Community Managed Seeds Systems (CMSS)

An experiment in community partnership with the Department of Agriculture, Anantapur District, AP
Community Managed Seeds Systems (CMSS) is a step towards decentralised seeds systems for rainfed agriculture, managed by farmers' organisations in partnership with the Department of Agriculture. Seed production, distribution and subsidy administration are localised within a cluster of villages where farmers' organisations have effective control over the process.

The CMSS pilot was initiated for groundnut crop in Anantapur District, Andhra Pradesh. Seed production took place across 2,888 acres during Rabi 2011, while seed was distributed for 4,781 acres in Kharif 2012. Existing government programmes like the Seed Village Programme and regular seed subsidies were modified to evolve the CMSS framework.

Timely availability of quality seeds of locally adapted diverse crops and varieties is a prerequisite for rainfed agriculture. This requires that farmers be in control of seeds systems. The CMSS pilot establishes the measures that need to be taken for community-managed seeds systems, within the operational framework of the Department of Agriculture and its programmes.
The Community Managed Seeds Systems (CMSS) is a first step in the evolution of seeds systems appropriate for rainfed areas.

Government involvement in seeds is mostly limited to the Seed Village Programme, promotion of new seeds through subsidy distribution, quality control, market regulation and investments on research. Shortage and unavailability of affordable quality seeds in time and lack of locally adapted seeds of diverse crops lie at the heart of the seed crisis in rainfed areas.

The CMSS pilot was launched in groundnut fields in Anantapur, Andhra Pradesh, by the Department of Agriculture in collaboration with nine organisations. It was facilitated by WASSAN (Watershed Support Services and Activities Network) as part of the Revitalising Rainfed Agriculture Network (RRA Network). Seed production was taken up in Rabi 2011 to supply seeds for Kharif 2012. The process was facilitated by NGOs and Mandal Mahila Samakhyas (MMS).

The CMSS initiative modified provisions under the existing Seed Village Programme and regular seed subsidies to enable farmers' organisations to manage production, procurement and distribution of certified groundnut seeds at regular subsidised rates to farmers within a cluster of villages. By internalising the seed market, CMSS substantially helped reduce costs in 'subsidised seeds operations' of the government. Decentralisation of production, procurement and supply further ensured transparency and accountability.

**SEEDS SYSTEMS FOR RAINFED AREAS**

While price and quality are important factors in evolving seeds systems for rainfed areas, high dependence on rains, loss of seed due to frequent crop failures and the need for a diverse range of crops and locally adapted seed varieties are crucial. Low market penetration in rainfed crops and varieties also increases dependence on farmer-saved seeds and government supply and subsidies. A comprehensive seeds system that meets these contingent requirements is a prerequisite for revitalising rainfed agriculture.
ISSUES AROUND SEEDS IN ANANTAPUR

Characterised by hot arid climate, vast expanses of marginal lands and the second lowest rainfall in the country, Anantapur District is easily among the most acute of drought-prone regions in India. Irrigated agriculture comprises only eight per cent of total agriculture in the district. Over time, groundnut has survived and expanded as the single largest crop grown in Anantapur, with over 800,000 hectares of cultivated area under the crop.

Faced with frequent crop failures due to droughts, groundnut farmers in Anantapur depend significantly on government-supplied subsidised seeds, year after year. Bulk-seed requirement (70 to 90 kg per acre), low profits and the highly self-pollinated nature of the crop have kept most private parties away. As a result, seeds saved from previous crops, sales by neighbouring irrigated agriculture farmers and government-supplied seeds are the major sources of groundnut seed in the district. The cost of seed itself forms over 60 per cent of the total cost of cultivation in groundnut, and securing it at the time of sowing is an ordeal for every farmer. Issues of quality, timely supply and chaotic conditions at the time of delivery plague the system.

The dependence on subsidised seeds supplied by the Department of Agriculture (DoA) has increased with time. Anantapur consumes bulk of the seed subsidy in the state, amounting to nearly Rs 70 crore every year. Much of the seed procured by the Department comes from outside. The DoA distributed 420,000 quintals and 425,000 quintals of groundnut seeds in 2010-11 and 2011-12, respectively.

The rich crop-diversity in the district (particularly in millets and pulses) has eroded over time, giving way to mono-cropping of groundnut. The area under millets, for example, has gone down from about 300,000 hectares in the early sixties to a few thousand hectares at present. Availability of seeds of alternative crops has drastically reduced.

