



Munich Personal RePEc Archive

Labour in Rice Production and Value Chain : Field Observations from Jangaon, Warangal, Andhra Pradesh

Duvvuru, Narasimha Reddy and Motkuri, Venkatanarayana

S. R. Sankaran Chair (Rural Labour), National Institute of Rural Development, Hyderabad

August 2013

Online at <https://mpra.ub.uni-muenchen.de/49026/>
MPRA Paper No. 49026, posted 13 Aug 2013 05:20 UTC

Labour in Rice Production and Value Chain

: Field Observations from Jangaon, Warangal, Andhra Pradesh**

D. Narasimha Reddy* and M. Venkatanarayana#

Introduction

As a part of larger research project¹ a field survey was conducted in the Janagaon region of Warangal District, Andhra Pradesh. There are two components of the field survey. One is the quantitative part which is, following the life cycle approach, to capture the detailed processes of rice production with a sample of 35 including 25 farmers who practiced system of rice intensification (SRI) principles and the other 10 are control group non-SRI farmers from nine villages². It is to capture all the processes involved, inputs used and practices followed in rice cultivation beginning from seed bed preparation to rice harvesting and sales. The field work was conducted over three months during June-August 2012. Information relating to the previous agriculture year (2011-12), for both the Khariff and Rabi seasons, was collected from the sample farmers using their recall.

Along with that a qualitative part focussing on the labour use in value chain of rice marketing is carried out in the study area during the same period. In the production cycle it covered the casual labour involved in the rice production. In order to understand the labour use in value chain, it is limited to a part of whole sale marketing. In other words it covered labour use in Agriculture

** The source of information includes field observations and focus group discussions (FGDs) with workers and employers in the region. This note is to serve as an input to the analysis of 'Informal Labour in Rice' as a part of the project on "Measurement of Materiality of Informal Production".

* Chair Professor, S. R. Sankaran Chair (Rural Labour), National Institute of Rural Development, Rajendranagar, Hyderabad.

Research Officer, S. R. Sankaran Chair (Rural Labour), National Institute of Rural Development, Rajendranagar, Hyderabad.

¹ "Measuring Materiality in Informal Production-Distribution Systems", School of Interdisciplinary Area Studies, Oxford University, Oxford.

² Field Study villages are: Katkuru, Chinna Ramancherla, Pedda Ramancherla, Nidigonda, Fateshapur, Ibrahimpur, Kasireddy palle, Dabbakuntapalle and Patelgudem.

Grain Market Yards, Food Corporation of India's (FCI) rice Godowns and Rice Mills. The qualitative part of the study is based on the focus group discussion (FGDs) among labourers engaged in rice production and value chain, informal discussion with the management of FCI and Rice Mill Owners and Technical Staff. It is to capture the changes in labour use and the impact of technology on it in the rice production cycle and value chain. Particularly, changes in the nature of employment, conditions of work, wages and employment relations with respect to rice cultivation.

This note is divided into two broad parts. The first part describes changes in the nature of employment, conditions of work, wages and employment relations in paddy/rice cultivation in the region. The second part is a description of some aspects of employment, labour conditions and labour relations in a regulated agricultural market yard where rice/paddy is traded, in the rice mills in the region and in two Godowns where rice is stored.

I

Labour in Rice Cultivation

There are certain broad trends in the labour market in agriculture across the country which are reflected in this region as well, though there exist certain regional specificities which cannot be ignored in a country of diversity that is India. Though the study did not give scope for deeper investigation, no instances of bonded labour – child or adult – came to our notice. Enquiries also drew a blank. The attached labour system has almost vanished. Out of thirty households surveyed only one household reported two attached labourers and this the household with wide diversification with substantial crop and livestock activities including leasing-in of grazing land for livestock. Casual daily wage labour is the main form of labour employment in the region. However, there is a trend towards emergence of regular wage labour in recent years because of the changing agricultural technology and growing mechanization.

The spread of available agricultural technology especially use of machinery for different kinds of operations such as using tractors for ploughing, electric/diesel motors for pumping water, and

harvesters for harvesting rice and maize crops besides their impact on demand for labour, have brought-in change in the form of employing regular labour like drivers and operators of agricultural machinery. Most of the rice fields in the study area are found to be ploughed by tractors, only the final levelling immediately before the transplantation, is done by bullocks with wooden plough. Again, most of the rice cultivating farmers in the area are using harvesters for harvesting rice crop. But the changing cropping pattern since the early 1990s, from traditional dry-land food-grain crops to irrigated and commercial crops has increased and intensified the agricultural operations. The labour displacing effect of mechanization in this region is compensated by increased area under rice cultivation and expansion of rice cultivation into two seasons (Khariff and Rabi) which increased the availability of work in terms of transplantation and weeding. The decline in the labour demand for agricultural operations, due to mechanization of rice harvesting, which is an important source of agricultural employment is still considerable. The expansion of area under cotton cultivation which extends both Khariff and Rabi seasons expanded the labour requirement for sowing, weeding and plucking.

