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MAIZE PRODUCTION,
DISTRIBUTION POLICY, AND
THE PROBLEM OF FOOD
SECURITY IN ZIMBABWE'S
COMMUNAL AREAS.

by

Nick Amin

DPP Working Paper No.11

Development Policy and Practice Research Group

Faculty of Technology

The Open University

December 1988

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MAIZE PRODUCTION, DISTRIBUTION POLICY AND THE PROBLEM OF FOOD SECURITY IN
ZIMBABWE'S COMMUNAL AREAS

Introduction

The purpose of this paper is to examine two issues concerning food security in Zimbabwe. Both issues have come to be increasingly felt during the post-independence period and relate to particular economic conditions in the communal areas (formerly the Tribal Trust Lands). Firstly, evidence suggests that the contribution of the communal areas to national agricultural marketed output has been steadily rising since 1980. Compared to the volume of marketing from the communal sector during the UDI period, developments during the post-independence period represent a shift of significant proportions. For maize, the most important food crop in Zimbabwe, sales from the communal sector alone to the Grain Marketing Board (GMB) have risen from about 4% in 1979/80 to 37% in 1985/86; similarly for cotton, sales from the communal areas (including resettlement areas, small-scale commercial and ARDA estates) to the Cotton Marketing Board rose from 19% in 1979 to about 47% in 1985. From a national food security point of view the communal sector has played an important role in helping to maintain high levels of self-sufficiency within the country despite three successive years of drought since independence.

So significant has the contribution of the communal sector been (at least for maize) to national food security that in the post-independence period in only one year was it necessary for the country to import maize (in 1984/85). Otherwise in most years since 1979, Zimbabwe has been a net-exporter of maize. If to this record of maize exports we add cotton exports (which also have increased since 1980) the significance of the communal sector to the national economy becomes relevant both as a supplier of food and as an earner of foreign exchange. An important question, however, is how sustainable is this contribution? Experience over the past 6 years indicates no sign that the 'success' is a temporary phenomenon, although more recently the rate of expansion in market sales from the communal areas has slowed down a little.

The growth of agricultural sales from the communal sector have surprised many observers both within Zimbabwe and outside the country. At the time of independence, reports suggested that in relation to the 'white' settler farming areas and the African small scale commercial areas (formerly the African Purchase Areas), the communal lands showed very low productive potential, having suffered from a long period of neglect as a result of colonial discrimination. Prior to independence Riddell (1978) and indeed others (e.g. Whitsun, 1978; Kay, 1970; UNCTAD, 1980) wrote of extremely difficult agrarian conditions in the communal lands in which the most important characteristic was the degradation of land because of over-use and over-grazing which over time had resulted in creating severe shortages of good land in some parts of the country. Low levels of output and declining real incomes in the communal lands were put under considerable strain during the liberation struggle as a large army had to be supported so that by the time of independence these areas were in need of repair and regeneration (Riddell 1978; Whitsun, 1978). The severity of conditions due to over-population and over-grazing (both being symptoms of land shortages) was such that it seemed unlikely that land productivity and income levels of inhabitants in the communal areas could be increased without a substantial land re-distribution programme. Despite the centrality of the land question in Zimbabwe, resettlement or land reform has not proceeded at a rapid pace since independence. Current estimates suggest that 36,000 families have been settled on about 50 settlement schemes involving 2 million hectares of land acquired by the state (Cliffe, 1986). The government had intended to settle 162,000 families but due to a variety of problems namely financial, those caused by 3 years of drought and the lack of a real political commitment, the progress of the resettlement programme has been slow. The first five year plan (1986-1990) states that another 75,000 families are planned to be settled on new land, the acquisition of which the government hopes will be made easier under the 1986 Land Acquisition Act. (Government of Zimbabwe, 1986).