Such impediments have deepened the seed crisis in Anantapur. This crisis forms the backdrop for the CMSS initiative.

The existing systems have led to chaos and bred uncertainties and inefficiency. The challenge was to build a seeds system that provides quality seeds in required quantities on time and at affordable prices; ensuring availability of seeds after crop failures and of seeds of diverse crops were additional requirements. Such a seeds system is best managed by farmers in organised groups.

With substantial annual budget expenditure by the DoA, both under the Seed Village Programme and on seed subsidy, the only thing needed was an institutional innovation. Changes in the administrative and technical set-up had to be made to sync them with the new system. The CMSS triggered such innovations.
The CMSS is an attempt at internalising production, processing and procurement of groundnut seeds (of mainly K-6 variety) within a cluster of villages and its distribution to farmers eligible for seed subsidy within the cluster.

The entire operation was managed by an existing, locally available farmers’ or community-based organisation (CBO) which is at the core of the programme. The CBO acted as the nodal organisation for anchoring the programme within the village cluster. Partnered by the Department of Agriculture (DoA), the CBO managed the entire process with facilitation support from an NGO or the Mandal Mahila Samakhya (MMS). These CBOs are seen to evolve into formal institutions recognised by the DoA in due course.

The Department of Agriculture provided the foundation seeds at subsidised rates for production and paid the seed subsidy for distribution of the harvested seeds; all subsidies were directly paid to farmers' bank accounts. The NGOs, MMS and WASSAN volunteered with time and effort on the ground, while the documentation was supported by the RRA Network.

The CMSS initiative targeted distribution of groundnut seeds for Kharif 2012 for which seed production was taken up in Rabi 2011. A total of 2,888 acres of seed production was taken up in 183 villages involving 2,083 farmers in Anantapur. Total subsidy of Rs 97.84 lakh was accessed from the Seed Village Programme for the foundation seeds. In all, 3,763 quintals of seeds were procured and distributed to 4,781 farmers in Kharif 2012. Total subsidy of Rs 59.76 lakh was paid to farmers for the harvest seed distribution.
COMPONENTS OF CMSS

1. **Production** – procurement and distribution of subsidised foundation seeds to selected farmers with irrigation, certification and technical support.

2. **Processing and procurement** – post-harvest seed processing, packaging and storage and payments to the farmers in view of the time lapse between harvest (in March-April) and supply of seeds during Kharif (in May-June).

3. **Distribution** – taking indents, distribution of seeds for Kharif, payment of subsidy and related documentation.

INSTITUTIONAL PARTNERSHIPS

The CMSS has evolved on a multi-institutional platform. It was initiated by the Joint Director of Agriculture, Anantapur, and the Commissioner, DoA, during interactions with WASSAN, with the objective to internalise seed production in the district using the Seed Village Programme. The initiative shaped into the CMSS through interactions among the Department of Agriculture, NGOs, Regional Agriculture Research Station (Kadiri) of ANGR Agriculture University, AP State Seed Certification Agency, NABARD, bankers and the farmers.

The following roles were assigned to various partners in the process:
- seed production and processing - seed producers
- seed procurement, packing and distribution - CBOs

COMMUNITY-BASED ORGANISATIONS

The programme was anchored by village organisations of self-help groups, Watershed Committees, Farmers' Cooperatives, etc. from within the village cluster. They worked closely on the ground with DoA officials and were supported by the facilitating organisations. No new institutions were formed for the purpose. The CBOs included both seed producing and seed consuming farmers.

Establishing a partnership between the CBOs and the Department of Agriculture was the first step. The CBOs then evolved into institutions with infrastructure, knowledge base in participatory varietal selection and financial support to achieve seed security for the village cluster. These institutions can be given a formal structure in due course and institutional mechanisms for maintenance of seeds of diverse crops, buffers against contingencies, etc. incorporated.

FACILITATING ORGANISATIONS

Seven non-government organisations and two Mandal Mahila
Samakhyas (MMS) facilitated the programme in their respective Mandals; these were Foundation for Ecological Security (FES), HANDS, REDS, RIDS, Accion Fraterna, Jana Jagruti, MYRADA, Anjaneya and Pragati Mandal Mahila Samakhyas (of Nalla Cheruvu and Gandlapenta Mandals, respectively). The primary role of the facilitating organisations was to reorganise, train and strengthen the existing CBO’s, and to liaise with the DoA, certifying agencies and research institutions. HANDS, FES and REDS substantially contributed to the evolution of the concept as well as to discussions at the state level.

