. In some places, it was also seen that while the agency was in one person’s name they had employed another person to do the cooking and were paying him/her a daily or monthly wage. In Narnoor mandal, Adilabad district there was a system where although the agency is in the name of local women, it is completely under the control of the headmaster who pays the women a monthly wage of Rs.500 a month. In many schools, such as in Kurnool, the agency was with persons close to those in power, the factional leaders or sarpanchs, making it difficult for the community to monitor them”.

“Most of the cooking agencies were poor illiterate women for whom this was the main source of livelihood. There was no system of accounting practised by these women. They spent some amount on the cooking costs such as pulses, vegetables, oil etc. and saved some for themselves. Many felt that the present allocations were not enough to provide a good quality meal especially they found it tough to serve eggs twice a week and make a decent living for themselves. In all the districts (except Kurnool since the last four month) there was roughly a three months delay in the payment of bills. Because of this the cooking agency had to take a cash loan or buy ingredients on credit. Many times the interest rates were high. While the cooking agencies made all arrangements to ensure that there is no disruption in the meal, the delay in payment affected the quality of the meal”. (p.7)

Government of AP’s guidelines mention that the menu for the MDM in the state is prepared on the lines suggested by NIN and that its calorie and protein content is more than the one stipulated by the central government. The social audit brings out the fact that there was no weekly menu being followed. The standard meal being served was that of rice and watery dal or sambar. There were very few vegetables being given very little oil added and eggs were rarely given (p. 8)

The members of the DWCRA groups in the villages are finding it difficult to provide quality meals with the present fund allocations. They purchase ingredients other than rice from local merchants on credit. Because of the delay in receiving funds from the school education department they have run in to huge debts. Women members of these groups find it difficult to retain any surplus towards their wage from this meager sum allotted per student. Added to this there is delay in reimbursing the costs incurred by the implementing agencies in carrying out the MDM programme. The delay in payment of bills ranges from four to seven months.

A news report in The Hindu dated December 3, 2009 from Vizianagaram district showed that the DWCRA members were neck deep in debts. Elamanchili Simhachalam, mid-day meal organiser, at G. T. Peta in Mentada mandal lamented that the scheme had pushed her into a debt trap. She had borrowed over Rs.20,000 to feed schoolchildren. There was inordinate delay in settling her bills. Majji Varalakshmi of Chodamma Agraharam in Poosapatirega mandal expressed inability to run the school kitchen because the sowcar on whom she depended till date for essentials refused to supply any more on credit. Ijjirowthu Pydamma of Cheepurupalli borrowed Rs.30,000 for effectively running the scheme. She said that though the government had not been releasing grants, district officials had been pressuring her to serve eggs twice in a week.

The guidelines for implementation of MDM envisages committees at different levels to monitor its implementation at regular intervals. These guidelines also envisage active participation of local bodies particularly panchayat raj institutions in the implementation of MDM. The Planning Commission study shows that only in 27% of the schools local bodies are involved. This study also found that the committees constituted at mandal and village level are not holding any regular meetings to coordinate and monitor the programme at the block/village level. (p.37) Lack of proper monitoring of the MDM by the committees constituted for this purpose and lack community participation through local bodies is shown as one of the reasons for inefficient functioning of MDM.

The Concerned Citizens Collective, a Hyderabad based NGO examined the functioning of MDM in 127 villages spread across five districts from different regions of the state commented as follows on community participation in MDM, “There is a general disinterest amongst parents in

monitoring the quality of the MDMS as most parents surveyed expressed their satisfaction that their children were getting a hot cooked meal in the afternoon. Children who were interviewed in the survey reported that their parents expressed no interest about their mid day meals at school. Parents who were interviewed reported that the mid-day meal scheme had no tangible benefit for them, reflecting a lack of awareness about its benefits. It must be noted that most children in government schools are from a lower caste background, especially from the SCs and STs whereas children from BC and OC backgrounds attend private schools”. Given the grassroots nature of the programme successful MDM requires close attention of local PRI representatives and children’s parents. At present, as shown above, involvement of both of them is lacking.

References:

- M. Venkatarangaiya Foundation (2008), “A Report on Social Audit of the Mid Day Meal Scheme in Five Districts of Andhra Pradesh”, Hyderabad.
- Planning Commission (2010), “Performance Evaluation of Cooked Mid Day Meal (CMDM)”, New Delhi.

Case Studies on Mid Day Meal Programme:

Akshaya Patra Foundation

Andhra Pradesh is one of the eight states in which the Akshaya Patra Foundation has taken up implementation of the government's mid day meal scheme. The Akshaya Patra Foundation's headquarters is located in Bengaluru. Started as an ISKCON Bangalore pilot initiative in June 2000, Akshaya Patra was formed into a Foundation in October 2001.

As a secular organisation the Akshaya Patra Foundation does not discriminate the students on the basis of caste, creed and community. Its implementation of the government's mid day meal is confined to government schools which already have a secular policy.

In spite of high economic growth, a large number of school going age children are not to be found in schools. Dire poverty and high malnutrition are coming in the way poor children accessing schools. To facilitate the education of such needy children the Akshaya Patra Foundation provides mid day meals in schools in partnership with the Central and respective state governments of India. The Akshaya Patra Foundation's vision is to ensure that no child in India is deprived of education because of hunger. Through this programme the Foundation is working towards ending hunger and create a human resources pool that will catapult India into the league of developed nations. This is considered as one of the largest school meal programmes in the world.

The Akshaya Patra Foundation considers the mid day meal programme as more than just a school meal program. For them it is a hunger-eradication program and an education program. It is a social project working towards nation building. It is a public private partnership to see that hunger among children is completely eradicated as India moves towards becoming a developed nation. The Foundation implements the mid day meal programme as a public private partnership. It works with the state government in carrying out the programme. The state government's allocations are not sufficient to provide a quality meal. The funds provided by the state government meet only about 60% of the total cost of the meal and distribution. The Foundation raises the remaining funds as donations from corporate organisations and individuals. Through this the Akshaya Patra Foundation is attempting to leverage the skills and resources of the

private sector for the greater good. The foundation is implementing this programme both in rural and urban areas.

The Foundation uses centralized, automated kitchens for cooking food. The cooked food is then distributed to schools through special purpose vehicles. Due to extensive mechanization of the kitchen, the program is expected to offer standardized, high quality, hygienic meals to school children. Where the environment is conducive, the program has incorporated a centralized approach, backed by technology-driven processes. In other situations, it has adopted a decentralized mode of operations, to cater to the needs of the local community. The Centralized kitchen model is technology-intensive. The automated kitchen facility marries the new technology to social needs. In all the places where the centralized model is adopted, the Foundation has created infrastructure with funds raised from corporate and individual donations. The automated kitchen facilities include stainless steel cauldrons, steam boilers, exhaust system, conveyor system, high-speed cutting machines, etc. Covered stainless steel containers that retain heat are used to pack food. The packed food is transported using custom-built vehicles. In Andhra Pradesh Akshaya Patra Foundation is serving MDM in 240 schools spread over 8 mandals in Medak district. All these are located in villages. This year the total students being served under MDM by the Akshaya Patra number 37,134. The meals to be served is cooked at a central kitchen located in Patancheru Industrial Area which is part of Medak district, but also forms part of Hyderabad Metropolitan Area. All the villages being covered under MDM by Akshaya Patra Foundation are within 50 kilometers radius from the centralized cooking centre located at Patancheru.

The menu of meals served under MDM consists of rice and sambar prepared with dal and vegetables. Every working day the cooking centre uses about 3,200 kg of rice, 500 kgs of dal and 600 kgs of vegetables. While rice for the meals is being provided by the state government through the Civil Supplies Corporation other ingredients like red gram, cooking oil are being procured from the traders in the city. The traders are selected through the tender bidding process. This whole process is undertaken under supervision of the Akshaya Patra Foundation's head office located in Bengaluru. In the case of vegetables also similar process is undertaken. Though the Foundation is supplying meals to schools located in the villages they are not procuring

vegetable from the farmers in these villages. The organizers also are not having any plan to procure vegetables from the farmers in the near future. Here it also to be noted that the Medak district produces some of the best quality red gram. The organizers may consider procuring the dal and other ingredients from the farmers directly if the price at which farmers would like to supply their produce to Akshaya Patra should be at par or even lower than the price arrived at through bidding and it should be delivered by the farmers at the central kitchen.