Table 1: Mechanisation of agricultural operations in Rice cultivation

Sno	Operation	Earlier	Currently
1	Seed bed preparation	Manual – using bullocks	Tractor
2	Ploughing		
	a) Dry ploughing	Manual – using bullocks	Tractor – in many case Manual – in few cases
	b) Wet Ploughing	Manual – using bullocks	Tractor – in few cases Manual – in many cases
	c) Levelling	Manual – using bullocks	Manual – using bullocks
3	Transplanting	Manual – Female Labourers	Manual – Female Labour
4	Weeding	Manual – Female Labourer	Mechanical Tool – using Weeder operated by male labourer under SRI method Manual – for non-SRI
5	Fertiliser application	Manual – using Male labourers	Manual
6	Pesticide application		Manual
7	Harvesting		
	a) Cutting, bundling, and mounting	Manual – using female labourers	Harvester – whole operation is completed within hours – SRI and non-SRI
	b) Thrashing, winnowing and packing	Manual – using male labourers	
8	Transportation	Bullock Carts	Tractors/Autos

Note: Referring to study area – Jangaon region.

Source: Field Notes.

An important feature of this region is that there are very few landless labour households. Most of the households involved in agriculture are small-marginal farmers for over a decade there has been emergence of informal tenancy and many of the erstwhile landless agriculture labour households began cultivation on their own by leasing-in the crop lands of farming households who left the village while shifting their occupation from farm to non-farm activities. Some of the small and marginal farmers also lease-in these crop lands from those who are in 'sector-switching' mode.

As a result for most of the working members of the farming households, the first demand on their labour is own cultivation. Wage labour becomes second priority. There is a practice of 'exchange of labour' among farming households in this area but it is exchange of labour in the sense of timely availability of labour to each other but wages are paid for work done.

Labour in rice

The following is a brief discussion of labour in different operations of rice – including SRI – in the region.

Transplanting: Transplanting is still done entirely manually and the operation including plucking the seedlings is a solely female task, except the supporting transporting them from seed bed to field - which is done by male labour.

About five years ago the daily wage for transplanting was Rs. 50 but for the last four years it has been Rs. 100. The rise was partly because of a sense of labour shortage (which may not be real) that accompanied the introduction of Mahatma Gandhi National Rural Employment Guarantee Scheme (MGNREGS). This there are instances of wages for transplanting being increased from Rs. 100 to Rs. 120.

The working day for transplanting is still termed a 'full day'. Work begins at about 10.30 or 11.00 am. Then there is a break for one hour between 2.00 pm and 3.00 pm and then work continues to 5.00 pm.

But there is growing tendency on the part of those with relatively more land to go for ‘gutta’ (contract) work. The going contract rate is Rs. 2500 per acre of transplanting paddy, which is done by a group of about ten female workers. In such cases the working day may stretch longer - from ten in the morning till six or six-thirty in the evening. But the wage realized - at about Rs. 250 per day - is much higher. Contract work for paddy transplantation is resorted to mostly in Khariff season particularly when the ‘season is good’ and every farmer attempts to complete the operation as quickly as possible. The down side of contract transplanting is that demand for transplanting work may be reduced simply because of the anxiety of the workers to log a greater area in a given time. Agronomically, wider spacing transplantation is seen as a blessing in disguise, since it helps in soil aeration, better tillering and great root growth.

Weeding: Weeding is entirely work for female labourers. It remains a daily wage occupation and there is no ‘gutta’ or contract labour or piece-rate weeding work. It is still a ‘day-long’ work – as explained earlier. The wages are equal to those for transplanting i.e. Rs. 100 per day. The hike in wages from Rs. 50 five years ago to Rs. 100 is ‘coterminous’ with that of the hike in wages for other operations and also coincides with the introduction of NREGS.

Weeding in SRI: Given the general deterrent to SRI that is widely mentioned - that weeding with the weeder-machine is a bit arduous – and although some women still do it, it has shifted from being entirely female work to male work. This weeding operation using the weeder is mostly done by family labour, especially in case of small-marginal farms.

There have been design improvements both on the initiative of NGOs like CROPS and some individual farmers, but the general impression endures that weeding with the weeder is a difficult task. Besides, it certainly requires some training. There were no complaints about the availability of weeders. In many places community weeders were available.

There is need for regular periodicity – at least three weedings from the 10th day with an interval of 10 days between each weeding. Fourth (40th day) weeding is also recommended if need be but in the field study nobody mentioned a fourth weeding.

