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Growth and Distress in a South Indian Peasant Economy During the Era of Economic Liberalisation

Vamsi Vakulabharanam

The distributional changes among rural/agrarian populations during the era of economic liberalisation, both across nations as well as within them, have been under-explored (for an exception, see [Eastwood and Lipton, 2000]). While economic models have been developed to analyze the potential impact of liberalisation on different groups/classes of agricultural population within nations [Barrett, 1998 and Storm, 2001], little has been written about the actual impact of liberalisation on the relatively poorer sections in rural areas of LDCs such as small/marginal farmers and the landless labourers. This paper addresses these issues by focusing on the paradoxical growth process that has been unfolding in the agricultural sector of one region, Telangana, in South India during the era of economic liberalisation.

Going by growth performance alone, agriculture in Telangana has been doing remarkably well. It has had an exponential growth rate of over 4.7% over the last fifteen years [Vakulabharanam, 2003]. This is in the context of a widespread agricultural recession both across the world and within India [Rao and Storm, 2003]. Given the fact that there has been a steady fall in the real output prices of the most important crops for Telangana, i.e. the non-food grain crops during the last decade (see Figure 1), the sustained growth rate in Telangana non-food grain real agricultural output is not easy to understand.

In the realm of distribution, there has been significant decline in the welfare (consumption levels) of the marginal farmers as well as agricultural labourers in this region as the National Sample Survey (NSS) data indicate, as it has also manifested in the unprecedented wave of suicides of more than a thousand farmers between 1998 and 2002 [Chowdhary et. al., 2002]. Growth in real agricultural output with the concomitant declines in welfare (increasing distress) for most groups of farmers constitutes a puzzling phenomenon. To explain this phenomenon, I employ the concepts of *growth-inducing distress* and *distress-inducing growth* that I explain in detail in a later section. These concepts are used to capture the stories of growth and increasing distress, which I argue have become mutually intertwined in the Telangana

region during the era of liberalisation.

[Figure 1 Around Here]

Liberalisation and Agriculture

The literature on liberalisation and agriculture in the developing world has been an intensely contested space between two opposing schools. In the first school, the dominant notion is that there was a policy-bias against agriculture during the pre-liberalisation era in LDCs. Output prices were kept artificially low. Input prices were distorted through subsidies. The way to correct this bias is, they argue, to make LDC agriculture more open to global trade and remove the incorrect price incentives from the agricultural arena. This implies adoption of three policy imperatives – to remove the discrepancy between border (global) prices and the domestic prices thereby, allowing domestic prices to rise; to remove restrictions on agricultural imports thereby, allowing the logic of comparative advantage to prompt reallocations of land and other inputs in cases when domestic producers cannot compete successfully with imports; and finally to remove subsidies that tend to distort input prices for agriculture [Schiff and Valdes, 1992, Krueger, 1992, and Gulati and Kelly, 1999].

The second school has questioned most of the above arguments made in favour of agricultural liberalisation. First, they argue that the current international trade in agriculture does not happen on a level-playing field, with the farmers in the LDCs getting insignificant subsidies while the farmers in the developed economies get substantial subsidies [Rao and Storm, 2003, and Reddy, 2002]. Second, they question the proposition that bringing domestic prices closer to world prices would result in a more rational allocation of resources in agriculture. This is primarily because, as the proponents argue, international prices do not really reflect the comparative advantage between countries in total production but instead reflect the residual market that is created by the relatively small surpluses and deficits that different countries send to the world market. Third, on grounds favouring food security, Sen [1996] and Patnaik [2002] argue that there is an imminent danger resulting from trade liberalisation that

would push low-income economies from the production of cereal/ food grain crops to non-cereal crops. The essential food grain commodities that the poor require may not be attractive enough to figure in the new global division of labour, and even if they do, they might witness increases in prices that will adversely affect a majority of the rural population, who are net buyers of food [Barrett, 1998].

The findings of this paper broadly support the claims of the second school, while taking into account the specificities of the Telangana case.