What is remarkable about the communal sectors recent development experience is that the growth in the marketed output has been achieved without a major re-distribution of land. Given that conditions in the communal areas are still difficult, as population densities (of both humans and cattle) remain high and well above the national average, the expansion of agricultural and food market sales presents something of a paradox. Further investigation,

however, reveals that economic and social conditions in the communal areas are not even; wide inequalities exist in the distribution of resources between people and between regions and partly as a result of these differences the rates of output growth have varied markedly within the communal sector. Thus while some regions and sections of the population in the communal areas have advanced economically during the past few years, other regions and inhabitants have not experienced such progress, or rather their conditions remain somewhat unchanged since independence. In these latter regions primarily located in the south-western, southern and eastern periphery of the country, the problem of land pressure has manifested itself in complex ways; there is both a severe shortage of arable land and grazing land and at the same time despite a problem of over-grazing which superficially suggests 'too many cattle', draft power available for arable farming is desperately short in supply. National household sample surveys indicate that in the communal lands of Masvingo and Midlands provinces, about 43-55% households do not own any draft cattle (CSO, 1985a).

In other regions too, the lack of draft power is critical. For example, the results of surveys show that in Mashonaland Central, 49.4% of households owned no cattle; in Mashonaland East and in Manicaland 40.6% and 47% of households, respectively were without draft animals and had to rely on hiring or borrowing draft traction (CSO, 1985a). The problems caused by inadequate access to draft power mean that producers in communal areas face difficulties in performing tilling operations; low yields and low incomes from cultivation are the result (Rukuni, 1985).

The second principal issue which this paper examines concerns the relatively high incidence of under-nutrition and malnutrition that has recently been reported in the communal areas. Several studies indicate that the problems of obtaining access to a nutritionally adequate diet are particularly acute for women and children living in the rural areas: (a) among the families of farm workers in the predominantly 'white' commercial farm sector and (b) among communal area households (World Bank, 1983a; Moyo et al, 1985; Loewenson, 1984; UNICEF, 1985). Compared to the urban areas, evidence suggests that Zimbabwe has a food security problem in the rural areas despite high levels of self-sufficiency within the country and the recent rise in marketed food sales from the communal areas. Existing mechanisms for distributing food (especially maize) appear to be working

primarily for the benefit of the urban population. A review of maize price and marketing policy reveals that the main beneficiaries of state policy have continued to be large-scale commercial farmers, to some extent communal area producers, and high income urban consumers (although up until 1982 the urban poor benefited from consumer food subsidies (Callear, 1981; Davies and Saunders, 1987)). The paper therefore examines the factors which have resulted in contradictory developments in the communal areas; between, on the one hand, rising market sales of some agricultural commodities (e.g. maize) and on the other hand the continuation of difficulties in obtaining proper access to a nutritionally adequate diet among sections of the rural population. A full examination of the manifestation of contradictory developments in the communal areas is seriously hampered by the absence of disaggregated data on food production and on the structure and operation of rural food markets. As a result neither the social origins of agricultural commodity sales to national markets from the communal areas, nor the groups of people for whom access to food is a continuing problem can be adequately examined. Current evidence therefore only enables the broad identification of some of the factors that may be associated with the persistence of rural food insecurity in Zimbabwe.

The organisation of the rest of the paper is as follows:

Section 1 describes broad differences in the patterns of agricultural production between the communal lands and the large-scale commercial farming areas. While noting output and productivity differences for maize between the two agricultural sub-sectors it is shown that in certain parts of the communal areas there has been considerable growth in output and yield levels since 1980 primarily as a result of an increased rate of commercialisation in the crop economy. The increased use of credit and modern farming facilities have all helped to raise levels of maize output in the communal areas. However, owing to a variety of constraints which continue to block progress in the communal areas, the maize success story to which attention has been paid (Nagel, 1985; Eicher and Staatz, 1985) only appears to be true for some regions which benefit from relatively high and reliable patterns of rainfall.

Section 2 outlines the discriminatory price and marketing system for maize which evolved in Zimbabwe between 1930 and 1980. Relying mostly on

secondary historical material for this period, the effects of changes in the conditions of exchange faced by African maize producers are briefly examined. It is argued that while conditions for African maize producers had improved somewhat between the Second World War and before the Unilateral Declaration of Independence (UDI), there was a gradual worsening in the situation between 1965 and 1980 as white farmers progressively switched production away from tobacco to maize and as African maize patterns were forced further towards subsistence production. Consequently maize supplies from African agriculture declined dramatically and by 1979/80 only 7% of maize deliveries to the Grain Marketing Board originated from that sector, whereas during the fifties over 30% came from the latter sector.