Harvesting: Harvesting paddy is now entirely mechanised. Even in small and tiny plots, there is no manual harvesting. Some local farmers have acquired harvesters and lease them out. But most

of the harvesting is done by harvesters brought seasonally from Tamil Nadu by the local agents/brokers. The present rate of rent for harvester is Rs. 1500 per hour and in this time about an acre can be harvested.

Ploughing: Ploughing is also an operation that is being increasingly mechanised, though ploughing with bullocks is still done to some extent. The first two ploughings are in dry field and they are in most of the cases (say 80%), done by tractors. The second two ploughings are in wet field are, some cases (say 50%), also done by tractor. But the final levelling for the transplantation is mostly (95% cases) done using animal power - bullocks. The hire charges for tractor for each plough per acres ranges from Rs.1200 to Rs. 1800 depending on the demand. For manual ploughing using draught animals (bullocks) the hire charges are Rs. 800 for one acre of wetland done two-fold and Rs. 600 for once acre of dryland for two-fold ploughing. The mechanisation is reducing the time of ploughing operation. With animal power, it takes one or two days to complete the ploughing of an acre land whereas the tractor can do the same within a couple of hours. But in the environmental resources perspective the waste from bullocks is used as organic manure, whereas the waste from mechanised tools (tractor) using fossil fuels, goes into the air and contributing to the green house gases.

Intensity of Work: Emerging Changes

Intensity of work depends on the agricultural operation and gender. Tractor drivers have to be available for work any time in a day. For male casual labourers in any agricultural operation working day, begins at about 8.00 AM and ends at about 5 or 6 PM. Discussion reveal that a few years ago the working day for the casual male workers began at 6.00 AM.

For female casual labourers, the working day presently begins at 10.0 AM in the morning and ends at 5 to 6 PM in the evening. If they have piece rates or contract rates per acre, their work day begins early and ends late in the evening extending until 6 or 7 PM. However, many of the agricultural operations are casual in nature. The contract system is observed intermittently and only for female workers engaged in rice transplanting. Earlier, the bunding of rice fields' used to be based on a contract system for groups of male labourers but it has now become entirely casual work.

Although the area under rice cultivation has expanded in this region, there has not been a proportionate increase in the availability of work for agricultural labourers. The main reason, as discussed earlier, is the mechanization of rice cultivation especially ploughing and harvesting, which are the major operations. Moreover, the proliferation of small and marginal holdings in rice cultivation, has reduced the dependency on labour markets for ploughing and transplanting which are shifting to be based on family labour. Rice cultivation dependent on ground water facilitates labour flexibility and helps to stretch the period of ploughing and transplanting, which otherwise under the regime of tank and canal irrigation have to be compressed into a short period with acute peaks in labour demand.

Agriculture does not provide employment for all workers throughout the year. For the female agricultural labourers - those who completely depending on the daily wage - less than 6 months' work is generated. For female labourers who also work on their own farms, additional unpaid work is required. Male workers move seasonally to non-farm work which fetches higher wages but also involves more heavy tasks like loading and unloading, road construction, transport etc. The engagement of female workers in non-farm activities is relatively low. Again the working under of NREGS is a work supplement.

The increasing area under rice cultivation and its expansion to two seasons (khariff and rabi) supposed increase the availability of work especially for transplanting, weeding and harvesting. Though the diversification of the cropping pattern from traditional dry-land cereal crops to other cereal crops like rice and to commercial crops such as cotton has in fact increased the intensity of work in the study area. But the increasing use of machinery (tractors for ploughing and harvesters for harvesting) reduces the availability of work for the agricultural labourers. The result is that there has not been much change in availability of work (no of days) especially for the daily wage labourers.

There is no formal union or organization of agricultural workers in the region. This may be partly because of the fact that most of the agricultural labourers are also drawn from small-marginal farmers. At one point of time there was a protest under the Left parties against the use of harvesters. from an informal agricultural labour union (Ryathu Cooli Sangham). The dialogue between union leaders and farmers, the officials and politicians ultimately calmed the protest

without any positive outcome for agricultural labourers, and the use of harvesters continued thereafter without any resistance.

But the changing agrarian structure - especially increasing access to land by ownership or lease-in from the erstwhile relatively large or even small owners moving towards non-farm activities and thereby declining overall size of operational holding - transformed many of the erstwhile agriculture labour households into farming households working most of the time on their (rented) farms. Labour household members, especially men, are diversifying into various forms of non-agricultural activity. Although there are instances of female labourers diversifying into non-farm activities, it is not as intense a trend as for men. Road infrastructure and transportation facilities have facilitated finding work opportunities for some of them not only in nearby towns but also seasonally in distant cities.