WASSAN, in addition to supporting the two MMS, managed overall coordination and monitoring, development of concept, understanding policy and procedure gaps and enabling changes and liaising between the partners.

DEPARTMENT OF AGRICULTURE
The Joint Director, Agriculture provided administrative support at the district level, hosting all multi-stakeholder meetings and contributing substantially to the evolution of the concept and modalities. Department officials provided monitoring, technical and administrative support at the field level. The DoA provided all necessary subsidies and procurement costs to the CBO’s. Though the DoA had initially agreed to provide training budgets, the NGOs were unable to access the same. The Commissioner DoA has played an important role in understanding procedural bottlenecks and providing necessary administrative guidance.

REGIONAL AGRICULTURE RESEARCH STATION (RARS) KADIRI, & ANGR AGRICULTURE UNIVERSITY
Scientists from RARS Kadiri, provided technical support and organised training at the district level.

AP STATE SEEDS CERTIFICATION AGENCY (APSSCA)
Officials from APSSCA participated in the district level meetings, organised field inspections for certification and conducted training for the facilitating organisations.

NATIONAL BANK FOR AGRICULTURE & RURAL DEVELOPMENT (NABARD)
The District Development Manager of NABARD participated in the district level meetings and contributed to the concept development. Attempts to mobilise financial support for the facilitating organisations and credit for the CBO’s, however, did not materialise.

AP STATE SEEDS DEVELOPMENT CORPORATION (APSSDC)
APSSDC provided foundation seeds of K-6 variety for seed production, and insights into the seed operations. Negotiation with the APSSDC to recognise the CBO’s as its nodes for procurement and distribution, however, did not materialise.
THE PROCESS

A. INSTITUTIONAL PREPARATIONS

1. NGOs already working on other programmes were invited to apply as facilitating organisations for the CMSS programme. Their applications, submitted to the Department of Agriculture (DoA), were screened by a committee comprising the AGM, NABARD and representatives from the DoA, RARS and WASSAN.

2. The selected NGOs identified CBOs that had valid bank accounts and that were willing to work with village clusters under the CMSS. These included farmers' cooperatives, Watershed Committees, Village Organisations (federations of SHGs) and Farmers' Clubs. The facilitating organisations held preparatory meetings with the CBOs and got their consent.

3. The DoA and the facilitating organisation (NGO/ CBO) signed a Memorandum of Understanding (MoU), wherein respective roles, deliverables and modalities of payment for training, etc. were established.

4. Modalities of the programme were arrived at during the district level multi-stakeholder meetings. The seed production phase was planned and options for procurement listed.

5. WASSAN held discussions with the Commissioner, DoA, and the MD, APSSDC, to understand the existing system of seed production and procurement and to explore the possibility of APSSDC recognising the CBOs as its nodal organisations. The DoA organised a technical training programme on seed production and seed certification for all NGO members and CBO representatives. Scientists from RARS and officials from APSSCA (Andhra Pradesh State Seeds Certification Agency) conducted the training.

B. SEED PRODUCTION

1. The CBOs signed agreements with the seed producing farmers on buy-back arrangements on rates, seed quality standards, place of procurement and other details. The farmers were registered and their database prepared.

2. The CBOs placed an indent with the DoA with help from the facilitating organisation. The DoA procured foundation/ certified seeds from authorised nodal agencies like APSSDC and opened outlets at the Mandal headquarters at the office of the MAO.

3. During the Rabi season, based on the indent submitted under the instructions of the Joint Director, Agriculture (JDA), Anantapur, the MAO allotted the required seeds to the respective CBOs.

4. The CBO, the producer farmer and the DoA signed an MoU on subsidised foundation seed supply, payment of certification fees, modalities and seed purchase rates. Producer farmers were allotted three bags per acre at 50 per cent subsidy under the Seed Village Programme.
5. Seed producing farmers were shown field demonstrations on seed treatment, trained on quality seed production and taken on field visits. Subsequently, those farmers who were interested received bio-fertilisers and gypsum at 50 per cent subsidy. Quality control mechanisms such as training of local certifiers were also conducted.