Section 3 continues with the focus on the marketing system and documents the main developments that have occurred since 1980. It is shown that in comparison to the pre-independence period, exchange conditions for many producers in the communal areas have improved in recent years. Maize sales from these latter areas to the Grain Marketing Board have consequently increased dramatically, but as disaggregated data indicate, the maize marketing success has been limited to certain parts of Mashonaland, where, as shown in Section 1, it is only there that maize output levels have been rising since independence. A more comprehensive account of the factors associated with this rise in output and market sales is provided in this and in Section 4 where it is suggested that though the recent maize production and marketing successes have helped to raise the country's level of food security, in most rural areas there is a serious food problem.

Section 4 provides a discussion of changes in agricultural price and food subsidy policy in Zimbabwe since 1980. In the case of maize two periods regarding food policy are identified: firstly between 1980 and 1982 during which price and subsidy policies are argued to have benefited maize producers (mainly the large-scale farmers) and urban consumers - including the low paid wage workers; and secondly, between 1983 and 1986 when the net beneficiaries of price policy appear to have been the large-scale commercial farmers, to some extent communal area producers and some high income urban consumers. Evidence obtained from a number of reports generally support the view that food price and marketing policies in Zimbabwe have not essentially managed to tackle problems of food insecurity

faced by a number of households in the rural areas. The paper argues that although there is some information which indicates that there is an apparent food problem in Zimbabwe's communal areas, the precise mechanisms relating to continuing difficulties over obtaining nutritionally adequate amounts of food are at present only vaguely understood. Preliminary investigation reveals that for an adequate conceptualisation of rural food insecurity, details of the structure and functioning of food markets, as well as further research on household exchange relationships, are required. By way of a conclusion, the final section briefly outlines issues which would provide the focus for such future research.

SECTION 1 Characteristics of Agricultural Production in the Communal Areas and the Commercial Farming Areas

Agricultural production in Zimbabwe now occurs in five sub-sectors as opposed to three at the time of independence (i.e. white commercial farming sector, African Purchase Area and Tribal Trust Lands). The reason for the increase in the number of sub-sectors since 1980 is due to reforms implemented by the post-independence government to re-settle black Africans displaced during and after the struggle for liberation and secondly due to the take-over of abandoned farms by the state, the responsibility of which has come to be ARDA's, a parastatal institution. Despite reform measures to redistribute land, the bulk of the country's agricultural output is still produced by the (predominantly white large-scale) commercial farmers. The commercial farm sector as a whole (which includes small-scale commercial farmers) accounted for about 75% to 80% of the total value of agricultural output¹ between 1980 and 1984 (Agricultural Marketing Authority, 1984; CSO, 1987)

The communal lands (formerly the Tribal Trust Lands) form the second largest agricultural sub-sector but for which precise information on production is not available. However, it is generally believed that a fifth of total agricultural production occurs in the communal lands and

¹The total value of agricultural output is composed of sales from all sectors and an estimate of production in the communal areas which is for 'own consumption'. The latter is estimated by the Ministry of Agriculture from crop forecasts and assumed per capita consumption figures valued at current production rates.

that the resettlement farms and ARDA state farms together do not account for a large proportion of national output.

Thus, a major feature of agriculture in Zimbabwe is the division between the commercial farming areas (CFA) and the communal areas (CA). The former areas are comprised of about 5,000 large-scale farms, mainly owned and operated by white farmers and foreign multinational corporations and small-scale farming units owned and operated by around 8,000 black Zimbabweans. One distinctive aspect of production in the commercial sector whether large-scale or small-scale (i.e. the former African Purchase Areas) is that it is based on freehold tenure. In 1982, the total amount of land estimated to be in the commercial farm sector was slightly over 17 million hectares (see Table 1).

In contrast to the commercial farming areas land tenure in the communal lands is not based on Roman/Dutch Law, instead individuals have 'use-rights' (currently administered by district councils) which are determined by what may be loosely described as 'customary law'. The principal difference in land tenure between the communal and the commercial sub-sector is that in the former land cannot be purchased or sold. Each family residing in the communal areas according to custom has the 'right of avail'. Basically this means that men after marriage can acquire the right to: cultivate land, graze livestock on common lands, use water resources, cut timber for building and firewood, a plot of land on which to build a house (World Bank, 1983b). Despite the term 'communal', in reality, tenure in these areas is highly individualised as far as arable holdings are concerned.