Wages and Other Benefits

At present agricultural wages for male workers range between Rs. 150 to 250 and female workers, between Rs. 100 to 120. For most of the casual labourers there are no other benefits other than the daily wage. The FGDs and other individual discussions reveal that there is no awareness of the legal minimum wage rates but the male wage rates are supposed to be on par with it. Female wages are below those for men. In recent times some non-wage benefits have emerged like the provision of transport to work by autorickshaw at the cost of the farmer, if the field is far away from the village. And also, for certain (male) operations like pesticide spraying, Rs. 50 is paid extra to the usual daily wage. The growing awareness among the labourers about the hazardousness and risk of manual spraying of pesticide made them demand extra (Rs. 50) payment. For tractor drivers, there are other benefits like additional payments for the extra time worked and for night work. Also on working days, they receive extra payments worth Rs. 50 – 100 as *batha* (tips) from the client hiring the tractor for farm or non-farm work.

The wage rates reported above are the result, according to FGD, of NREGS. In the pre-NREGS regime, the daily wage rates in the study area were substantially lower than the current rate. The basic rate increased from Rs. 50 to the current rate for the female daily wage labourers and from Rs. 100 to the current rate for men. The NREGS regime has an impact on the wage rate in two ways. On the one hand, to some extent, it has created a situation of scarcity of demand for rural

labour. On the other, it improved the bargaining power for the casual labourers by taking the NREGS wage rate as the bench mark wage rate. But one common complaint at FDGs is that the increased wage rate has been accompanied by inflation for both food and non-food commodities, neutralizing the real wage gains.

The payment of wages is entirely in terms of money and payment in kind no longer exists. Daily wage payments are distributed at the field itself at the end of the day's work, just sometimes with a day's lag. There also instances when the wage payments are made weekly but it is linked to farm operations which extend for at least a week. But since most of the farmers in the region are small-marginal farmers, their hiring needs rarely extend to a week.

It is observed that the earnings out of daily wage labour in agriculture, especially for females is at the most Rs. 15000-20000 in a normal agricultural year. Annual earnings would be less than that when the agriculture is affected by drought or short of normal rainfall in the region. For casual labour households, the household consumption expenditure ranges from a minimum of Rs. 2000 to 6000 per household per month depending on the household size ranging between 3 and 5. For female labourers the average number of person-days of labour market work available is less than 6 months. The perception of local workers is that the shift in wage payment from in-kind to cash has implications for the household budget. Earlier, for example, for female labourers working on agricultural activities like rice transplanting, rice harvesting and other activities related to other foodgrains like maize etc, wages were paid in kind. Kind payment used to reduce market dependency, and insure them against inflation in the prices of foodgrains. Cash wages do not do this without effort to protect labour against inflation..

Along with family income from own crop cultivation and labour, credit from different sources smoothens household consumption and other basic needs. Health and education increasingly involve dependency on private provision due either to perceived low quality or to the non-functioning of public systems. As most of the female labourers are also members of self-help groups (SHGs), these have become an important source of credit. Many of the female agricultural labourers agree that these SHG based loans are used to smooth household consumption expenditure. In addition, there are instances where loans from Micro-Finance Institutions (MFI) are also used for such purposes.

Box I: Labour Mobility

The Case of Mallesh of Fateshapur of Raghunathpalli Mandal in Warangal District

Mallesh could be 35 or 40 years old. He presently manages a girls' hostel in L.B.Nagar, Hyderabad, where each inmate (all college-going girls) pays Rs. 2000 per month for a shared lodging and boarding. He seems to be contented about the job/avocation, and looking beyond in the same or similar line of urban occupation, and does not seem to entertain any idea of looking back to his rural occupations that he passed through.

Mallesh still owns four-and-a-half acres of land in Fateshapur. He has a bore-well with 5 HP motor that can irrigate half of the land in a normal year, when the village tank is filled. This year (2012), with delayed rains, and with a mere hope that fifty per cent deficit rainfall at the beginning of August would be made up by the end of September, only a small part, about one-and-a-half acre is irrigated, and part of it is under SRI cultivation. All this land and the irrigation system, is leased out for an annual rent of Rs. 15,000.

Earlier Mallesh, along with his aged father, was managing the cultivation and was also working as a *hamali* in the Agricultural Market Yard in the nearby town, Jangaon, which is about ten Kms. away. He was carrying on his agriculture, and at the same time cycling to the Market Yard, and working till late hours loading and unloading grain. The Market Yard *hamali* work, though hard, was considered a lucrative work, and entry to that work was governed by some kind of 'closed shop' type of union of *hamalis*, and it carried a premium entry fee of Rs. 5,000. In season (three months following Khariff harvest and two months following Rabi harvest), if the going is good, the earnings could go up to Rs. 40,000 a month but there could also be days in lean season where one could end up with less than Rs. 100.