6. Seed producing farmers collected the foundation seeds from the MAO by paying the full price of Rs 56 per kg. The subsidy amount was then transferred to their bank accounts following inspection of their fields by the CBOs. This measure was evolved to prevent any re-sale of the foundation seeds in the market (a major problem in the Seed Village Programme) and to ensure that the seeds were not wasted.

7. The seed production and producer details were submitted to the local Agriculture Officer. Applications for seed certification were collected by the CBOs and submitted to the APSSCA with the certification fee which the DoA agreed to pay. Officials from APSSCA conducted inspection of the fields to assess the crop.

C. SEED PROCESSING AND PROCUREMENT

1. After discussions, the District Collector and JDA Anantapur decided upon a rate of Rs 2.50 per kg to be given to the CBOs as transaction costs for procurement and distribution. This included the costs for jute bags (Rs 0.08), labour for packing (Rs 0.30), transport (Rs 0.24), processing (Rs 0.60), labour (Rs 0.08), packing (Rs 0.60), filling and stitching (Rs 0.20), storage (Rs 0.20), insurance (Rs 0.10) and miscellaneous charges (Rs 0.10). Of these, only the allocation for packing, filling and stitching was used – most farmers processed (cleaned) their own seeds and the allocation for labour cost was converted into resource fee for the procurement committee. In addition, Rs 0.50 per kg was allocated as facilitation cost to NGOs from the surplus in the budget and the rest to the CBOs. Partial payments were made towards meeting the procurement costs.

2. The Commissioner, Agriculture, announced an ad hoc price of Rs 52 per kg for the CMSS programme, after considering the previous year’s price and the delay in finalising the groundnut seed price by the state level committee.

3. A procurement committee comprising seed producing and seed consuming farmers was formed at the village level. Representatives from the CBOs and NGOs bought gunny bags, weighing machines, stitching machines, etc.

4. As decided, the seed producing farmers processed the seeds and handed them to the procurement committee in the gunny bags provided. They incurred the costs involved. Local groundnut strippers were modified to clean the seeds after their quality was checked. HANDS helped evolve this process.
The processed seeds procured by CBOs were assessed by the committee for quality. The seeds were then weighed, packed into gunny bags and taken to decentralised storage spaces within the villages.

Ensuring quality and certification is a requirement in seed distribution. Since the process with APSSCA did not progress as envisaged, it was replaced by a procedure of germination tests under the inspection of the MAO. The germination percentage and other results were announced to seed consumers.

The CBOs paid the price announced to seed producing farmers, from the full price paid by seed consuming farmers.

The initial target for procurement from producer farmers was 15,000 quintals. However, only 4,579 quintals were obtained since several decisions at the DoA, both at the state and district levels, took some time. Rest of the seeds were partly retained by the seed producers and partly sold to local farmers.

Seed consumers were paid a subsidy of Rs 12.50 per kg i.e. 24 per cent against the 33 per cent subsidy in the regular process. Upon completion of seed distribution (on May 20), the NGO's submitted a list of the farmers and their savings account details to the DoA. Seeds were distributed to the farmers at Rs 52 per kg. The subsidy, limited to three bags per passbook, was credited directly to the farmers' accounts within 15 days of submission of documents to the DoA. The subsidy was drawn from the centrally-sponsored ISOPOM (Integrated Scheme of Oilseeds, Pulses, Oilpalm and Maize) budget.

These processes evolved during the course of implementation of the programme; most were executed with formal guidelines and procedures. Solutions were evolved through discussions among the DoA, facilitating organisations and CBOs, facilitated by WASSAN.
There were some essential deviations from the initial CMSS strategy which resulted in changes in the administrative procedure.

1. **Allocation of Subsidised Seeds for Production & Seed Village Programme**
   - The 50 per cent subsidy under the Seed Village Programme is limited to half an acre per farmer even if the farmer wants to take up more acres for production. This rate became a constraint for adequate seed production. The Seed Village Programme also expects the seeds to be shared or sold locally, but there is no monitoring of where the seeds end up eventually. Further, the process is operated by individual farmers rather than organised farmers' institutions.

   **Innovation**
   - The seed allocation was increased to three bags for an acre per farmer, after farmers' representatives expressed the need for a higher seed allocation for producer farmers with assured irrigation. The DoA gave the necessary permission to make this modification under the Seed Village Programme.

   The CMSS integrated the Seed Village Programme with the overall objective of seed security with a community institutional base in contrast to the convention of exclusively working with individual farmers on certain quota of subsidised seeds. The institutional tie-up also helped link seed producers with seed consumers, not a mandate in the normal course. The CMSS experience provides a background for reforming the Seed Village Programme in the future.