TABLE 1 Division of Agricultural Land by Sub-Sector in Zimbabwe

Sub-sector	Land area	Period of Estimate	Approx No. of families (1986)
Large-scale Commercial	15,527,000	1982	5,500**
Small-scale Commercial (Former African Purchase Areas)	1,606,500	1982	8,000
Resettlement Areas	2,100,031	1985	36,000
ARDA State Farm	78,702	1984	na
Communal Lands	16,488,100***	1982	800,000

Source: Central Statistical Office, 1982 Population Census; Ministry of Lands, Resettlement and Rural Development; 1986, D Weiner et al, 1985.

Notes*: Total area includes agricultural and forest land. Actual area utilised for farming was 13,516,000 ha. in 1982 (see Crop Production Statistics of Commercial Farms in 1982; CSO, 1984)

** Estimate applies to number of farms in 1983 and not families.

*** Includes land for arable purposes and grazing.

It is estimated that in the range of 750,000 to 800,000 families derive a livelihood from about 16.5 million hectares in the communal areas. In comparison to both commercial farm sectors, in the communal areas, the arable and grazing land available per family is considerably lower, approximately 20 hectares on average for each family as opposed to an average holding size of roughly 2,500 hectares in the large-scale commercial farming areas and 365 hectares in the small-scale commercial farming sector.

In contrast to the large-scale commercial farming sector where as noted earlier the large bulk of Zimbabwe's crop and livestock production occurs and is produced almost entirely for the market, agricultural production in the communal lands is oriented towards subsistence as well as for commercial purposes. The socio-legal differences, which underpin the separation between the communal and commercial farming areas, have phenomenal effects of underlying differences in the social relations of production. In the commercial areas (in particular the large scale sub-sector) capitalist social relations predominate and accumulation is premised upon the exploitation of wage labour (proletarianised and semi-proletarianised). However, in the communal areas, production is generally carried out by household labour on individualised plots of land with only the occasional hiring-in of seasonal wage labour and even then, such hiring

is usually confined to some sections of the rich peasantry. Thus, quite distinct modes of economic calculation separate farm enterprises from one another across the two main sub-sectors. Finally, it should be noted that in the commercial farm sub-sector, relations of production are highly varied among the small-scale producers of the former African Purchase Areas. Thus, while in the case of some producers (at one end of the range) accumulation is based solely on the use of wage labour, for a large number, production is based primarily on the use of household labour under conditions of production that are not too dissimilar to those prevalent in the communal areas. The major crops in the communal areas are maize, cotton, groundnuts, sorghum and millet. Maize is the most significant crop in the agrarian economy of the communal areas, although in the southern part of the country levels of maize production are lower and more drought resistant crops such as sorghum and millet are of greater significance.

Finally, it needs to be noted that within the African agricultural sector levels of commercialisation in the output market have varied over time. A number of historical studies (Palmer, 1976, 1978; Riddell 1978; Keyter 1978; Moyana, 1984; Phimister, 1978; Weinrich, 1975) point out that in different periods deliveries of maize, meat and other food commodities by African farmers to towns and mining areas were common, and that in certain times (e.g. in 1920) the proportion of output that was marketed was quite significant. While 'food sales' from the African agricultural sector have been known to occur over a considerable period of time, because of changes in state policy, commodity flows from that sector have tended to fluctuate, rising in some periods and falling in others (see below for details). The colonial state by means of fiscal measures, price and marketing policy 'controlled' the volume of food sales originating from the African sector; consequently, the importance of the latter sector in relation to settler farming areas in supplying food commodities to national and international markets continually changed throughout the colonial period. The presumption that the African farming sector was always an enclave cut off from commercial processes and in which production was determined wholly by subsistence needs is altogether incorrect.