Like other service providers cooking and serving the MDM Akshaya Patra Foundation is also facing the problem of delayed bill payment. They were not paid by the government for the last 7 months. Besides this, according to Akshaya Patra Foundation the preparation and distribution of MDM costs more than the funds provided by the government. In Andhra Pradesh while it costs them Rs.7.22 per meal the amount that they receive from the government is Rs.4.71 per meal including the rice provided by the government. Per child they face a deficit of Rs.566 in an year. Though the menu followed by Akshaya Patra Foundation and SHGs is similar the cost difference is on account of quality of food provided. The organizers say that they managed to maintain good quality, hygiene and nutritional value of food without compromising on cost. This deficit is met by the Foundation through contributions from well wishers.

Naandi Foundation

Naandi Foundation is a Hyderabad based organisation promoted by industrialists. The Board of Naandi Foundation is chaired by Dr. Anji Reddy of Dr. Reddy Labs and another important member of the Board is Mr. Anand Mahindra of Mahindra and Mahindra Company. It was founded in the year 1998 with a vision to make poverty history. Child Rights is one of the broad areas in which the Foundation is working. Its interventions in mid day meal (MDM) programme are located in this broad area. MDM scheme being run from school, particularly those in the urban setting is facing infrastructural bottlenecks. The schools in the urban areas are located in congested buildings. There is not enough place even for students to sit. Let alone enough place to set up a kitchen to cook meals for hundreds of children. Unlike in villages open spaces is also scarce to come by in urban areas. Space is required even to store rice and other ingredients and also cooking utensils. Any solution that addresses the mid day meal programme in urban areas has to address this space constraint seriously. In rural areas in most of the schools implementation of MDM is taken up by SHGs. But in urban areas there is no such well knit SHG network. Some other innovative organisation need to be visualized to take this programme forward. It is in this context that the centralized kitchen idea becomes relevant. But the centralized kitchen throws up the problem of huge cost of cooking infrastructure for cooking the meals and also transport logistics to take the cooked food to different schools in the urban areas/city. Here the public private partnership (PPP) becomes relevant.

The centralized kitchen/cooking system pioneered by Naandi Foundation holds out a solution to all the three above constraints. The MDM programme being implemented by the Naandi Foundation on behalf of the government of Andhra Pradesh can be described as an exercise in PPP. In partnership with state government and through corporate donations Naandi Foundation runs the MDM kitchen. The state government gives the land and provides cereals from the FCI godowns along with a minimum recurring cost per child per meal. Necessary equipment and technology that will cook, pack and distribute is purchased for the kitchen by Naandi by raising resources from individuals, corporations and philanthropists.

Naandi Foundation entered in to an MOU with the Government of Andhra Pradesh in 2003 to implement the MDM programme in the twin cities of Hyderabad and Secunderabad. The

programme was formally launched on 21 February 2003. As a part of it the state government allotted 2 acres with built up area of 14,000 sq ft in Uppal industrial estate in the city for setting up the centralized kitchen. Besides land Naandi Foundation also receives rice and funds towards other ingredients for cooking the MDM on per child basis from the state government, as is the case with other implementing agencies. The centralized kitchen set up in a factory setting was expected to offer the benefits of cooking the meal under strict supervision and hygienic conditions for a large number of school children without compromising on the nutrition and quality of food. The centralized cooking was also expected to lead to economies of scale.

It is also an answer to bring down time spent by teachers in overseeing the MDM in the schools and as a result teachers have more quality time to spend with the children.

Naandi Foundation serves MDM in schools located in urban setting. It can be described as a pioneer in providing MDM through a centralized process unlike other implementing agencies, mostly SHGs each serving one school. Naandi Foundation is serving 891 government and government aided schools in the twin cities of Hyderabad and Secunderabad serving 1,15,000 students.

Mid Day Meal consisting of rice and sambar (prepared with dal and vegetables) prepared at the central kitchen is delivered to the schools between 09:30 am and 12:00 noon. A fleet of mini trucks are engaged to transport these meals packed in stainless steel containers. These mini trucks ply on pre-determined routes selected to bring down the cost of distribution to schools located in different parts of the twin cities.

Along with rice and sambar children are also served egg once in a week and a fruit once in a week. Besides this, children are being given four fortified biscuits twice a week as a part of mid-day meal programme. This is made possible with collaboration between Naandi Foundation, Britannia Biscuits and the Global Alliance for Improved Nutrition (GAIN). These special biscuits are fortified with the iron and other much-needed micronutrients for growing children. The iron-fortified biscuits are supplement to the ongoing mid day meals programme. These biscuits help in improving physical health, immunity, concentration, memory, learning ability.

The Naandi Foundation obtains rice needed under MDM from the godowns of Food Corporation of India (FCI) on the basis of prior agreement. This rice comes free of cost to the foundation. Other cooking ingredients like salt, pulses, cooking oil and vegetables are procured from wholesale dealers at market prices. Every day about three tonnes of pulses and five tonnes of vegetables are used in cooking.

Farming community is not involved in the procurement of the ingredients like red gram and vegetables. As the Naandi Foundation basically caters to the students in urban areas and do not have immediate contact with rural community the direct procurement of ingredients from the farming community may not be possible.

Naandi Foundation's centralised kitchen model under PPP attempts to address bottlenecks in implementation of MDM in urban setting. This model is also hoped to bring down drain on teaching time faced by schools in implementing MDM in their schools.

Ramakrishna Upper Primary School (RUPS), Yellammabanda

NGO Asha Hyderabad's initiative

(A note prepared by Asha Hyderabad)

Ramakrishna Upper Primary School (RUPS), an initiative by Lions Club takes efforts to educate poor and needy children in and around Kukatpally area, Hyderabad. A majority of the children in the school belong to the local slum area and are mostly first generation literates. Parents of most of these children are employed in the quarry or work as housemaids. Initially there was a lot of resistance from parents to send their children to school mainly because of their poor socio-economic background. Generally, male children used to accompany their fathers to work in the quarries and girls assist their mothers at home and in the work place. Parents were reluctant to send their children to school because of the expenditure involved in buying text books, uniform fees, food, etc.

RUPS started with less than 100 students. When Asha Hyderabad (Hyderabad chapter of the NGO Asha) an organisation committed to children's education came to know of this initiative, it volunteered to support the school financially. The immediate need then was to first understand and overcome the basic difficulties the school faced with the children as well as the parents. It was observed that children were suffering from malnutrition. Also they had problems arising out of lack of hygiene. Asha Hyderabad then organized a health camp in association with Lions Club members. It was revealed that most of the children were suffering from nutrition linked illnesses. It was also found that many were affected with lung problem while few had minor skin related problems.

Since academic year 2004, Asha is actively involved in the activities of this school and runs mid-day meal programme for all the children by mobilizing funds. The mid-day meal programme at RUPS became Asha Hyderabad chapter's first real project. It has also taken the responsibility of meeting a part of staff's salary. The school has been able to function well with un-interrupted and systematic funds mobilized by Asha Hyderabad towards mid-day meal programme and teachers' salaries. Asha Hyderabad organizes programmes to mobilize funds for running the school and mid day meal programme. Many corporate sectors have come forward to help the

mid-day meal programme at RUPS; Phase Forward is one such company. Phase Forward is the donor of the mid day meal programme for the last three years. The company donates a lump sum amount for the entire programme. Last year expenses related to mid day meal was around Rs 6 lakh. The total number of children during the last academic year was 240 and the cost per child was Rs 2500.

Asha Hyderabad runs the mid day meal programme in RUPS through a caterer on contract basis. The meal is prepared by a cook fixed by the caterer. Asha Hyderabad has appointed a helper to clean the vessels and keep the school premises clean. Food served to the children in the school varies on daily basis but the same menu is repeated every week. The weekly menu generally comprises of rice with one curry or vegetable, *jeera* rice with *raita*, vegetable *pulav* with *raita* and rice with *dhal*. Food is prepared using purified water and children are given purified water to drink. Attention is paid to clean hygienic eating habits and good behavior among the school children. The children are also advised to keep the surrounding area clean and neat. They are encouraged to sit in a row and eat without spilling the food.

Due attention is also given to the academic performance of the children. To ensure regular monitoring and guidance of their studies, regular class tests and revision classes are conducted by the teachers. The teachers at RUPS also play an important role teaching them basic etiquette and good values. Volunteers from Asha-Hyderabad visit the school and encourage the students to widen their knowledge and guide them in shaping their future. Lions Club provides uniform and text books to the children; a local doctor is appointed to conduct periodic health check-up.

The mid day meal programme by Asha Hyderabad has definitely made an impact on both the health and well-being of the child. The mid-day meal programme encourages the parents to send their children to school regularly. There has been great improvement in their daily attendance. Dropout rate has also considerably decreased which was very high during the initial year of the school. So much so the school which started with 100 students had 240 children during 2010.