Agricultural Liberalisation in India

When India embarked on IMF-induced stabilisation policies and World Bank-induced structural adjustment policies in 1991, the main focus of policy makers, economists and the media was on industry, finance and openness of the economy. Even though certain *ad hoc* measures such as opening up of seed markets, and decontrolling fertilizer prices were introduced in agriculture around 1991, agriculture largely stayed out of the policy focus. In 1994, India signed the Dunkel draft under the GATT multilateral agreement and formally accepted to liberalise agricultural trade under the Agreement on Agriculture (AOA). The drive towards agricultural liberalisation continued in India under the aegis of the WTO. A summary of the important policy changes that occurred under agricultural liberalisation is presented in Table 1.

[Table 1 Around Here]

Agricultural liberalisation in Andhra Pradesh

The salient features of the new strategy of the agricultural department in Andhra Pradesh are as follows. The old state-centered paradigm emphasising land reforms and subsidies was abandoned. The new paradigm emphasised agricultural growth, export-oriented farming, value addition in agriculture, consolidation of land holdings by changing the lease structures, and investment of corporate capital in agriculture. The state government has been a leader among various states in implementing the reforms listed in Table 1. Some of the measures introduced in the

state have had the effect of increasing the input costs for the farmers. First, power subsidies have been cut significantly [Murthy, 2001]. The share of subsidies given to agriculture in the annual state government expenditure has come down from about 7% in 1991 to about 3% in 1998. In terms of per-hectare impact, this reduction hurt those farmers with small landholdings much more than the rest [Chowdhury and Reddy, 2000]. Second, large-scale measures have been introduced to channel institutional credit through micro-credit structures that the World Bank has been popularizing across the world after the success of the Grameen Bank experiment in Bangladesh (summary from the agricultural policy document, Andhra Pradesh).

On the whole, there is enough evidence to argue that liberalisation policies have had a significant impact on Indian agriculture and in particular on Telangana agriculture. In the next section, I look at empirical evidence on the distributional effects of these policies from across the developing world, and in particular, Telangana.

Liberalisation and Distribution

In the Indian context, recent statistical estimates [Rao and Storm, 2003 and Deaton, 2003] point to the fact that after reforms were introduced, agricultural output as well as inequality stagnated in rural areas while poverty has declined roughly at the same rate as in the decade prior to liberalisation. While the success of agricultural growth in Telangana might make the region somewhat exceptional, the story that I narrate below of the welfare declines of small producers and labourers might be more universal across the country [Sen, 2003].

Welfare Declines of Marginal Farmers and Labourers During Liberalisation

Based on the land ownership data in the Indian national sample survey, a household can be classified as primarily self-employed in agriculture, labouring in agriculture, self-employed in non-agriculture, labouring in non-agriculture, and 'others.' Using these latter data, it is possible to identify those families that have land while taking part in agriculture as peasants or labourers.

The per-capita expenditure for each class can be calculated by dividing the total expenditure of each class by the total number of people in the population. I made these computations, corrected for inflation, for the years 1983-84, 1987-88, 1993-94 and 1999-00. Table 4 presents the values for the first three rounds and the adjusted values for the 1999-2000 round.

[Table 4 around here]

From the table, a few observations can be made. First, the average per capita expenditure in the rural areas for both Telangana and AP goes up between 1983 and 1993 i.e. the pre-liberalisation period, and comes down rather sharply in the post-liberalisation period. Second, there are steep declines for the landless labour and marginal farmers in the post-liberalisation period reversing the trend of the earlier period when they were experiencing gains. Third, while the large, medium and small farmers also experience declines after the advent of liberalisation, these are less perceptible than those of the two classes that I mentioned above. On the whole, during the liberalisation period, per capita expenditure values for all the classes have fallen even though the declines have been sharper for the poorer sections.

Growth and Distress

The continuation of the growth process is certainly due in part to liberalisation, but not because of the reasons stated by advocates of agricultural liberalisation. I unravel the two paradoxes mentioned in the introduction by arguing that growth and distress are mutually causing each other in Telangana. This is consistent with the fact that those districts that have been witnessing the highest growth rates have also seen the highest number of suicides.