1.1 Communal Area Productivity, Some Comparisons and Recent Successes

Differences between the communal areas and the commercial farming areas are not only due to differences in the relations of production and in tenurial conditions but also due to a difference in the scale of production as well. In the large-scale commercial farming sector there is an intensive use of purchased inputs and capital machinery. However, in the communal areas input utilisation levels are comparatively low although use-rates of yield increasing inputs have, since independence, risen considerably (Bratton, 1986, 1987; Rohrbach, 1985; Stanning 1985). Production in large-scale commercial farming is therefore based on the use of advanced technology and as a result yield levels for most crops have tended to be significantly higher in the commercial sector compared to the average levels recorded in the communal areas (Chavunduka, 1982; Weiner, 1985; Ministry of Lands Agriculture and Rural Resettlement, 1986). Productivity estimates consistently show that the highest yields for a variety of crops are achieved in the large-scale commercial farming sector and that the lowest tend to be in the communal areas (Tattersfield, 1982; Rohrbach, 1985). For example, according to Tattersfield (1982) average yields for maize in the former sector have been estimated to be as much as five times higher than those obtained in the communal areas.

However, since Tattersfield estimates relate to a period when substantial changes had not taken place in the communal areas, productivity differentials need to be examined for more recent years. It is also necessary to take specific cognisance of regional differences within the communal areas since climatic variations, an uneven spread of infrastructural facilities and different patterns of input utilisation are all factors which are known to affect productivity levels quite dramatically (Weiner et al 1985). In fact, recent estimates of yields for individual crops reveal that while productivity is generally lower in the communal areas than in the large-scale commercial farming sector, yield differentials between the two sub-sectors are not as great as those suggested by Tattersfield especially when the data are examined at a disaggregated level in terms of different agro-ecological zones.

Table 2 shows that for maize, productivity differentials between the sub-sectors are significantly lower than the levels suggested by Tattersfield and the World Bank (World Bank 1983b). The table also indicates that there are large differences in yield levels between the various agro-ecological zones in both agricultural sub-sectors and if meaningful comparisons are to be made, then explicit recognition of zone differences will be needed.

TABLE 2: Maize Yields (Kgs/ha) in Commercial and Communal Areas

Agro-ecological Zone (1)	Large-scale Commercial 1974/5 - 1978/9	Communal Area	Period of Estimate (4)
II	4,995	3,913 3,240 (2)	1981-83 1982
III	2,791	1,610 (3) 2,275 (3)	1981-82 1985
IV	2,310	864	1981-83

Notes: (1) Zone II comprises land which is better suited for intensive arable farming since rainfall is moderately high (750-1000mm) and relatively reliable. In contrast Zone III receives 650-800mm of rainfall annually but is infrequent and heavy. Mid-season dry spells are common. Zone III is best suited for semi-intensive crop and livestock production. Zone IV receives 450-650 mm average annual rainfall. Frequent mid-season dry spells makes crop production a risky venture unless under irrigated conditions. Draught resistant crops can, however, be cultivated in Zone IV

(2) Estimate for farmers owning draft cattle in Mangwende communal area; Rukuni, 1985

(3) Based on Truscott's study of Wedza communal area. The yield of 1610 kgs/ha and 2275 kgs/ha is not truly representative for Zone III since the study in Wedza included some farms in Zone IIB.

(4) All estimates apart from the one in 1985 were compiled in periods of drought.

Source: Weiner et al, 1985; de Jong, 1983; Truscott, 1985; Rukuni 1985.

Although yields of maize in the communal areas are much higher than estimates provided by Tattersfield (see World Bank, 1983a) the productive potential of the sector as a whole would appear to be less than that suggested in Table 2. This is because only a quarter of the cultivable land in the communal areas lies in agro-ecological Zones II and III where, as shown, productivity levels tend to be much higher than in Zones IV and V. As Table 3 shows, most of the agricultural land in the communal areas is in Zone IV and V, that is, in regions largely unsuitable for intensive arable

cultivation; whereas about 50% of the large-scale commercial farming areas is in Zones II and III.

Table 3: Distribution of Agricultural Land by Agro-ecological Zone, 1980

Zone and Related Farming Systems	Proportion of Land	
	Large-scale Commercial Areas	Communal Areas
	%	%
I Specialised and diversified farming region (high rainfall)	3	1
II Intensive farming region (moderate rainfall)	27	8
III Semi-intensive farming region (moderate but erratic rainfall)	22	17
IV Semi-intensive farming region (low rainfall)	26	45
V Extensive farming region (low and erratic rainfall)	22	29
TOTAL	100	100

Source: Ministry of Lands, Agriculture and Rural Development, 1986.