Chapter 5: The School Feeding Programme in Odisha

*V.B. Athreya*⁴⁰

The State of Odisha, located in the eastern region of India, just north of the State of Andhra Pradesh, presents quite a contrast to the State of Tamil Nadu. Odisha is a State most of whose social and human development indicators fall well below the all India average whereas Tamil Nadu is an above average performer in respect of most such indicators. Table 5.1 below provides some socio-economic indicators for Odisha.

Table 5.1: Some Social Indicators for Odisha and India

Indicator for Odisha	Unit	Source and Year	Odisha	India
Literacy Rate Rural	%	Census of India, 2011	70.78	68.91
Literacy Rate Urban	%	Census of India, 2011	86.45	84.98
Literacy Rate Persons	%	Census of India, 2011	73.45	74.04
Infant Mortality Rate	Infant deaths per 1000 live births	SRS, 2009	65	53
Institutional Delivery	%	NFHS-3, 2005-06	39	41
Life Expectancy at Birth	Years	SRS, 1999-2003	58.7	62.7
Drop-out Rate, Primary School, All	%	Annual Report, 2006-07 Department of School Education & Literacy, GoI 2004-05	39.34	29
Drop-out Rate, Primary School, Scheduled Castes	%		44.58	34.21
Drop-out Rate, Primary School, Scheduled Tribes	%		58.62	42.32
Drop-out Rate, Upper Primary School, All	%		61.95	50.84
Drop-out Rate, Upper Primary School, Scheduled Castes	%		66.00	57.26
Drop-out Rate, Upper Primary School, Scheduled Tribes	%		80.06	65.87

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It should be clear that Odisha is one of the more backward States in the Indian Union, with practically all its social development indicators below the national averages. It is true that there has been some progress over the years in the performance of Odisha with respect to social development. In fact, the Census 2011 figures for literacy rate (among the 7 plus population) suggest that Odisha's rates are marginally better than the rates for India as a whole. Nevertheless, its overall ranking among the Indian States is still quite poor. It is bracketed with states such as Bihar, Chattisgarh, Jharkhand, Madhya Pradesh Rajasthan and Uttar Pradesh as being among the laggards in development.

The Census of India 2011 puts the provisional population of Odisha at 41.95 millions, of which only 16.68% is urban, a marginal increase from 14.99% in 2001 when the previous population census took place. It is thus a largely rural State. Its overall sex ratio is 978 females per 1000 males. The state has a low child sex ratio (CSR) of 934 girls to 1000 boys in the 0 to 6 years age group, and the urban CSR is even lower at 909. A matter of serious concern is the steady fall in the CSR from 1035 in 1961 to 995 in 1981 to 953 in 2001 and further to 934 in 2011. Females thus face a distinct relative survival disadvantage in Odisha, especially in urban areas. This largely rural state is divided administratively into 30 districts, and has 51,349 far flung villages. Given its topography of hills and plains, and relatively poor transport infrastructure in terms of roads, railways and public mass transport facilities, the state faces logistic problems in respect of most large scale public programmes, including the school feeding programme. The fact that the socially most disadvantaged group-namely scheduled tribes-are to be found in large numbers in the more inaccessible hilly regions is also an important challenge.

The State is undergoing a demographic transition. The overall rate of growth of population between 2001 and 2011 is just under 14%. The population under 6 years of age has actually declined in absolute terms between 2001 and 2011 by a little over 6%, with the decline in rural areas being close to 8%. These figures suggest a demographic transition in progress, although the total fertility rate (TFR) at 2.4 in 2009 is still well above the figure needed for population stabilization.

Against this broad background, let us turn to an analysis of the school feeding programme (SFP) in Odisha.

The SFP in Odisha

As noted in the chapter on India, the central government initiated in 1995 a programme called the National Programme of Nutritional Support to Primary Education (NPNSPE) under which nutritional support was to be provided to children in primary schools across the country. It may be recalled that the objective of the programme was to promote universalization of primary education and also enhance the nutritional levels of students in primary classes.

However, many States did not implement the scheme, citing fiscal constraints. Odisha was one of the states that did not implement the scheme immediately. In 2001-02, the state government of Odisha started implementing a programme of provision of cooked meals in schools, but without covering the entire state. In July 2001, the state government started a programme of provision of a cooked meal to the primary school children in all government and aided primary school children in specific regions of the state. The programme covered primary school children enrolled and attending in the government and government-aided schools in the rural areas of 8 districts consisting of 80 blocks including 44 blocks coming under the integrated tribal development authority (ITDA) and collectively known as the KBK districts.⁴¹ It also covered primary school children in another 74 ITDA blocks of the remaining districts. In the rest of the state, the government implemented a scheme of distribution of 3 kilograms of rice per month as dry ration to each primary school student. This meant that a large part of the state remained uncovered by the scheme of provision of hot cooked meals at school.

Interestingly, in a letter dated June 22, 2001, the Chief Secretary to the government of Odisha conveys the following decisions of the government⁴²:

1. The system of hot cooked meal in the primary schools under the Mid Day Meal (MDM) Programme will continue in the rural areas in the districts of Kalahandi, Nuapada,

⁴¹ KBK stands for the original Koraput, Bolangir and Kalahandi districts out of which these eight districts have emerged.

⁴² Accessed at

<http://www.wcdOdisha.gov.in/download/Revised%20guidelines%20for%20implementation%20of%20Mid%20Day%20Meal%20Programme%20in%20the%20State%20with%20effect%20from%201.7.2001.pdf> Emphasis added.

Koraput, Nawarangpur, Rayagada, Malkanagiri, Bolangir and Sonepur (all KBK districts); and ITDP blocks in other districts.

2. *In all other areas besides these, including urban areas where the hot cooked meals under MDM programme had been continuing, only dry ration of 3 kilograms of rice per eligible student per month will be provided. No dal (dal is the Hindi word for pulses) will be given.*
3. All cooks and helpers engaged earlier in the cooked meals programme are to be disengaged.

It would therefore appear that between 1995-96 when the National Programme of Nutritious Support to Primary Education (NP-NSPE) was initiated and June 2001, the state of Odisha was implementing a cooked meals programme in areas additional to the ones to which the programme was restricted after June 2001. However, no explanation is available in official documents that the present author was able to access as to why the cooked meal scheme was given up and a switch made to provision of dry rations in 2001.

A small extension of the cooked meals scheme to the backward district of Boudh followed a year later in 2002. But even as late as August 31, 2004, only half the blocks-157 out of 314-had been covered by the scheme of provision of cooked meals while the remaining half was covered under the dry ration scheme. Thus, nearly three years after the Supreme Court orders of November 28, 2001 mandating the provision of cooked meals to children in government and aided schools, and several months after the Court's more detailed orders of April 2004, Odisha was yet to implement the scheme of universal provision of cooked meals in primary schools. This changed with effect from September 1, 2004. From that date, Odisha is implementing a school feeding programme of universal provision of cooked mid-day meals to children in government and government-aided primary schools and children enrolled in centers under the education guarantee scheme (EGS) and alternative and innovative education (AIE) scheme.

Given its poor record in terms of school attendance as well as the poor nutritional status of its children, Odisha is a State where a universal and effective school feeding programme can make a big difference. Data from the third National Family Health Survey (NFHS-3) pertaining to

reference year 2005-06 for Odisha shows that 38.3% of children under 36 months of age were stunted and 44% were underweight for age, while as high a proportion as 74.2 % were anaemic. Similarly, the drop-out rates in 2004-05 were quite high at 39% for all primary school students, 44.58% for scheduled caste students and 59% for scheduled tribe students. On both the grounds of promoting schooling and on the grounds of nutritional improvement in children, Odisha is thus a prime candidate for a school feeding programme. It is unfortunate that the political will has been conspicuously absent in this regard and that it required strong judicial intervention for a universal school feeding programme to be put in place.

Slow and chequered progress towards a universal SFP

In 2001-02, the programme in the state of Odisha was reaching 41467 schools in 314 blocks benefiting 4,423,250 children. By 2003-04, the numbers rose to 51,931 and 4,631,826. This was mostly with dry rations of food grain, and not through a school feeding programme providing hot cooked meals at school, except in the KBK districts and the ITDA blocks as mentioned earlier.⁴³ However, in 2008-09, despite having been extended to upper primary schools, the scheme reached only 4,410,700 students consisting of 3,282,700 in primary schools and 1,128,000 in upper primary schools.⁴⁴ Progress has thus been quite slow and uncertain.