2. **Direct Payment of Seed Subsidy to Farmers**
   - Producer farmers are required to pay 50 per cent of the total cost at the time of purchase of the subsidised foundation seeds. Similarly, seed consumers are given seeds at a subsidised rate. Administering subsidy seed distribution is usually chaotic and a portion of the seeds always finds its way into the open market.

   **Innovation**
   - After it was observed that some subsidy seeds were being resold in the market, the JDA modified the procedure by making it mandatory for farmers to pay the full price for seeds at the time of purchase. The 50 per cent subsidy was then refunded after field inspection by the MAO (Mandal Agriculture Officer) to ensure sowing of the allocated seeds. The amount was directly transferred to the farmers' bank accounts. This also ensured supply of subsidised seeds to genuine seed producers. Similarly, seed consumers paid the full cost of the seeds at purchase and the subsidy was later paid into their bank accounts; this enabled them to procure seeds much ahead of the season. These deviations brought in transparency and quality control.

3. **Role of the APSSDC**
   - In the initial strategy, the Andhra Pradesh State Seeds Development Corporation (APSSDC) was to be authorised as the nodal agency for seed procurement and recognise the CBOs as its nodal organisations. The APSSDC would meet the cost of operations by the CBOs and share part profits, if any, with them.

   **Innovation**
   - Since decentralisation is an important component of the CMSS, the seed production, processing, storage and distribution had to take place at the village level. As a result, consensus could not be arrived at with the APSSDC which required...
the produce to be centrally procured at the Mandal level, transported and processed at its district units. The Commissioner, Agriculture, was persuaded to authorise recognised CBOs as the nodal agencies for the village clusters.

4. SECURING FUNDS FOR INVESTMENT
A major hurdle was mobilising funds for investment for the gap period between procurement and distribution of seed. The constraints were:

1. Securing a loan could take two to three months.
2. Because of the huge amounts involved, NABARD proposed to give a loan to a single NGO, rather than to different CBOs. However, responsibility of repayment by all would rest on that NGO; none of the NGOs involved were ready to take on this responsibility.
3. Since securing seed subsidy from the DoA could take up to six months, the interest on the loan incurred during such a period would increase the costs. This could make the proposal unviable.

Discussions between WASSAN and NABARD explored the possibility of involving PACS (Primary Agriculture Cooperative Societies), so that NABARD could release funds from its refinance scheme to PACS through the District Central Cooperative Bank (DCCB). The CBOs would act as a sub-group under PACS. Also, the godowns of PACS could be used to store seeds. However, the majority of PACS members were not inclined to be part of the proposal. The few that did show willingness asked for the sale price of seeds to be hiked from Rs 52 to Rs 64 per kg, which was not viable.

The APSSDC offered to pay 80 per cent of the seed cost at the time of procurement, if the produce was sold as per its procedures. Since its procedures were not in line with CMSS requirements, this too was not viable.

5. APSSCA AND SEED CERTIFICATION
The APSSCA (Andhra Pradesh State Seeds Certification Agency) takes samples from each lot of 25 acres for certification. These samples are usually collected from centralised processing units. However, under the CMSS, processing units were decentralised and the APSSCA was not equipped to collect samples from units spread across villages.

Another challenge was seed certification. Consumer farmers demanded that seed distribution be completed by May 15-20 so that they could sow during the first rains for a better yield. For this, the sample collection should have been completed by the first week of May. However, the APSSCA started the sample collection by the third or fourth week of May.
Innovation
After discussions with farmers, NGOs and the JDA, WASSAN submitted a proposal requesting exemption from seed certification to avoid delay in sowing and its replacement with local grow-out tests by the MAO. The proposal was endorsed by the JDA and approved by the Commissioner, DoA.

The MAO conducted the germination test of the seeds in the village with seed producers and seed consumers and shared the results with all. Seed consumers also inspected the seed-plots during the season and during processing. These measures ensured quality and brought transparency into the process.

6. INSTITUTIONAL INNOVATION PLATFORMS
DoA mostly works with individual farmers with subsidies as incentives; its partnership with civil society or community-based organisations is rare. Much of the efforts of the DoA, thus, are spent on subsidy distribution and administration and as work in isolation.