Mallesh, as a small farmer, toiled on the land as cultivator and as a *hamali* at the Market Yard. The work was too hard on him, and his wife and other family members prevailed on him first to stop working as *hamali* and then to look for some relatively less taxing non-agricultural work. The search landed him in the avocation of running a girls' hostel in Hyderabad.

Most of the small and marginal farmers in rural India are looking for the kind of exit from agriculture to any non-farm work, even if it is as taxing as the *hamali* work but then and take to something of the kind of path that Mallesh has taken. But discovery of such a path is not easy to come by for most of them.

Source: Field work. 2012

II

Labour in Rice Marketing: Grain Market, FCI Godowns and Rice Mills

The region under study experienced a considerable shift in the cropping pattern in favour of rice cultivation in 1980s and 1990s driven by the increasing use of ground water in turn induced by subsidized or even free power for agriculture. The result was a substantial increase in the production of rice in the region. By early 2000, this had resulted in the several fold increase in the arrival of paddy in the local market yard, the establishment of several modern rice mills in a place where formerly there were none, and the building of large storage godowns not only for local marketed surplus but also to serve as a nodal point for storage and distribution of non-local paddy. The expansion of non-farm multiplier activities generated considerable non-farm employment opportunities with some interesting characteristics.

Firstly, the new rural non-farm activities, mostly in the form of loading and unloading, are for male workers. Second, most of these activities are seasonal in nature with peaks coinciding with the harvesting and marketing season of paddy. Third, most of these activities have not created any additional employment, barring for a few migrant workers in rice mills, but provided additional work to those who are already engaged in agricultural work, especially for those who are small-marginal farmers. Fourth, given the low returns from agriculture, there is a widespread impression among the small-marginal farmers in the region that non-farm activities, including wage employment, would be one window through which they could supplement their meagre agricultural incomes. This has created competition for work in the new non-farm activities and there emerged closed-shop organizations of these workers with a premium for entry for small-marginal farmers, because of the relatively high entry fee which agricultural or other workers could not afford. Also, there are certain demands that preferences must be given to the labourers of the village in which revenue premises the godown is located. Further, there is a kind of caste preferences, depending on the caste of the agent who procures the labourers. Thus these factors act as entry barriers.

Here an attempt is made to capture some of these features of employment in market yards, rice mills and godowns, based on focus group discussions (FGD) with workers and interviews with the managers and other functionaries of these establishments.

2.1 Labour in Agricultural Market Yard

The local grain market yard is located in Jangaon town. Initially the produce traded in the market consisted of the dry land crops like green gram, redgram, maize and oilseeds like groundnut and castor. Rice constituted very small proportion of the marketed surplus. But during the last two decades the situation has changed. With increasing rice production and an increasing area under cotton cultivation the arrivals at the agricultural market yard shifted in favour of rice and cotton followed by maize. Two decades ago, in the peak marketing season there were only 3000 quintals of rice a day brought to the market yard. Now it has increased to 30,000-40,000 quintals. Peak seasons have lengthened and multiplied; earlier rice cultivation was limited to one seasons, while currently, in many cases, rice is grown in two seasons.

However, the local market yard does not have adequate storage. There is one godown, built five years ago, with a capacity of 3000 tonnes. Recently another godown with a capacity of 3000 tonnes was built and opened for operations. Other than these two godowns, there is no large public storage facility for the market yard. The expansion of the storage facility may expand the work opportunity even in the lean season for those already in the market yard *hamali* muster.

Employment practices

The local agricultural market yard employs about 450 labourers. There are two groups: one set of labourers are engaged in unloading and weighing the incoming grain (inflow) and the other group deals with loading the commodities traded in – and leaving - the market (outflow). Female labourers also find work in the market yard, most of them being engaged in sweeping, mounting the unpacked grain and grading. All these three sets of labourers are organised in three different unions. – explained below

While some of the workers in the market yard hail from the market town, Jangaon, a majority of them are from neighbouring villages and most of them are drawn from small-marginal farmer

households and also do their own farming. Most of those residing in neighbouring villagers are daily commuters - either by bus, shared autos, cycles or a few of them on motor bikes. In this particular local market yard, the *hamalis* are predominantly from the *Kurma* (shepherd or backward class) community. Although their traditional occupation is sheep rearing, most of them have withdrawn from this occupation and have entered other sectors such as agriculture and non-farm activities like *hamali* labour.