The universal SFP in Odisha, functioning since September 1, 2004, has been under the department of women and child development (DWCD) of the State government. The DWCD department has been the nodal agency for the programme until recently. However, a decision was taken during May 2011 to transfer the nodal responsibility for the scheme to the Department of School and Mass Education (DSME), though the actual transfer had not taken place at the end of July 2011. One of the possible reasons for the transfer of the scheme from DWCD to DSME may have been allegations of a scam in procurement of pulses for the scheme. It is clear that the

⁴³ In 2002-03, the number of schools and the number of children receiving cooked meals at school were respectively 18,599 and 1,523, 316. The corresponding figures for 2003-04 were 24,584 and 1,639,300. In both years, only 155 blocks out of 314 in the state were serving cooked meals at school. The provision of dry rations covered 27, 347 schools and 2, 992, 526 children in 2003-04. (Anima Rani Si and Naresh Kumar Sharma, 2008).

⁴⁴ According to the Odisha government's DWCD annual report for 2008-09, the coverage for the financial year 2008-09 was 46,89,829 students in 66,230 Primary Schools and 17,77,230 students in 18,930 Upper Primary Schools. The figures in the text are taken from a reply to unstarred question number 610 in the Lok Sabha (Lower house of the Indian Parliament) given on 21-10-2008. If one were to go by the Odisha government's figure, it suggests some rise in enrolment.

scheme has had a chequered history in Odisha. Not only has there been lack of clarity and implementation weaknesses in the programme, there have also been shocking instances of social exclusion practised in some villages with regard to the scheme. Thus, a news report dated January 21, 2010 tells us that, in a village called Sanamarichapalli, not far from the district headquarters town of Kendrapara, some members of the village education committee (VEC), an institution at the village level that is officially mandated to monitor the programme, stopped the cooks from cooking the school meals on the ground that they belonged to the scheduled castes (SCs).⁴⁵ Two cooks belonging to the scheduled castes were locked up inside the school kitchen until they were rescued by the school headmaster. The report goes on to quote the school headmaster as saying: ‘Upper caste parents insist that some of the cooks should be removed.’ It also talks of how government agencies in the state had stopped recruiting *dalit* cooks, causing the National Human Rights Commission to intervene.⁴⁶ While untouchability and other discriminatory practices are not entirely absent in the other two states-Tamil Nadu and Puducherry- whose SFPs have been described and analysed elsewhere in this volume, the scale of such occurrences is definitely much smaller. This state of affairs only reinforces the importance of ensuring universal education in Odisha, a task in which SFPs can play a crucial role.

Programme Administration

Although a decision has been taken very recently (July 2011) to transfer the nodal responsibility for the implementation of the school feeding programme in Odisha to the DSME, for the purpose of this paper, which basically covers the period from 1995-96 to 2010-11, it would only be appropriate to treat the DWCD as the nodal department. The administrative arrangements in place during the period under review can be described briefly as follows, drawing on the annual

⁴⁵ Scheduled castes, also called *dalits*, have historically been oppressed under the dominant caste system in place among the Hindus. They have been subjected to the atrocious practice of untouchability for many centuries under ritual rules of ‘pollution’. Though the Indian Constitution explicitly makes the practice of untouchability a crime, it is still the norm in many parts of rural India. It is a confirmation of Odisha’s social and economic backwardness that incidents of the kind reported here are not uncommon. The report discussed in the text can be accessed at http://zeenews.india.com/news/state-news/Odisha-villagers-stop-mid-day-meal-cooked-by-dalit-women_597834.html. It has been reproduced as Box 1 in this paper, see p.12 below.

⁴⁶ We learn that ‘Though the School Education Department initially did not allow Dalit women to cook mid-day meals on the grounds that upper-caste children might skip the meals, it gave in after the National Human Rights Commission last year asked the administration to stop the practice.’ See <http://www.indianexpress.com/news/Odisha-villagers-stop-midday-meal-cooked-by-dalits/570249/0>

report of the DWCD, the recent (March 2011) guidelines of the DWCD and other Odisha government sources.

The nodal agency for the school feeding programme at the national level is the ministry of human resource development of the government of India. It provides rice free of cost at the rate of 100 grams per child for 210 days in a year for primary school students. The free allocation is at the rate of 150 grams per child for the upper primary students. By 2008-09, each child was receiving per day 473 calories and 14.2 gm of protein in the primary level and 690 calories and 20gm protein in the upper primary level. The government of India also provides rupees 75 per quintal of rice as transportation charge from the depot of the Food Corporation of India (FCI) to the school. In 2008-09, the government of Odisha provided funds for the purchase of dal (pulses), vegetables, oil and condiments, and for meeting a part of the transportation charges at the rate of 64 paise (1 rupee equals 100 paise) per student. The government of India provided in 2008-09 rupees 1.58 for each primary student and Rs 2.10 per upper primary student as daily cooking cost. The total budgetary provision in Odisha for 2008-09 for this scheme was Rs 5172 million.

Coverage and costs have risen over the years. According to the new guidelines of March 2011, there were nearly 6 million children in primary and upper primary schools in Odisha covered under the cooked mid-day meal programme in 2011. The cost per meal was estimated at Rs 3.30 for primary and Rs 4.92 for upper primary students. This was shared between the government of India and the state government in specific ways. The revised implementation procedures in effect from April 2011 require the district collector to lift the allocated grain from the government of India supplied by the FCI through engaging transport contractors to transport the rice to schools.⁴⁷ For all other food items such as dal, condiments, soya chunks and eggs, procurement has been decentralised to the local level. The new guidelines emphasize that district collectors must make all efforts to hand over cooking responsibilities to self help groups (SHGs) in all the schools before the start of the financial year 2011-12, which is the first of April. The guidelines provide detailed instructions on handling finances at the school level. Local procurement is to be

⁴⁷ The same is the case for rice supplied to the anganwadi centres under the programme of Integrated Child Development Services (ICDS), but that need not detain us. For those unfamiliar with the administrative structure in India, the district collector is the chief administrator for the state government in a district.

done by the SHGs or the school management committee (SMC), or in some cases, the village education committees (VECs).⁴⁸ Headmasters or teachers are not to be involved at all in procurement, cooking or implementation of the cooked meal programme, except that they must monitor the implementation at the school level to ensure that quantity and quality norms are met, hygiene is strictly observed both in cooking and serving the food and by the children consuming the food. They must also ensure that entitlements of children are displayed prominently in the school premises and the cook and helper are given periodical health check-ups. The guidelines specify the daily menu. The quantities and the nutritional provisions have been enhanced to ensure that norms are met and there is more diversity in the meals over the week. The guidelines also specify the remuneration for the cook and the helper, and the procedures for maintaining proper records of both physical stocks and financial flows. The decision on hiring of the cook and the helper is with the SHG or the SMC or the VEC at the school level. There are also financial provisions and norms for the construction of kitchen sheds and for cooking utensils which the guidelines specify. Kindly refer to the case study-1 of SHG Managed Mid-Day Meal Programme in Gadagundal, Koraput District, Odisha

Finally, while the guidelines specify norms and procedures, they also state that district collectors can implement the guidelines in a flexible manner to ensure the achievement of scheme objectives in specific local contexts.

An Assessment

There is no single comprehensive official or scholarly assessment of the SFP in Odisha.

One evaluation study of the MDM scheme in the KBK districts of Odisha, based on secondary data from the government of Odisha and primary surveys in 48 schools from 25 blocks located in the KBK districts, notes that there has been substantial improvement in school attendance since the inception of the scheme.⁴⁹ It states that ‘...the dropout rate since inception of the scheme has also decreased in KBK districts as a whole. This decrease in dropout rate is particularly noticeable in Bolangir, Rayagada and Sonepur. In Bolangir, for example, the dropout rate of

⁴⁸ Sometimes, the School Management Committee (SMC) is used interchangeably with the School Management and Development Committee (SMDC) in official documents of the government of Odisha.

⁴⁹ *Evaluation of the Mid Day Meal and Emergency Feeding Programmes under the Revised Long Term Action Plan*, done by D.J. Research and Consultancy ‘on behalf of Planning and Coordination Department of the Government of Odisha’, no date, not earlier than 2008 judging by the references cited.

boys, girls, and for both was 52%, 58%, and 55% respectively at MDM scheme inception year 1995-96. These rates have decreased to 28%, 30%, and 29% in 2004-05. In case of Koraput district while there was a high rate of decrease up to 2003-04, a disturbing fact is the sudden increase in the dropout rate in the year 2004-05. In case of Rayagada district primary dropout rate for boys was 53%, girls 62% and for both 57% in the year 1995-96. It is a good sign that the dropout rate is decreasing continuously for both boys and girls in Rayagada district. In the year 2004-05, the dropout rate for boys had decreased to 15%, for girls to 24%, and for both to 19%. In Sonepur district, by the year 2003-04 the primary dropout rate had decreased to 1% in the case of boys and 4% for girls.⁵⁰ According to the study, students, teachers and parents interviewed in the study are generally satisfied with the quality of the meal, though there is also a view that the quality can be improved. The universal view among parents and teachers was that the cooked meal programme had led to increased attendance and not just enrolment. Though all teachers, students and cooks were satisfied with the quality of the rice supplied, there was a problem of storage and therefore of quality deterioration over time, especially in schools with small enrolment. This is particularly so during the rainy season. The problem is more acute with dal, where the immediate post-harvest supply is of good quality, but with poor storage, deterioration is rapid. In schools where kitchen gardens are maintained, the meal becomes enriched with locally grown vegetables and this is especially the case with residential schools. Fuel for cooking is a major problem with the budgetary provision for this being very low. Often, cooks end up having to do a great deal of unpaid work to collect firewood for cooking in rural schools. Other issues highlighted by the evaluation study include inadequate provision for cooking utensils, poor conditions of cooking sheds, many of them temporary constructions and hazardous as well, abysmal wages for cooks and helpers, well below the minimum wage norms for the state, and frequent changes in cost and quantity norms resulting in self-help groups (SHGs) entrusted with the on-site management of the cooked meal scheme finding things difficult.⁵¹ Refer to the initiative on Nutritional School Garden in Boliguda Village presented as case study 2.