Innovation
The CMSS programme’s success lies in the synergy of solutions arising out of discussions at community, district and state levels, all focused on achieving a single objective – seed production, processing, storage and consumption in the same cluster of villages. CMSS is a process of pooling innovations across levels. A Google Group comprising all the organisations and the Department’s officials served as a useful forum for these discussions organised by the JDA and WASSAN at the district level and meetings with the Commissioner at the state level. CMSS has made community institutional platforms (Watershed Committees, federations of SHGs and farmers’ cooperatives) available to the DoA, making its work more effective and efficient.

Establishing institutional nodes with primary stakeholders and working with their organisations eased many transaction costs and brought in transparency and stakeholder control over the process.
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<tr>
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*Federations of SHGs at the Mandal level (Mandal Mahila Samakhya)
## ANANTAPUR DISTRICT, RABI 2011-12

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At its core, the CMSS shifts a large part of administrative and quality control in seed production and distribution to community-based organisations i.e. the primary stakeholders; the DoA plays more of a supportive, enabling and supervisory role, in addition to processing the subsidy lists.

MAJOR ADVANTAGES

- Availability of quality seeds to farmers well ahead of the season, at affordable prices.
- Development of a largescale base of seed producers with necessary technical skills through the internalised/localised seed market; this also helps to internalise wages and incomes in seed processing within the villages.
- Avoidance of largescale procurement, transport and other related costs; this also reduced the carbon footprint of seed operations.
- Substantial reduction in transaction costs in seed production and distribution for the DoA.
- Establishment of a platform for collaboration, knowledge sharing, etc. among community organisations, facilitating organisations, research system and the DoA.

FINANCIAL ADVANTAGES

Transactions worth Rs 223 lakh took place between seed producers and seed consumers without the need for mobilising working capital, while seed producers received an assured price for their produce.

Savings totalled Rs 21.51 lakh (i.e. Rs 500 per quintal) through the CMSS, compared to regular subsidy seed distribution. Of this, farmers saved Rs 12.9 lakh, while the Government saved Rs 8.6 lakh.

Internalised labour charges were incurred at Rs 5.07 lakh.

CMSS as a first step

The Community Managed Seeds Systems brings an institutional structure to the seeds systems anchored at the farmers' level.

It establishes an operational relation between the farmers' organisation and the DoA and helps in the recognition of the former by the latter as a node for its seeds operations, including provision of incentives and subsidies.

Such a partnership can provide a platform for sharing knowledge and technology. It can potentially perform the role that SHGs (self help groups) performed in decentralising banking operations for the poor.

Several programmes like INSIMP (Initiative for Nutritional Security through Intensive Millets Promotion) for millets and National Food Security Mission (NFSM) for rice and pulses can be integrated to enhance crop-diversification by making seeds available through the CMSS institutional platforms in village clusters.

These platforms can also provide linkages with research stations, public and private sector seed companies; through participatory varietal selections, even indigenous seeds can be integrated into the system.

The CMSS structure requires at least three to five years of investment for it to evolve and strengthen as a mainstream institution.

This was a major gap in the Anantapur experience where no public investments came through for facilitation and capacity building.
Experiences from the field

SEED PRODUCING FARMER

VIJAY SHEKhar REDDY

(Gangasanipalle village, Thanakallu Mandal, Jana Jagruthi)

Vijay Shekhar Reddy is a producer farmer and has 11 acres of land, of which two acres are under groundnut cultivation. He grows tomatoes in a third. The rest lie barren as he has irrigation to cover just those three acres. His groundnut fields are the primary source of income for this 31-year-old and it is critical that they give him the maximum yield possible. However, for the past decade, profit in any form has been playing a game of hide and seek with Vijay. The biggest challenge for him has been in sourcing the seeds.

"After waiting in queue for hours, sometimes up to a day or two, I'd manage to get three bags of seeds (90 kg) which is enough for just an acre. For the other acre, I'd be forced to source seeds from outside which meant more expenses. Worse, by the time I managed to procure the required quantity, it would often be too late for sowing."

Under the CMSS, Vijay was able to procure six bags even though the limit was three bags per acre per farmer. During Rabi, the DoA, in a first, agreed to allocate more seeds to producer farmers with assured irrigation.

"The seeds were not only supplied in time for the Rabi season, but they were of good quality too."

The average yield from Vijay’s two acres is about 40-50 bags (approximately 25 bags from each acre - each bag weighing 30 kg). Though he expects a better yield this time, he is also realistic.