There is an entry barrier to work in the market yard and the workers are unionized. Unless the union permits, none can be engaged for work as a labourer/*hamali*. The union admits new entrants depending either on demand for drop-outs or withdrawn labour - or work demand exceeding the existing size of the labour-force already engaged in the market yard. For new entrants, there is a fee to join the market yard *hamali* group. It takes the form of a deposit of Rs. 5000, returnable upon exit from the market work. The union decides the entry of the labourer but the exit decision is the labourer's own. The union organizes the *hamalis* into different groups and assigns each group to a trader (including buyer and commission agent). The size of the group depends on the requirement of the trader and the trading tasks.

Intensity of Work

As mentioned above all the *hamalis* working in the market yard are unionised. The union makes them in groups. Some groups of *hamalis* are associated with commission agents in the market yard. Their operations are confined to unloading the grain brought to the market either by farmers or by traders. Other operations involve weighing and packing the grain, once sale is confirmed. The second set of groups of *hamalis*, is associated with the buyer-trader, and involves lifting grain from the yard and loading it onto trucks.

In the marketing season, the working day begins early in the morning at 7 am and continues till the evening - 5 or 6 pm, with a lunch break of half- an-hour. Sometimes in season, loading or weighing activity may extend late in to the night - up to 12 or even up to 2 am. As the payment is piece rate, even for the work extended to late in to the midnight, there will not be any incremental payment. But the trader is obliged to make some payment for the group of *hamali* as

a whole working for him, on the name of ‘payment for the day’s alcohol expenses of the group of *hamalis*’.

The size of the labour force employed in the agricultural market yard, however, may not reflect the total number of workers engaged in loading and unloading activities related to paddy production. This is because a substantial part of the agricultural produce especially rice, by passes the yard and is traded at the farm-gate level. The paddy purchased at the farm level, often on the harvesting day itself, goes directly to traders’ or rice millers’ godowns.

Wages and Benefits

The payment of wages for *hamali* work in the market yard is on piece rate, Rs. 5 per bag loaded or unloaded. On a peak day of the work between Rs. 500 to Rs. 1000 is reported to be earned. In the slack season day, workers may return home with earnings below Rs. 100 or without any at all. Those engaged in unloading, weighing and packing as well as those involved in loading get almost the same rate. The payment for unloading is made by the commission agent who discounts it from the amount due to the actual agricultural producer. For loading, the payment is made by the buyer/trader. Usually daily payments get accumulated with the trader/commission agent and the *hamalis* can avail themselves of their pay whenever they want – on the same day of work or after few days or weeks.

Earlier, a decade ago, there used to be some kind of customary relations in which a *hamali* attached to a trader was provided with a pair of clothes for one specified festival in a year. Under this relation the attached *hamalis* used to be at the beck and call of the trader/commission agent. They had to attend even to their household chores. In many cases these household chores were unpaid activities. Under these customary relations, the *hamalis* in the group attached to the trader/commission agent used to get one or two pairs of clothes in a year for each *hamali* from the trader. Now as *hamalis* are avoiding attending to the unpaid household chores of the trader/commission agent, their employers have also withdrawn the customary provision of clothes. Customary relations between the trader/commission agent and the attached hamali group have almost vanished.

The household consumption expenditure of the *hamalis* ranges from Rs. 4000 to Rs. 6000, per household per month, depending on the household size, ranging between 3 and 5. Household consumption expenditure is regular, not seasonal in nature: every month there is a minimum level of expenditure. But the earnings for the *hamalis* working in the market yard are seasonal, depending on the agricultural production seasons. For those who are coming from neighbouring villages - as most of them who have their own farming do - they get additional income or produce for their own consumption on their own farming. But, for those residing in the neighbourhood of the market yard in town do not have such an asset base and are completely dependent on the market yard based work. During the market yard's lean season, which may altogether extended to more than half-of an year, their household consumption expenditure is smoothed with their savings or by borrowing from the trader/commission agent to whom they are attached. This is not a kind of attached labour system as such. The market yard *hamalis* union demands that the trader cannot hire any other labourer for his trading operations, other than those hamalis affixed by the union.

2.2 Labour in Rice Mills

During the past two decades, from a position of no rice mill in the vicinity, there sprang up 20 commercial rice mills. This is substantially the result of the expanding area under rice in the region and also to an extent an increase in the yields of rice.