⁵⁰ Ibid, p.ii

⁵¹ According to the study, the percentage of schools where the daily management of cooking and cleaning was entrusted to SHGs varied across the KBK districts from a low of 37% in Bolangir to a high of 97 % in Nabarangpur, with the remaining six districts ranging between 50% and 75%.

The overall assessment of the study, however, is that the cooked meal scheme had been running well and resulting in improvement in enrolment, attendance, elimination or reduction of class room hunger and in a reduction in drop-out rates.⁵² The weakest part of implementation, according to the study, was that of supervision.

In a study of the MDM programme in Khurda district of Odisha, Anima Rani Si and Naresh Kumar found that ‘...the rate of increase in enrolment during the cooked meal scheme (3.8 per cent per annum) has been much higher compared to the rate of growth of enrolment when the dry ration scheme (1.5 per cent per annum) was in operation ... This was found to be true for enrolment for every class except class IV. The inference is inescapable that when the MDM was introduced as a cooked meal scheme, it did stimulate significant motivation for the students to enrol in the schools.’⁵³ In Khurda district, the programme of cooked meals served in school had been in operation from 1995-96 to 2000-01. Comparing the period 1996-2001, when the cooked meal scheme was in operation with the period 2001-2004 when the dry ration scheme operated, Si and Kumar note that the growth rate of enrolment was markedly higher during the regime of cooked meals for both boys and girls, and especially so for girls. The rates of growth of enrolment for boys were 3.71% and 2.06% per annum for the cooked meal and dry ration regimes. The corresponding rates for girls were 3.86% and 0.91% respectively. Si and Sharma conclude that the MDM scheme in its dry ration form was unable to reduce the gender differential in the school enrolment, though it was being achieved when cooked meals were served. They note further that ‘...the average rate of increase of enrolment during the period of cooked meal scheme was over six times as large as the same during the period of dry ration scheme in the case of ST students....there was a high rate of growth in the enrolment of SC students as well (though smaller than that for ST students). However, once the schools switched over to dry ration scheme, there was actually a fall in the enrolment of SC students.’⁵⁴

⁵²Between 1995-96 and 2004-05, the percentage increase in enrolment in the KBK districts taken together was 68% as compared to the overall increase for Odisha at 34%.

⁵³Anima Rani Si and Naresh Kumar (2008), ‘An empirical study of the mid day meal programme in Khurda, Odisha’, *Economic and Political Weekly*, June 21, 2008, p. 53

⁵⁴*Ibid*, p.53 ‘ST’ refers to scheduled tribes and ‘SC’ refers to scheduled castes. Both STs and SCs are among the most oppressed sections of the rural population of India, with high levels of educational and other deprivations.

The periods of operation of both the cooked meals scheme and the dry ration scheme have seen increase in enrolment of students in primary schools in Khurda district, and this is also true of the state as a whole. Si and Kumar note that provision of cooked mid-day meals in the school improved afternoon attendance in Khurda, going by the testimony of parents and teachers. A majority of mothers of children in the primary schools, when interviewed, preferred the cooked meal scheme to the dry ration scheme. Of 150 parents interviewed, 149 said that the cooked meal scheme had contributed to improved performance by their children in school and 145 said their children had been stimulated by the cooked meal scheme to attend school and study. Only 19 parents said that the dry ration scheme had a similar effect. The evidence strongly suggests that parents prefer the cooked meal scheme to a dry ration scheme. Ri and Sharma conclude that 'Parents' responses indicate that cooked meal had definitely helped in increasing enrolment and attendance. Socialisation of the children was also more effective. The scheme had generated some employment opportunities for the under-privileged sections. According to parents, all the above objectives were achieved only at the time of cooked meals. Dry rations do have certain advantages but these are outweighed by benefits of cooked meals. An overwhelming proportion of households feel that cooked meal is more effective. Indeed, 132 households (88 per cent) felt that the cooked meal scheme should be restarted, and only 18 households (12 per cent) were against the view of restarting of the scheme. On the other hand, only 30 households (20 per cent) hold that dry rations should continue to be distributed.'⁵⁵

Si and Sharma note that the 'supply side' of the cooked meal scheme as it operated between 1996 and 2001, consisting of school authorities and teachers, preferred the dry ration scheme as the cooked meal scheme was disruptive of the teaching process and a great deal of teachers' time was spent on procuring the materials and supervising and managing the cooking and serving and the cleaning up afterwards. Problems also arose from the lack of infrastructure such as separate kitchens, arrangements for storing the rice and dal and other materials, fuel and so on. However, in the post 2004 period, with the revised norms for the MDM nationally, and adequate financial support from the Central government for kitchens, storage structures and other infrastructure including transport arrangements for the rice, the cooked meal scheme has stabilised to a certain extent in Khurda and the rest of Odisha.

⁵⁵ Ibid, p.54

The implementation of the school feeding programme in Odisha in the period since September 2004 differs in several respects from that between 1995 and 2004 when the National Programme of Nutritional Support to Primary Education (NP-NSPE) was in operation. Prior to 2004 September, Odisha had not followed a uniform scheme across the state or across the entire period from 1995 to 2004. Between 1995-96 and 2000-01, the cooked meal scheme was in operation. In 2001, a decision was taken to limit the cooked meal scheme to the KBK districts and the ITDP blocks in the remaining ones. It was only in 2004 September that a uniform SFP came into force in Odisha. Data on enrolment and attendance do suggest that the SFP has helped enhance considerably enrolment and attendance in primary schools. The improvement in enrolment has been greater in the case of STs, and to a lesser extent, the SCs, as compared with the rest of the population. The improvement has also been significantly greater for girls than for boys across the state. Naandi Foundation's Partnership with Government of Odisha in Mid-day meal Programme, Brahmapur, Odisha is presented as another initiative for better implementation of the programme (case study 3).

The SFP in Odisha has faced major problems at both the level of state government policies and on the ground, given the harsh socioeconomic realities of rural Odisha. We have already cited the instance of protests by some caste Hindus against the employment of dalits as cooks in the SFP. (See Box 1 below)

There have been serious allegations of corruption as well, and we had referred earlier to the scam related to the procurement of dal. Box 2 on page 13 provides an extract of a new report in this regard.

Box 1: Caste Discrimination disrupts MDM in Odisha

Kendrapara: The mid-day meal (MDM) in a government primary school in Odisha's Kendrapara district was stopped with a section of villagers registering their protest allegedly against the meal being cooked by women of a particular caste. MDM was stopped at Sidha Marichani primary school at Sanamarichapalli village in Rajnagar tehsil yesterday. Some members of the Village Education Committee (VEC) made their way to the school kitchen and forced the cooks to stop cooking the noon meal, official sources said today. Two Dalit cooks were reportedly locked up inside the kitchen for over an hour before the school headmaster rescued them, they said. Meanwhile, Maa Ambika women self-help group, running MDM in the school expressed unwillingness to shoulder noon meal responsibility. A complaint has been lodged in this regard by the SHG before the Rajnagar block officials. The group alleged that they were being ill-treated because of their caste background. The village has a population of about 700 people of which nearly one-third are Scheduled Castes. "Upper caste parents insist that some of the cooks should be removed. But we cannot change the equation as it's the decision of higher authorities to deploy them for cooking," said school headmaster, Rabindra Nayak.

It is pertinent to note here that the School and Mass Education Department was earlier accused of shutting the "Kitchen" doors for Dalit women on the ground that upper caste children may skip the mid-day meals.

The government agencies monitoring the scheme in the district had allegedly stopped recruiting Dalits as cooks, a senior district official said.

The retrenchment drive of Dalit cooks had triggered a furore with the National Human Rights Commission last year directing the administration to stop the caste-bound practice, he said.