"Though we got better seeds this time, there is a major power and water crisis here. Nonetheless, the biggest benefit is that with the CMSS, we do not have to go outside our villages to procure seeds. This helps us enormously in becoming self-sustained in seed production and, besides keeping our costs to the minimum, it also ensures seed supply for the farmers. We have 26 farmers producing seeds under the CMSS in this village - they will have more than enough to supply to the 89 consumer farmers who have signed up for the programme."

“The CMSS has made it possible for farmers to access government programmes by engaging them directly.”
SEED CONSUMING FARMER

VENKATARAMANA NAYAK

(Ratnalapalli village, Nallacheruvu Mandal, Anjaneya Swami Mandal Mahila Samakhya)

“My dream is for my children to study as much as they want. If I am able to do this, I would be the happiest man.” Venkataramana Nayak’s daughter, 19, studies BSc in Biochemistry, while his 17-year-old son is giving his intermediate exams. Venkataramana hopes to realise his dream by doubling his income under the CMSS programme. “My yearly income thus far has hardly exceeded Rs 8,000. This Kharif season, however, I expect my earnings to go up to Rs 20,000.”

Venkataramana sustains himself and his family on the three acres of land he owns where he grows groundnut and some red gram. Shortage of seeds and high cost in crop inputs are his two biggest impediments.

“We would stand in queue from 5 am and wait for up to a day or two sometimes. We would get fewer bags of seeds because there were just too many of us. I could cultivate only part of my land. The quality of the seeds was extremely poor - we would throw half the seeds away! Then there was the cost of the fertilisers and pesticides. It is difficult to make a profit when your cost is so high.”

Under the CMSS, he is assured of getting the nine bags of seeds needed for his three acres of land. He has already identified a producer farmer to purchase the seeds from - his next door neighbour, Raja Reddy. The village has 80 consumer farmers and 40 producer farmers signed up under the CMSS programme.

“Farmers in our village are united. We know we will be better heard as a group. We are determined to make the CMSS work to the entire village's benefit.”
A CMSS BOND

JAYARAM & MADHUSUDAN OF JOKULAKOTTHAPPALI VILLAGE HELP EACH OTHER THROUGH THE CMSS

Jayaram is a 32-year-old consumer farmer under the CMSS keen for better returns from his two and a half acre of land. Madhusudan is a 35-year-old producer farmer whose two and a half acre of land was one of the many sites for the CMSS pilot in November 2011. In April 2012, his land yielded 70 bags of seeds of which he has sold six bags to a happy Jayaram. Another six he has saved for the next sowing season. Rest has been purchased by other consumer farmers under the CMSS. Both hail from the same village, Jokulakotthappali under Amanduguru Mandal. Both have never been happier with their groundnut fields – one at the prospect, the other in retrospect.

“I have two passbooks so I was able to purchase six bags, enough for my land, at subsidy from Madhusudan. The seeds are of exceptional quality this time and I am really hopeful of a good harvest,” shares Jayaram.

“We also saved the cost of travelling all the way to Kadiri to purchase the seeds as we would do earlier – we’d stand in queue from 3 am till 1 pm without food or water! Even then, we would be uncertain of getting the seeds. Now, the seed distribution is being conducted right here in the village and we are sure of getting the quantity that we require.”

Madhusudan, on his part, highlights the monetary advantage of the CMSS, having experienced it first-hand. “We were able to get a higher yield and better returns this time. Since there were no middlemen involved, no seeds were lost. Earlier, we would sell our produce to the middlemen at a rate of Rs 800-1,200 for a 44-kg bag. Under the CMSS, we sold a 30-kg bag for Rs 1,500-1,600!”

While he sees the CMSS as a breakthrough in seed production, Madhusudan also feels that more needs to be done to enhance productivity of the groundnut fields in Anantapur.

“We do not know what is deficient in our lands, but experts can find these things out. They can research on the soil and tell us what we need to do to increase its fertility. Our land is all we have and such research would really help us.”
“The CMSS programme has given me total job satisfaction. Before, the quality of seeds sourced from agencies was so poor that of 400,000 quintals provided to farmers, about 20,000 quintals would be rejected right away! Now, the older farmers are saying that these are the best quality seeds they have seen in the last 15 years. The intervention has been made at the start of the production line. Harvest and yield will be better and incomes will be enhanced.”