The low productive potential for most areas of the communal lands sector in comparison to the large-scale commercial farming sector is further evident when the distribution of agricultural land in each agro-ecological zone is examined in terms of the commercial and communal sub-sectors. Table 4 shows more clearly that the availability of 'good land' for purposes of arable farming and intensive livestock husbandry is concentrated in the large-scale commercial farming sector.

TABLE 4: Distribution of Agro-ecological Zones in Terms of Land Tenure

Farming Category	<u>Agro-ecological Zone (1)</u>				
	1 %	2 %	3 %	4 %	5 %
<u>Commercial:</u>					
Large-scale	71	69	45	28	26
Small-scale	-	4	4	4	2
<u>Communal</u>	13	21	39	50	49
<u>Other</u> e.g. National and unreserved lands	16	6	12	18	23
	100	100	100	100	100

Source: Chavunduka, 1982

Notes: (1) For explanation of agro-ecological Zones 1-5 see Tables 2 and 3.

Finally, Rohrbach, 1985 in a recent study comparing patterns of foodgrain production in the communal lands disaggregated by provinces (which to some extent reflect differences by agro-ecological zones), shows that maize output increased between 1977 and 1985 in all eight provinces examined. While much of this growth in maize output (average annual growth of 13.5% for all the communal areas) seems to have been caused by an expansion in the area cultivated (average annual growth 5.2%) the greater proportion of the increase was due to per hectare yield increases (average annual growth 8.3%) (Rohrbach, 1985). Disaggregated by provinces, the growth in maize yields show that although increases occurred in all provinces, the largest increases, with the exception of Matabeleland south for which the result is highly questionable, were in those provinces which had proportionately greater amounts of land in agro-ecological Zones I, II and III (Rohrbach 1985), and which therefore received moderate to high amounts of rainfall (see Table 5).

TABLE 5: Estimate of Maize Area and Yields in the Communal Areas by Province

Province	Maize				Distribution of Land Area by Agro-ecological Zone				
	1977		1985		1	2	3	4	5
	Area	Yield	Area	Yield ¹	%	%	%	%	%
	'000	kg/ha	'000	kg/ha					
Mashonaland Cent.	41	1,215	65	2,395					
Mashonaland East	47	749	127	1,851	0	31	29	32	8
Mashonaland West	46	89	88	2,381					
Matabeleland N.	60	328	61	979					
					0	0	0	52	48
Matabeleland S.	26	300	58	1,440*					
Midlands	179	771	368	1,319	0	0	52	38	10
Masvingo	161	751	220	911	0	0	7	41	52
Manicaland	87	524	165	1,569	7	17	21	31	25

Source: Rohrbach, 1985; Whitsun Foundation 1978.

Note: (1) Rohrbach uses Agritex estimates which are lower for most provinces than the CSO estimates (see CSO, Zimbabwe National Household Survey Capability Programme, 1985).

*Estimate questionable since this area has experienced long periods of drought and in comparison to other provinces, infrastructure is less well developed.

In spite of the data limitations (i.e. rough aggregate estimates for the provinces and available for only 2 points in time, 1977 and 1985), Table 5 contains a number of interesting findings. Firstly as indicated above, yield increases have tended to be highest in those provinces which have a greater proportion of agricultural land that normally receives relatively high and reliable amounts of rainfall. This broadly supports the existence of a positive correlation between agricultural performance and agro-ecological zones. The importance of the availability of adequate water supplies for ensuring high crop productivity is generally well known (FAO, 1986). Recent studies by the Farming Systems Research Unit (FSRU, 1984) and by Rukuni (1985) which examines the effects of different agronomic practices on crop production in two different communal areas conclude that

maize yields (and indeed those of other crops as well), were approximately two times higher in regions receiving higher than average amount of rainfall. The evidence generated by the FSRU research in general supports the findings of other studies examining the influence of natural regions (agro-ecological zones) on productivity and farm incomes (see Table 2 above).