The Women and Child Welfare Department, through a notification, had ordered that the enrolment of MDM cooks in primary schools should show preference towards women from Scheduled Caste and Tribe communities.

Priority should be accorded to widows and destitute women from lower castes, it suggested. PTI*

* PTI stands for Press Trust of India

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In Tamil Nadu, the SFP is implemented through employment of a noon meal organiser at every school, a cook and a helper, which enables reliable delivery of the mid-day meal without any disruption to the teaching-learning process and takes care of both cooking and cleaning and the procurement of materials as well as overall management. In Odisha, however, the responsibility of cooking and cleaning has been outsourced mostly to women's self-help groups. A letter issued by the women and child development department of the government of Odisha in 2005 states: 'The government in Women and Child Development Department have decided to entrust the management of MDM to Women's SHGs as Programme Implementing Agency (PIA). Besides, a PIA can include (i) an NGO running the EGS Center or a school or (ii) in urban areas a NGO working in a given area...or (iii) a willing 'Mothers' Committee, or in the last resort, VEC

(Village Education Committee) /SMDC (School Management-Cum-Development Committee)⁵⁶

This approach of outsourcing key parts of the SFP to non-government entities of varying kinds has also contributed to the disruption in the SFP. With the programme implementation or at least parts of it outsourced in this manner, and without a proper overseeing and monitoring mechanism, it is not surprising that the SFP in Odisha has faced several disruptions on the ground. There seems to be a basic lack of clarity of roles of various players and stakeholders. Worse, in the absence of monitoring systems with well-designed role for the agencies entrusted with monitoring, there is also a distinct lack of accountability as well. This has led, as we saw, to various allegations and scam-like situations, with adverse notice in the mass media. One such instance is given in Box 2 below.

Box 2: Disruptions in SFP functioning in Odisha

Mid-day meal scheme not working in many schools

BHUBANESWAR: Mid-day meal, the largest school lunch programme, which is already in midst of controversy, seems to be not working in many schools in the State.

Women and Child Development department has received at least 42 allegations from different districts where MDM is not being served for several months.

The WCD department has asked district Collectors to probe into the matter and take exemplary actions.

In the meantime, sniffing corrupt practices in the implementation of MDM scheme, vigilance sleuths have conducted raids in four districts and found concrete proof about supply of low quality dal to schools.

As per grievances reaching WCD department, students in Toranpada UP School in Bhadrak district have not been served with MDM for past eight months. Similar is the case with Government Press Colony UGME School, Cuttack Sadar Block where MDM had not been provided for one year.

⁵⁶ Letter No. VI-ICDS-III-69/04-286/SWCD dated 27/07/2005 from the Commissioner and Secretary, Women and Child Development Department, Government of Odisha

With all such weaknesses, however, it appears that the SFP in Odisha has been stabilised. It certainly seems to have wide support among parents and students, from the evaluation and other field studies that have been conducted so far. There has been a significant growth in school enrolment and attendance since 1995-96, at least a good part of which can safely be attributed to the SFP. The gains have been particularly high among the traditionally disadvantaged sections of the population such as scheduled tribes and scheduled castes. It is also clear from various reports and secondary literature that we have cited that the cooked meal programme has had greater impact than the dry ration programme. In any event, this issue has become academic and not of great practical relevance, in view of the directive of the highest court of the land that a hot cooked meal should be served to all students enrolled and present in the government and government-aided primary schools across the country. The scope of SFP has since been widened as a matter of official policy to upper primary students as well in the eligible schools and other educational institutions, namely the educational guarantee scheme (EGS) centres and the centres of alternative and innovative education (AIE centres). Its various programme weaknesses notwithstanding, going by the monitoring reports of the National Steering and Monitoring Committee of the government of India, the SFP in Odisha has also met to a large extent the programme targets.⁵⁷ It seems to us, however, that the SFP in Odisha will be greatly strengthened by emulating the staff structure provided in Tamil Nadu of a noon meal organizer, cook and helper. This would ensure proper delivery of the meal without fail and without any disruption. It would also free teachers from extra-academic responsibilities for the feeding programme and minimise daily loss of time of formal instruction. As with Tamil Nadu, the fiscal commitment on the SFP in Odisha is a fairly modest share of the state's overall government expenditure and a very minor share of the state's net state domestic product.

⁵⁷ PowerPoint presentation on Odisha in the PAB-MDM meeting of 10-05-2011, accessed at the MHRD, GoI site.

Case Study 1
SHG Managed Mid-Day Meal Programme in Gadagundal
Koraput District, Odisha
Tusar Ranjan Nayak⁵⁸

Government of Odisha has always had a policy of encouraging Self Help Groups (SHG) of women to be actively involved in the implementation of Mid-Day Meal Programme in the State. Since March 2011, with new guidelines has been issued by Women and Child Development Department for the implementation of mid-day meal programme, the role envisaged for SHGs gained further prominence. The guidelines clearly specify that government administration should take efforts to appoint SHGs to run mid-day meal programmes in all eligible schools. In this context, an account of SHG managed mid-day meal programme in a school in Gadagundal village of Koraput district in the state of Odisha is discussed.

The upper primary school of Gadagundal was established in the year 1972 and has classes I to VII with student strength of 168 in 2010-11 out of which 91 are boys and 77 are girls. All the 168 registered students take mid-day meals in the school. Since March 2010, the responsibility of implementing the mid-day meal programme was vested with Daniel Self Help Group (SHG) selected by the concerned village education committee. The Village Education Committee is comprised of 16 members; school headmaster as secretary, two teachers, 11 villagers, elected representative of local government and the health worker. Earlier to the Daniel women group, a woman self help group named “Biswashanti” managed the mid day meal program for about 4 years from 2007 to 2010. The group was collapsed because of the conflict aroused among the group members and could not be solved by them. Initially, the mid day meal program was managed by the school administration and managed till responsibility was handed over to the Biswashanti SHG. Daniel SHG was formed in the year 2005; the group has a total of 10 members primarily do the agricultural work either as wage labor or as small cultivators and some of them depends upon both. Agriculture in Koraput district is mainly rain fed and is characterized as subsistence agriculture. Given this context, women do look forward to additional avenues for employment and managing the mid-day meal centre was taken up enthusiastically by the group. However, only one SHG member of Daniel SHG has received employment for running the mid-day meal centre and she works as a cook for a monthly

⁵⁸ Senior Scientist, M S Swaminathan Research Foundation, Odisha

honorarium of Rs.600, disbursed by the local self government (Village *Panchayat*). A helper has also been employed to assist the cook in cooking and cleaning but she is a non SHG member. The helper gets paid a monthly wage of Rs 400, disbursed by the local self government (village panchayat). The school has storage cum kitchen shed, constructed during 2009 using state funds. Rice and pulses that are required for preparing the meals are supplied directly to the school's mid-day meal centre by the Government as soon they get the indent form the school. Other items such as vegetables, fuel wood, spices etc. are purchased by the Self Help Group members from the local market. At times vegetables are bought directly from the local farmers but mostly they are purchased locally during the weekly market. To make the local purchase of vegetables, fuel wood and other items, the SHG advances the required money to the cook. Expenditure per day for the meals comes around Rs.125/ and per month it comes around Rs. 3000/- for 25days in an average in a month. They do incur the amount from the SHG saving account and get reimbursed the expenditure after 5/6 months, the amount credited directly to SHG account. Other members involved in shopping vegetables from the market and in purchasing fuel woods. The members cum account holders go the concerned bank at Kundra to draw and deposit their money in bank account. As per the Government provision, it's a voluntary service and they won't make any profit but they make some adjustment of own expenditure from shopping. All the transaction records are being maintained by the teachers as the members illiterate. The members have not received any formal training on management of the program. Provision for various items of meal is stipulated by the government (Revised norms by GoO, 2011) and it varies between the primary school student and middle school student as given below:

Stipulated quantity/amount per child in Class I to class V	Stipulated quantity/amount per child in Class VI to VII
Rice - 100gms.	Rice - 150gms.
Vegetables , condiments - 37paise	Vegetables , condiments - 90 paise
Fuel - 22 paise	Fuel - 22 paise
Transportation - 2 paise	Transportation - 2 paise
Egg - 86 paise	Egg - 86 paise
Supervision and monitoring - 20 paise	Supervision and monitoring - 20 paise

Children are served rice with a gravy item prepared form mixing pulses, vegetables and spices. As per local culture, mustard oil is used in the preparation of gravy. The same menu is fixed for

all the working days while boiled eggs are served six times in a month, usually on Wednesdays and Fridays. Egg is being supplied by a local supplier tendered by the Government.

“Our children are willing to attend school as the mid-day meal has become a major attraction for them”, says a parent.