Employment in Rice Mills

In the early stages when rice mills started sprouting in the region there was some kind of an agreement that when a rice mill was built in the environs of a particular village, the rice mill has to engage labourers for loading and unloading or any other work either from that village or other surrounding villages. Later this norm broke down. One of the factors contributing to this unwritten agreement was that, in certain seasons, rice mills had to be operated continuously for 24 hours necessitating the continuous availability of labour. As most of the labourers have their own agricultural activity, and as their family farming operations also require their labour, there was no way that those workers would devote all their labour power to the local rice mill. The labourers from farming households could not ensure their continuous availability for mill operations. Millers therefore went for an alternative: using cheap migrant labour from Bihar through labour contractors. Loading and unloading activity in commercial rice mills in this area

are increasingly manned by non-local, migrant labour from Bihar. These rice mills engage only male migrant labourers for loading and unloading activity. There is not a single female migrant worker for any kind of rice mill activity. Only technical and supervisory roles remained with local workers. Contracts for technical and supervisory staff are on yearly basis but payments, are made monthly. A few local female casual labourers are engaged for sweeping and cleaning mill floors, and a few female labourers are hired for grading tasks. Wages for the daily casual female labour are paid weekly or monthly.

Intensity of work, Wages and other Benefits

Mills enter into a contract with the contractor who supplies the migrant labour for loading and unloading tasks. The miller doesn't pay any money directly to migrant labourers, he makes payments to the contractor depending on the terms of contract, either weekly, fortnightly or monthly or sometimes for an entire season. The contractor in turn does pay to the actual labour. In these rice mills, payment for the loading and unloading labour is currently piece rate at Rs. 4 per bag which is below the Rs. 5 per bag rate observed in the market yard. The contractor in turn pays his labourers at Rs. 3 per bag. The miller is not responsible for any other benefits. Migrant labourers do not have any additional claims from the rice millers. In the mill premises, the migrant labourers are provided access to water and accommodation in tiny sheds roofed with asbestos sheets.

2.3 Labour in Godowns

The increase in rice production not only brought increased market yard activity and setting up of rice mills, but also necessitated building storage facilities and brought to the area the procurement activities of the Food Corporation of India (FCI). Prior to 2000, there was no godown at all in this area to facilitate FCI procurement. The public-private partnership (PPP) policy of the Government of India, facilitated the establishment of Investors' Godowns in this area. An entrepreneur from the district town of Warangal, established a godown with six sheds, each with 5000 tonnes of grain capacity, in this area (Yashwantpur). It began operating from 2002. As its capacity is over-utilized³ with the increasing local rice production, another such

³ In the Godown Management system, normally, stacks can be raised up to a certain limit, cannot be touched the roof/ceiling but it has become a necessity here. Again, the godown corridors are used temporarily to stack the unloading bags and ones the unloading is done, stacks in the corridors have to be shifted to inside the godown. But

godown became necessary. Another large Investors' Godown with 38 sheds, each with 5000 tonne capacity has been established recently in this area (Raghunathpally). Its operations began in 2009. In the Investor's Godown system, the investor who constructed the godown is given the responsibility of maintaining the godown and the contract for handling, loading and unloading operations. The FCI uses these godowns for the grain it procures and pays rent, maintenance cost and loading and unloading charges to the investor.

Employment practices

The first godown initially was operated by the investor himself for the FCI. The investor's responsibilities included the whole range of activities in the godown including store maintenance and handling the loading and unloading of grain. Since 2007, as the investor has withdrawn from Godown maintenance and loading and unloading responsibilities, the State Warehousing Corporation has taken up the maintenance responsibility, and the loading and unloading activity has been shifted to a private contractor based on an open bidding process with the term of the contract extending to two years.

In 2002, the Godown engaged about 60 casual labourers. Although a few of them had withdrawn in between and a few new entrants replaced them, most of the original casual labour force continued to work with the investor, until he withdrew from direct management operations. It is not that they used to work regularly in the sense of every day work but whenever there was work (loading or unloading), most of them were regular participants. In fact, initially there was excess capacity and only one-quarter of the Godown was filled as procurement was limited. Over a period, the situation turned from under-utilisation of capacity to over-utilisation⁴, sometimes the grain bags being stacked outside the shed and covered with plastic sheets.

In 2007 when the Investor's handed over the Godown maintenance responsibilities to the State Warehousing Corporation, there was a rumour created that *hamali* labour will be regularized. The *hamalis* demanded that their names be kept on the roll. The investor saw an opportunity in this demand and profited by charging each one for retaining their name on the muster. The investor demanded a total of around Rs. 40,00,000 from these *hamalis*. About 40 of the sixty

in certain circumstances in these godowns these limits of stack height were crossed. Also, stacks in corridors remained there for a longer time, days, weeks and months.

⁴ See previous note.

hamalis could mobilize and afford to pay Rs. 50,000 each and the rest could not mobilize such a large quantity and therefore had to withdraw. As 40 of them could mobilize Rs. 20 lakh the remaining Rs. 20 lakh was mobilized by inviting new entrants to their ground with an entry fee of Rs one lakh each. For the Rs. 20 lakh target they added 20 new members to their group and together all 60 of them formed a union. Most of these labourers are from the same village where the godown is located or from the surrounding villages. They commute daily from their villages to the godown. As most of them have their own farming too, they perform both farm and the non-farm *hamali* work.