Secondly, in most communal areas there has been an expansion in the area under maize since independence. To what extent this expansion has been achieved at the expense of other crops is not certain since Rohrbach finds the area devoted to sorghum and cotton has also risen. The only two crops for which there has been a decline in area planted between 1976/77 and 1984/85 are groundnuts and pearl millet, but this decline has not been sufficient to explain the rise in the area under maize, cotton, sorghum and finger millet. A plausible explanation for the increase in cropped area in the communal areas could be that the expansion took place with the ending of the war as outlying areas which had remained fallow during the liberation struggle came to be cultivated immediately after independence. Crop area estimates provided by Rohrbach support this view since most of the increase in maize area actually occurred in 1980/81 when 1,114,000 hectares were planted compared to 767,000 hectares in 1976/77 (Rohrbach 1985). Moreover, after 1980/81, the growth in maize area, and indeed for most other principal crops in the communal areas has been slower than that achieved immediately after independence. Assuming that in the communal areas most of the growth in areas planted under maize actually took place before 1981, this implies that the subsequent expansion in maize output recorded for that sector has been mainly due to rising yields in all the provinces. But as already indicated the greatest gains in yields have been in those regions where productivity levels were to begin with (i.e. prior to independence) already above average for the whole of the communal sector.

To summarise, most of Zimbabwe's agricultural production occurs in the commercial farming areas especially in the predominantly white-owned large-scale farm sector. Approximately 75-80% of total agricultural output originates from the commercial sub-sector. Both food (grains, vegetables and meat) and non-food commodities (tobacco, cotton, coffee, sugar) are produced in the commercial farming areas for domestic consumption as well

as for exports. Agricultural exports (mainly tobacco, cotton, tea, beef, sugar) amounted to Z\$568 million in 1984, constituting 45% of total exports (CSO, 1985b). Although no exports of maize were made in 1984/1985, in most years since independence Zimbabwe has exported maize. Amidst Africa's food crisis, Zimbabwe has succeeded in retaining a large measure of self-sufficiency in food despite three successive years of drought (1981-1983). This record of 'success' in maintaining a high level of domestic food security has been attributed to the favourable performance of the large-scale commercial farming sector (World Bank, 1983b). As noted earlier not only is a large proportion of national agricultural output produced on the large-scale farms, but productivity levels in comparison to the small-scale commercial farming sector and the communal areas are also significantly higher.

In contrast to farming methods in the latter two sectors, crop and livestock production in the large-scale sector is highly intensive, involving the use of mechanical inputs, technologically advanced farming practices, the intensive application of productivity raising agro-chemical inputs and the employment of both permanent and casual hired wage workers. Value added in the large farm sector has therefore tended to be approximately 2.5 times greater than average levels obtained on farming units in the communal areas (World Bank 1983b).

The communal areas lie in the peripheral areas of Zimbabwe. Most of these lands lie in the low potential agro-ecological zones and despite the fact that the communal areas in total occupy 16.4 million hectares of agricultural land (an amount that is roughly the same as that held by the large-scale farm sector) communal sector production currently accounts for less than 20% of national agricultural output (CSO, 1985b). Agricultural production in the communal areas continues to be constrained by a number of factors including; poor quality of land and soil erosion, low and erratic rainfall in most of the farming areas, high man-land ratios, over-grazing in several areas coupled with acute shortages of draft power for a significant number of farmers, poor infrastructural facilities, and generally unfavourable conditions of access to agro-chemical inputs. Low productivity and low value-added characterise much of the farming in the communal areas and although production in this sector has not always been subsistence oriented, prior to independence the greatest proportion of

total output produced was retained by households for consumption; it is estimated that approximately 7% of the output produced in the African agricultural sector was sold through state marketing agencies (Whitsun, 1978). In addition output was sold internally, that is, within the Tribal Trust Lands, but for which there are no firm estimates. However, it is generally accepted that commodity sales made within the African Agricultural sector were not substantial.