We are poor and are not able to let them go to school with full stomach. Mid-day meal programme has helped our children as they no longer remain in school with an empty stomach.

“We want some change in the menu and don’t prefer the same in all the days” say most of the students.

The school headmaster, Mr. Pradip Kumar Tripathy says that the school attendance has improved due to the serving of mid-day meals. He further adds that on days when eggs are distributed students even bring their younger siblings and share the egg with them. The headmaster is also of the view that mid-day meals have helped in retaining children in school and hence in bringing down the drop-out rates. Significant increase in enrolment of girls is also observed: in 2007-08 there were only 56 girls which is now increased to 77 in 2010-11, likewise numbers of boys were 97 in 2007-08 which is 91 in 2010-11. The head teacher of the school is very appreciative of the impact in terms of enrolment because of the mid-day meal program while he felt teachers can give more attention in teaching if the government can make a provision for record maintenance concerning to the MDM implementation.

Case Study 2
Nutritional School Garden in Boliguda Village
Akshaya Kumar Panda and Tusar Ranjan Nayak⁵⁹

The concept of a nutritional garden for Boliguda primary school was conceived by M S Swaminathan Research Foundation (MSSRF) during 2007. Setting up of a nutritional garden in the school was not part of the design of any of the project activities of MSSRF. However, the idea was considered by MSSRF staff while initiating homestead kitchen gardens in that village during 2007. A staff of MSSRF narrated as to how the idea emerged or evolved: “When we were distributing seedlings of papaya, drumstick, lime and banana sucker to the families for promotion of kitchen garden an idea came to our mind that we should also provide some seedlings to the village primary school. We felt that in future the produce could be utilized in the mid- day meal provided for the school children. In the mid-day meal, provision of money for vegetables is very meager at 37 paisa per child per day. So one can imagine within 37 paisa how much quantity of vegetable could be provided to the children. We believed that vegetables grown in the garden would enhance the nutritional value of the meals. After discussion with the then Head Master it was decided that MSSRF will provide seedlings and other seed materials as well as technical guidance. School students will implement the activities with the help of the teachers. Thus the idea of setting up a nutritional garden materialized during July, 2007”.

School based gardening programme is one of the important initiatives to reduce micronutrient malnutrition and improve food security by (a) promoting consumption of fruits and green leafy vegetables; (b) teaching students how to establish and maintain home gardens; and (c) teaching students how to grow vegetables in organic way with no chemical fertilizers or pesticides.

Once the school showed interest and agreed to establish a vegetable garden with the support of MSSRF, the latter provided seedlings of papaya, drumstick, guava, lime, banana along with some seeds of seasonal vegetables during 2007-2008. With the help of school children and teachers the seeds were sown and the plants were planted. Some plants survived and some did not. At present the garden has 15 banana plants, 2.papaya, 2 lemon and 2 guava plants. Senior school children have been involved in maintaining the garden. They water and nurture the

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plants. Children have been advised to use vegetable waste and kitchen waste as manure for the plants. For the past three years the students have taken care to water the plants and maintain the garden.

Mid day Meal Programme is being managed by the School Management Committee (SMC) since 2009. This committee, set up by Education Department, Govt. of Odisha, (to encourage the school to adopt school based management) comprises of 12 members (9 parents, 1 school teacher, 1 ward member, and 1 senior (5th standard) student representative) from the village.

Till April 2011 the MDM programme was run through the ration (cereals, pulses and soybean) supplied by the Block Development Officer (BDO), and other items like oil, vegetables fuel was managed by SMC. The expenditure was reimbursed monthly to the SMC by the BDO and sometimes quarterly as per the MDM norms. Since April 2011 BDO is providing only rice while other items for preparing mid day meal are purchased by SMC. SMC uses the money deposited in its account to buy the required items.

Fresh vegetables from the garden are used in cooking mid day meal. They are used as supplement to what is provided with Government resources. Market is little far from the school and as discussed earlier the provision of budget is very meager in the mid day meal scheme to buy nutritious vegetables like curry banana which are now readily available in the garden. Banana bunches and produce from papaya plants from the garden are being utilized in the mid day meal. In a year, on an average, at least 5 bunches of banana (roughly 70 fingers in each bunch) and 20 kg. of papaya is used in mid-day meal. Usually, papaya and banana are mixed in the lentil gravy, which is locally called as *Dalma* (*Dhal*+ vegetables). In case of lime it was eaten as raw (as a substitute of pickle). Though the vegetables from the garden do not meet the requirement of the mid day meal provided for children it supports them to some extent.

Establishment of nutritional garden in school campus can be an appropriate initiative which can enhance the nutritional value in mid day meal programme. According to a teacher of Boliguda primary school it is difficult to maintain the garden as the school has no compound wall and domestic animals destroy the garden. The garden can be properly maintained if a compound wall is constructed. Growing seasonal vegetables becomes difficult when garden is not fenced. Hence,

at present only tree species are grown in the garden; it is not difficult to maintain the tree species. The school has a tube well inside the campus and therefore water is not a constraint to manage this small garden. However, in summer, the garden may face maintenance problem as the school is closed for about two months during this period.

It has been learnt from the experience during the past three years that perennial plants like fruit bearing trees are easy to maintain with the help of students as it needs less water and also needs water during the plating period only. These plants also can be saved from grazing animals even if fencing is not there. In case of vegetables, it needs regular care and watering; the students are to be spared for this and also have to spend their valuable study time. School gardening can be a successful initiative with the perennial plants even if there is no special provision by the Government. Building a concrete fence to maintain the garden is an expensive proposition (it will cost a minimum of Rs. 100000). The school has a resource constraint to go for concrete fencing. Bush fencing is less expensive but it needs regular maintenance and every year they have to replace it with new bushes. However, there is a possibility that the school may receive funds for permanent fencing and if that happens then a garden with diversity of vegetables may be maintained.

Case Study 3

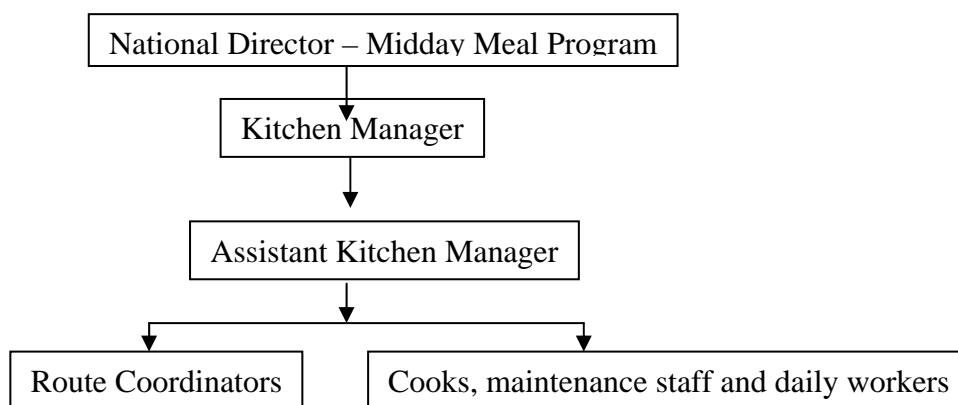
Naandi Foundation's Partnership with Government of Odisha in Mid-day Meal Programme, Brahmapur, Odisha

Tusar Ranjan Nayak

Brahmapur is located in the eastern coastline of Ganjam district and is about 160 kilometers away from the state capital, Bhubaneswar. The concept of running MDM programme in Odisha through a central kitchen has come into operation since December 1998. This programme has been carried out in Ganjam district by the Odisha government in partnership with Naandi Foundation, a non-governmental organization based at Hyderabad in Andhra Pradesh. Established in 1988, Naandhi works on issues related to children's rights, basic education, sustainable livelihoods, safe drinking water, health and nutrition. Government of Odisha identified this NGO to run mid day meal programme for all the eligible schools in Ganjam District. This organization is the Nodal agency for the mid-day meal programme in this District. It has been a challenging task for Naandhi to set up a central kitchen in Brahmapur city in a backward state like Odisha.

Central kitchen offers the benefits of cooking the meal in 'food-grade' quality vessels, under strict supervision in a safe environment, ensuring hygienic standards of nutritious quality food to a large number of school children. In the centralized kitchen steam cooking is done and the meal is prepared untouched by hand. The kitchen is cleaned by the house keeping staff using high-powered sanitation machines at regular intervals. Since the implementation of the program in 2008, hot cooked meals have been served to 65,000 children covering 606 schools in the District of Ganjam. The centralized kitchen is a factory-like setting, which appears to optimize the possibility of automation in the entire process and also achieve economies of scale. Standardized procedures are followed in preparing, packing, transporting and delivering meals using state-of-the-art technology, supported by proper monitoring and feedback mechanisms. Providing fortified meals with Iron, Zinc and Folic Acid along with nutritional supplements such as boiled egg/seasonal fruit/biscuits/berry (*amla*) candy/fortified candy once a week is another important feature of mid day meal programme implemented by Naandi with support from corporate and Institutional donors like Global Alliance for Improved Nutrition (GAIN) in addition to major support from the State.