K SAMBASIVA RAO, JOINT DIRECTOR OF AGRICULTURE, Anantapur District

JAYAMMA
(Chandrayanpally village, Nallamada Mandal, REDS)

Jayamma is producer farmer. She is unmarried and owns two acres of dry land. She has taken 1.5 acres of land on lease at Rs 8,000, for which she procured six bags of seeds under the CMSS. She harvested 34 bags (42 kg each) of seeds. She retained 12 bags for herself and sold the rest to the CBO. From the sale proceeds, Jayamma made a gross profit of Rs 65,520. After deducting expenditure (Rs 23,630), her net profit was Rs 41,890.

“The quality of the seeds was far superior to what we used last season. The yield was much higher and even germination was higher, at 95 per cent. The CMSS has given us hope for a better life,” she says.

“The CMSS has given us hope for a better life.”
Policy actions and lessons

The CMSS experience demonstrates the potential for a Community Managed Seeds System’s integration into mainstream seed programmes of Department of Agriculture. The main policy lessons are:

1. REFORMULATE SEED VILLAGE PROGRAMME (SVP)
   a. Change SVP to ‘Seed Security Programme’ by shifting the objective towards local self-sufficiency in seeds of crops where government operations play a major role, such as groundnut, rice and other self-pollinated crops and indigenous varieties.
   b. Integrate SVP into an institutional system managed by farmers’ organisations rather than individual farmers; any existing community organisation can provide a base.
   c. Create mechanisms for DoA to recognise farmers’ organisations as its node in seed operations.
   d. Plan and invest in an area approach, taking a cluster of villages or a Gram Panchayat as a unit area, and target seed self-sufficiency in the cluster.
   e. Register seed producers with the farmers’ organisation for their eligibility for foundation seeds and subsidies.
   f. Allocate seeds according to target supply to meet the cluster’s needs rather than ad hoc allocation per acre or per farmer.
   g. Make provision for costs for facilitating organisations and capacity building of farmers’ organisations.
   h. Invest in village level infrastructure for seed processing.
   i. Integrate seed processing, procurement and distribution within the SVP in the village cluster.
   j. Enable farmer level Participatory Seed Certification (with appropriate quality control measures) in lieu of formal seed certification.
   k. Where required, enable bank linkages for farmers’ organisations to source short-term credit.

2. SEED SUBSIDIES
   a. Bring subsidy distribution into an institutional framework. CMSS can be scaled up in phases and co-exist with the existing system; the latter can fill in the needs not met by CMSS, if any.
   b. Have farmers pay full-cost of the seeds and repay the subsidy amount directly into their bank accounts after verifying sowing, to safeguard against malpractices.
   c. Notify the CMSS institutions as official procurement agencies for the DoA at the state level.
   d. Make financial provisions for farmers’ institutions to engage with seed production, procurement and distribution; giving handling costs as percentage of the seed procured and distributed, as followed in CMSS, rationalises these costs and simplifies administration.

3. SEEDS SYSTEMS FOR DIVERSIFICATION OF CROPS

Shortage of seeds of multiple crops and varieties often forces mono-cropping. Promoting crop diversity in rainfed areas can be one of the objectives of the CMSS institutions.

Maintaining suitable buffers for contingent crops, buffer seeds for repeat sowing, etc. and maintaining locally adaptive indigenous seeds can all be dovetailed into the CMSS structure. As these are significant to sustainable agriculture, financial provisions can be made for such systems which are crucial in dealing with climate change and adaptation.

These policy lessons can be combined into a new ‘Seeds Security System’ which will focus on seeds for better productivity, sustainability and climate adaptation, i.e. seeds systems for economic and ecological security.
CMSS partner organisations

WASSAN (WATERSHED SUPPORT SERVICES AND ACTIVITIES NETWORK)

FES (FOUNDATION FOR ECOLOGICAL SECURITY)

HANDS (HUMAN NATURAL DEVELOPMENT SOCIETY)

JANA JAGRUTHI

MYRADA (MYSORE RESETLEMENT AND DEVELOPMENT AGENCY)

REDS (RURAL ENVIRONMENT DEVELOPMENT SOCIETY)

RIDS (RURAL INTEGRATED DEVELOPMENT SOCIETY)

PRAGATHI MANDAL MAHILA SAMAKHYA

ANJANEYA MANDAL MAHILA SAMAKHYA

ACCION FRATERNA