It happens that sometimes in peak work periods, these 60 unionised labourers could not perform the loading work especially when rail wagons had to be filled. As it is the responsibility of the group of 60, the union is compelled to engage additional labourers from neighbouring villages. For these extra labourers, the union pays out of its own earnings on a piece rate (per bag) basis.

For the other large investor's godown, there are about 320 labourers working on unloading and unloading activity. Some of them are land *oustees* in the process of land acquisition for the godown. More than 200 acres of farming land was acquired for this purpose. Only 100 acres were used in the construction of the 38 godown sheds and the rest remains unutilised so far. Most of the land *oustees* are from the same village (Kurma colony). In addition to the compensation for land they lost, they were offered *hamali* work in the godown. Half of the *hamalis* working in this godown are of this type. The rest of them entered *hamali* work by paying fees ranging from Rs. 50000-80000. In one or two cases it touched one lakh. They see it as an investment for the steady income. None of them are sure about how long it would be to recoup the investment. The sole reason for such a demand for this work is a rumoured expectation that they will be regularized. All the payments are made to the investor of the godown. In this second godown so far no union has been formed.

These 320 *hamalis* are group into 20 work groups, each having 16 members. Each group is having a leader who has to maintain the group and ensure the given work is done or not. Once the work is done the payment for the group as a whole is handed over to this group leader and he will distribute the members' shares.

Intensity of Work

The intensity of work depends on the FCI trading activity – how often FCI lifts rice from these godowns and transports it to other states, thereafter re-filling the godowns with rice procured locally. Initially, in the first godown, the availability of work was intermittent - any procurement necessarily required unloading work and when FCI lifts the rice then there was loading. Otherwise, there is no work. As most of them are not landless, they would work meanwhile on their farms. There has been no change in the nature of work ever since the godown started its operations. However the intensity of work has increased as the inflow and outflow of PDS rice has increased in recent years.

Wages and Benefits

Payment is piece rated; the current rate being Rs. 5 per bag for unloading the rice procured from rice mills. The payment is done by the rice mills themselves. When FCI lifts the grain from the godown, the loading the rate paid to the loading labour is Rs. 1 per bag. Every two years the piece rates are revised using the prevalent piece rate as the basis. But the rate of improvement depends on negotiations between the labour groups and the investor or contractor. Other than the piece rate there are no other benefits, such as group health or life insurance. The payments are accumulated for a week and payments are made on a weekly basis.

On the day when peak levels of unloading or loading take place, it is possible to earn up to Rs. 500 to 1000 a day - rarely up to Rs. 1500. Otherwise when the work is slack then daily earnings could be even below Rs. 100. The household consumption expenditure ranges from a minimum of Rs. 4000 to 6000 per household per month depending on the household size ranging between 3 and 5. As most of these wage labourers (*hamalis*) have diversified activities such as own farming, and other non-farm activities along with this FCI labour work, they have multiple sources of income. From our FGD it was not possible to calculate total annual household income to match consumption expenditure. But some of them said, in order to smoothen their consumption expenditure – and depending on the necessity and urgency – they are forced to borrow.

Concluding Observations

It is observed that as the rice cultivation in the study area is increasing, there is crop diversification towards rice. As a result labour use in agriculture is also diversifying toward rice cultivation. However, the labour use in rice production in terms of labour units per hectare is declining over time in the study area and it is in tandem with the trend at the state and national level. A major factor in declining labour use in rice production is mechanisation particularly the use of tractor in ploughing and use harvester in harvesting operations of rice production. With respect to labour relations, there almost zero down for the use attached labour in the region not only for rice cultivation but also for any other crop.

As there is an expansion of value chain of rice in the study area there is increasing labour use in the rice value chain which is a new phenomenon in the region. As most of the rice value chain is operated under private entrepreneurship, of course under the State regulatory system, the employment structure in the rice value chain is mostly informal in nature.

* * *

References

- Reddy, D. Narasimha and M. Venkatanarayana (2013a) “Rice Cultivation and Labour Use in Andhra Pradesh”, Manuscript, S. R. Sankaran Chair (Rural Labour), National Institute of Rural Development (NIRD), Hyderabad.
- Reddy, D. Narasimha and M. Venkatanarayana (2013b) “SRI in Andhra Pradesh: Achievements, Problems and Implications for GHGs and Work”, *RTGE Work-in-Progress Paper 13: Project on ‘Measuring Materiality in Informal Production-Distribution Systems’*, South Asia Studies, Oxford University.