A well equipped central kitchen has been established for cooking in a central location of the city which has been provided by the State government. The cooked food is packed (with seal) in stainless steel, food graded containers designed to keep the meal warm. The cooked meal is packed by 7 in the morning and by 11 o'clock the food is delivered in respective schools. Once trucks are loaded, route coordinators verify the number of food containers against the corresponding truck log, which indicates the authorized amount of food for every delivery route and to ensure safe delivery from the kitchen to the classroom. All the staff members are employed by NAANDI except the helpers/daily workers who work at the school level. These two helpers are employed by the School administration as per the Govt. provision. Once the meal container reaches the school, they have to unload it, distribute among the children and clean the place where they serve meals. The kitchen and distribution of meals are managed by a well structured team as the diagram indicates:



With the involvement of Naandhi, the administrative and executive role played by schools in the functioning of mid day meal programme has been considerably reduced. School teachers take care that meals are provided in a hygienic place and also maintain discipline among students during distribution of meals. The schools maintain a separate register which will be signed by both the issuing and receiving authorities while receiving food. The teachers are able to devote their time for teaching as they are not involved in any other activity of the mid day meal programme.

According to the school teachers of 'Hill Patna Upper Primary School' and 'Railway Upper Primary School' in Brahmapur children get nutritious, tasty meals in comparison to earlier mid-

day meal programme managed by the schools. Students belonging to poor and disadvantaged sections are more regular to school now and there has been increase in the attendance. Most of the students go to school without taking any breakfast and timely serving of food satisfies children. It further encourages them to be regular in attending school. Dropouts have been reduced in Railway Upper Primary School and the attendance also increased since last three years. Number of dropouts in 2008-09 was 14 (9boys and 5 girls), 2009-10 was 07 (5 boys and 2 girls) and in 2010-11 it has been reduced to 03 (1 boy and 2 girls). This school also registered an increase in attendance from 60-70% in 2008-09, to 70 -75% in 2009-10 and 80-90% in 2010-11. Enrollment of children in Hill Patna Upper Primary School increased from 352 (173 boys and 179 girls) in 2009-10 to 376 (194boys and 184 girls) in 2010-11.

A sample menu for a week is as follows:

Monday: Rice with lentil gravy (*Dalma*)

Tuesday: Rice with Potato and peas gravy (*Alu Mutter*)

Wednesday: Rice with Mix Vegetable Curry

Thursday: Vegetable rice

Friday: Rice with lentil gravy (*Dalma*)

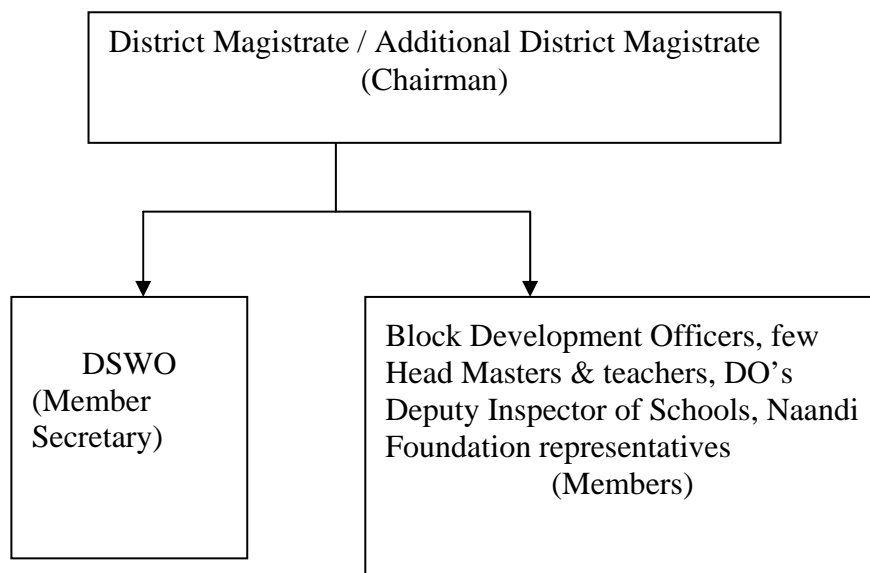
Saturday: Vegetable Pulav with tomato Soup

(In addition to this each child is given 4 eggs and 2 bananas in a month)

Nutritious value of a meal is around 450 calories and 12gms of protein for children of class I to V and 600 calories and 20gms of protein for children of class VI to VIII.

District level monitoring committee headed by the District collector monitors the MDM programme to improve its effectiveness and functioning. The committee includes school teachers, Naandi representatives and other functionaries from Government;

District Level Monitoring Committee



The committee reviews the functioning of the program and supports effective implementation. District administration gives necessary support to run the programme successfully and has requested Naandi to take up the remaining blocks in the District.

Mid day meal programme carried out through centralized kitchen is a challenging task but it is seen as an appropriate solution to reach the objectives of the programme. One of the biggest challenges is the complex logistics involved in the programme; right from setting up of the kitchen to planning the routes for delivery of hot and nutritious meals to schoolchildren requires lot of effort. Everything needs to be planned well and executed properly. Because of the nature of the terrain and lack of access roads some areas of operations proved to be extremely difficult. MDM Programme team has to carry food containers to distant places or across streams to deliver them to some remote blocks. At the same time, it is also important to make the meal as nutritious as possible. Vegetables and other items were introduced in the hope of adding more nutrition but some time it is found many children refused to take the food because they do not like the taste. Further, designing an appropriate fortified food involves a lot of time and money. Major challenge in this process is raising resources for civil structure, machinery and equipment and transportation in addition to funds / grant received from the Government.

References:

- Anima Rani Si and Naresh Kumar (2008), 'An empirical study of the mid day meal programme in Khurda, Odisha', *Economic and Political Weekly*, June 21, 2008, p. 53
- *Evaluation of the Mid Day Meal and Emergency Feeding Programmes under the Revised Long Term Action Plan*, done by D.J. Research and Consultancy 'on behalf of Planning and Coordination Department of the Government of Odisha', no date, not earlier than 2008 judging by the references cited
- Guidelines for the implementation of Mid Day Meal [MDM] programme in Primary and Upper Primary Schools of Odisha, March 2011, Women and Child Development Department, Government of Odisha
- Letter No. VI-ICDS-III-69/04-286/SWCD dated 27/07/2005 from the Commissioner and Secretary, Women and Child Development Department, Government of Odisha
- Powerpoint presentation on Odisha in the PAB-MDM meeting of 10-05-2011, accessed at the MHRD, GoI site.
<http://www.indianexpress.com/news/Odisha-villagers-stop-midday-meal-cooked-by-dalits/570249/0>
http://zeenews.india.com/news/state-news/Odisha-villagers-stop-mid-day-meal-cooked-by-dalit-women_597834.html

A Comparative Picture of Nutritional Norms/Quantity of Items in Implementation of MDMS across India

States	Primary Classes		Upper-primary Classes	
	calories (kcal)	Proteins (gm)	Calories (kcal)	Proteins (gm)
Tamil Nadu	476	15.6	645.8	19
Puducherry	631	23.0	735.0	19
Odisha	473	14.2	690.0	20
Andhra Pradesh	450	12.0	751.5	20
Norms by GOI	450	12.0	700.0	20

Quantity of items provided in the MDMS, 2008-09, for Primary Classes (in gms)

Items	Odisha	Tamil Nadu	Andhra Pradesh	Puducherry
Foodgrains	100	100	100	130
Pulses	20	35	20	10
Vegetables		70	50	75
Oil and fat	2	1	5	3
Salt and condiments		1.9		
Any other items (egg)	2 days/week	3 *days/week	2 days/week	2 days/week

Note:* Since September 2010 Tamil Nadu has introduced eggs on all working days in a week

Quantity of items provided in the MDMS, 2008-09, Upper Primary Classes (in gms)

	Odisha	Tamil Nadu	Andhra Pradesh	Puducherry
Foodgrains	150	150	150	160
Pulses	30	15	40	10
Vegetables		50	60	75
Oil and fat		1	8	3
salt and condiments		1.9		
Any other items (egg)	2 days/week	3 *days/week	2 days/week	2 days/week

Note: Source: Annual Work Plan and Budget (National), 2008-09

http://education.nic.in/mdm/NATIONAL_AWP&B-2008-09_DS&AS.xls