Growth-Inducing Distress

Telangana's growth process can be termed 'lagged-green revolution.' The green revolution technologies diffused mostly from the neighboring region of coastal Andhra to Telangana. In order to explain the growth process, I focus on inputs into production and a Chayanovian mechanism described below. The yield

(output/hectare) component of growth has been significant, accounting for two-thirds of the total growth achieved during the last thirty years [Vakulabharanam, 2003]. This reflects primarily the increased use of inputs such as HYV seeds, fertilizers, pesticides, labour and new technologies in this region. For instance, the usage of nitrogenous fertilizers has increased from 26393.4 metric tonnes in the agricultural year 1969-70 to 540775 metric tonnes in the agricultural year 1999-2000, while the usage of phosphate fertilizers has increased from 8012.2 metric tonnes to 231103 metric tonnes during the same period in Telangana (from Season and Crop Reports of the State of Andhra Pradesh). New irrigation systems – largely ground water based systems – emerged to support the new methods of farming. Agricultural growth is a result of these new processes.

Growth-inducing distress in Telangana during liberalisation

During the pre-liberalisation period, as welfare levels and prices of non-food grain crops improved, producers responded to these changes by substituting labour for leisure through the substitution effect and cultivating more non-food grain crops. This was done in conjunction with increased use of inputs as is evident from the above discussion. As real prices improved for non-food grain crops, the farmers also responded by increasing area. During the liberalisation period, however, as welfare declines set in, and as real prices for non-food grain crops decline, farmers are still increasing area under non-food grain crops resulting in a negative area response to prices. In particular, marginal farmers, who usually do not have access to irrigated land, can cultivate only non-food grain crops. Also, from Figure 1, it can be observed that food prices are increasing. As a result of this, net buyers of food grains, i.e. mainly the marginal farmers and labourers, face more welfare declines. In order to counter these revenue falls and welfare declines, farmers have increased area, labour time, as well as use of inputs. This is a typical Chayanovian mechanism [1966] wherein the small farm producers tend to substitute labour/effort for leisure on a labour-leisure continuum as they face welfare declines. Chayanov observed that the

peasants try to safeguard a certain level of minimum consumption even under extremely trying conditions.

Distress-inducing Growth

Volatile revenues and rising costs of production for non-food grain crops

I showed in Figure 1 that the output prices have been falling for non-food grain crops over the last decade. However, the revenue accrued from crops is arrived at by multiplying the price by the yields on a given unit of land. I use the Statistical Abstracts of the State of Andhra Pradesh to generate the gross revenues for a sample crop, cotton. Gross revenues have fallen after 1995 with the fall in output prices of cotton *kapas* even though yields are rising. Input prices are available in a different data source, the Costs of Cultivation Program, conducted by the Government of India's Agricultural Crops and Prices Commission. I present the input cost data for cotton in Figure 4, in order to illustrate the trajectory of input costs between 1985 and 2000.³⁸ Over the recent past, costs have been generally higher than revenues. Input costs have been rising for the farmers partly because of the sudden dismantling of the subsidies and decontrolling of various input prices. This indicates that costs of cultivation per unit of land are rising steadily while revenues have been volatile. This indicates welfare losses for the farming population in cotton cultivation. Cotton in many ways is symptomatic of more general welfare losses for farmers as evidenced above from the household survey data.

[Figure 4 Around Here]

There are two sample input markets, which have been particularly affected by the reforms introduced under liberalisation. These are the power sector and the credit markets that I have described in greater detail in the paper.

Local Political Economy: Product and Credit Markets During Liberalisation

Telangana witnessed two phases of major peasant struggles during the 20th century. The first of these occurred between 1946 and 1951, when Telangana was still

a princely state under the rule of the Nizam though under the overall control and influence of the British. The local peasantry fought against the excessive feudal exactions and highly unequal land distribution. The movement was successful in bringing about legislation that eliminated the feudal exactions and provided protection for tenants. The second phase of peasant struggle started in mid 1970s and still goes on. During this phase, the remnants of the earlier feudal institutions were further attacked. While these phenomena are discussed elsewhere in much greater detail [Sundarayya, 1972 and Pavier, 1981], I present here the set of changes relevant for this paper. Before 1950, small peasants had to give up most of their produce to the state and the feudal intermediaries. As the extractive role of the state and the feudal intermediaries reduced after 1950, a greater portion of the peasant surplus was retained within the peasant households and the village economy. In fact, between 1950 and 1985 or so, this situation improved somewhat in favour of the small peasantry (Source: Reddy [1991] and NSS calculations above).

Between 1985 and 2000, however, the extent of market-oriented cultivation has risen rapidly as I have noted above. This has tremendously increased the role of market intermediaries in the peasant economy of this region [Vakulabharanam, 2004]. These intermediaries, who supply most of the capital requirements for the peasants and purchase the final product from them, appropriate a significant chunk of the surplus produced by the peasant households. As the role of the intermediaries deepens in Telangana, an interesting structure has come into existence. Merchants, who are also moneylenders, provide capital to the peasants at the beginning of the cropping cycle. The peasants still control the production process but they need to sell the crop to the same merchant, who has initially lent the money to them. Added to this, the moneylender usually imposes a collateral usually in the form of non-food crops that he then sells to outside merchants. During the 1980's when the peasants switched to non-food crops (mainly cotton), the non-food output prices were consistently rising. Since the 1990's, due to the trade liberalisation-induced decline in non-food output prices, and the escalation in the costs of cultivation induced by domestic liberalisation, there are two effects. First, the Telangana peasants are forced to grow more non-food

crops in order to satisfy the lien constraint, which stipulates that the value of the non-food crop grown by the farmer be at least as much as the amount borrowed, while they also face significant welfare declines because a significant chunk of their output has to be now devoted to satisfying the lien constraint. Even as the welfare levels of the farmers decline, the creditors' incomes rise. This situation is similar to what happened in the post-bellum US South, where there was cotton overproduction (growth) even as the sharecroppers witnessed steep declines (immiserisation) in welfare [Ransom and Sutch, 2001]. As a result of these processes, the peasants have been giving up a larger chunk of their surplus to the market intermediaries over the last fifteen years (observations from field work surveys) causing distress-inducing growth.

Conclusion

Telangana's agricultural growth, derived in large part from the growth of non-food grain crops, has been quite remarkable. But in a depressed price environment for non-food grain crops, it is hard to explain. The phenomenon at work here seems to be *growth-inducing distress*, which in the context of a Chayanovian labour-leisure trade-off, leads to increased growth as households become progressively impoverished. At the same time, despite the impressive growth performance of Telangana, peasants are becoming increasingly impoverished due to the interplay between liberalisation-induced price shocks (output and input) and local credit institutions. This is the phenomenon of *distress-inducing growth*. As institutional credit recedes, peasants are becoming much more dependent upon merchant and moneylender capital. The latter gets remarkably high returns – 24% to 60% per annum depending on the urgency of the capital requirement. As things stand, this capital will continue to thrive on what Chayanov [1966] terms as the self-exploitation of the peasant households.

Many essays in the farm size vs. agricultural productivity debate convincingly show how the small farms actually have better yields than the large farms in different contexts [see Herring, 1983 and Binswanger et al., 1995]. There are

several examples of successful peasant agriculture across different contexts and different times. I will cite two of them – one from recent history and another from a relatively distant history. The first and a widely cited example is the success of small peasant agriculture in East Asia and Southeast Asia during the past fifty years. The second successful example is English agriculture between 1450 and 1850. Robert Allen [1992] convincingly argues that a significant part of the efficiency gains in English agriculture during the 15th to 18th centuries ought to be attributed to yeoman farmers instead of the enclosure movement. Contrary to such evidence from multiple contexts, the State Government of Andhra Pradesh has been arguing that the increased distress actually indicates that peasant agriculture is unviable in a liberalised world and should therefore be replaced by contract farming or corporate farming. The policy makers also ignore earlier studies that document the harmful effects of contract farming elsewhere [see Watts, 1994]. In this scheme, the present small/marginal farmers will become future labourers at the disposal of the corporate farmers or the MNCs. The main insight from this paper that policies during the liberalisation era might be playing a crucial role in making peasant agriculture unviable ought to be taken seriously and changes have to be brought about in the policies to ensure that peasant agriculture survives in this region.

The Telangana case study is useful in reviewing the agricultural liberalisation policies and proposing alternatives to these policies. It is crucial to return to important policy themes such as instituting land reforms, improving institutional credit and providing a safety net for the marginal farmers and the landless if large-scale distress is to be avoided. Until a level playing field is created across the entire world, it is also important to enquire into the possibility that trade liberalisation might simply be a way of propping up a subsidy-supported First World agriculture at the expense of the millions of farmers who are on the verge of life and death in the less developed world. Otherwise, we may have to contend with several tragedies.