At independence estimates of productivity for the major crops grown in the communal areas indicate that average levels were about 1/5 or 1/6 of those obtained in the large-scale commercial farm sector (Tattersfield, 1982; Whitsun 1978). A number of observers during the late seventies and early eighties suggested that the agricultural potential of the communal lands was low since most of the arable land was concentrated in agro-ecological Zones III, IV, V and because population densities of humans and cattle in some areas were extremely high. At independence, it seemed unlikely that without major reforms and long term investment programmes that agricultural productivity and income levels could be raised in the short-term in the communal sector. Contrary to these earlier expectations (Riddell, 1978; Whitsun, 1982; Tattersfield, 1982; Stoneman, 1981; World Bank, 1983b) yields, output and marketed sales of some important crops (e.g. maize, cotton) have risen sharply since 1980, although as indicated above the greatest gains in productivity have been in those communal areas which lie in agro-ecological Zones II and III (see Table 5). It is important to stress that while improvements in productivity and a rise in income levels for some groups of producers in the communal areas has occurred over the past 6 years, these 'successes' are limited and confined to certain regions, namely in Mashonaland. For most of the communal areas a complex mixture of constraints continue to block progress, including, land shortages for arable farming as well as for grazing livestock, inadequate supplies of draft power and in certain seasons shortages of human labour, inadequate access to agro-chemical inputs and institutional credit and poorly developed market outlets.

Post-independence developments within the communal area indicate that patterns are not uniform both across regions and populations. Existing information and data for the communal region, however, do not allow a thorough analysis of the processes generating differential developments to

be carried out. Current evidence is only able to indicate that the rates of agricultural performance differ widely throughout the communal areas. More precise information is required on the factors associated with the recent increases in production and marketing. A recent report setting out development options for the communal areas stressed that while there is some broad consensus of opinions regarding the type of factors which constrain development in these areas, their specific manifestations in different parts of the country are such that a general policy set out to deal with particular problems, for example of 'over-crowding' and 'over-grazing' would not be adequate for all areas (Cliffe, 1986). Subsequent sections examine the development of contradictory tendencies in the communal areas and in particular focuses on whether recent production and marketing successes have helped to alleviate problems of access to food within the rural areas.

Most of the following discussion on the foodgrain marketing system in Zimbabwe relates to maize. Maize is the most important foodgrain in Zimbabwe: it is the main staple food in the country; over 50% of the current cropping area in the communal lands is devoted to maize alone (compared to 37% in 1976/77 - Whitsun, 1978); apart from cotton, sales of maize to official marketing bodies are at present the most significant for the communal areas; and finally, in recent years maize has been the principal foodgrain exported by the country.

SECTION 2 MAIZE MARKETING, PRICE POLICY AND THE TRIBAL TRUST LANDS - AN OVERVIEW 1930-1980

The origins of the present marketing system, though much reformed since, dates back to the 1930's when policy was first designed to serve and support white settler farming (Dunlop, 1970; Muir-Leresche, 1981a; Keyter, 1978; Shopo, 1985). Between 1930 and 1980 discriminatory pricing, the imposition of marketing levies and the maintenance of unfavourable conditions of access to state marketing institutions for African producers collectively acted to contain within limits the levels of commercialisation of output markets in the African agricultural sector. In the case of maize, the involvement of the state in marketing came about in 1931 with the passage of the Maize Control Act and the setting up of the Maize

Control Board which had sole buying and export rights. The 1931 Maize Act was passed in response to a wave of complaints mounted by settler farmers to a collapse in world prices.

Through the Maize Control Board the state attempted to protect white settler farmers by instituting a system of uniform domestic prices which were pitched high enough to compensate for low export prices and thereby enable producers to cover costs of production. African farmers located within the controlled areas (where most maize was grown) were legally entitled under the 1931 Act to sell directly to the board and be paid a uniform price. In practice however, due to the remoteness of the reserves from main marketing centres very few African producers could deliver directly to the board depots and were forced instead to sell maize to traders and white farmers, although strictly speaking the board disallowed direct sales to the latter category of buyers. African maize producers in controlled areas, according to the Act, had to sell to 'trader-producers' who in several areas held a monopsony and taking advantage of this, paid out low prices which caused producers considerable difficulties in meeting their tax commitments to the state and in raising enough cash to purchase their food requirements. Traders often did not purchase grain with cash and instead traded goods in exchange. For local tax officers the system of barter trading proved to be inappropriate as it merely exacerbated the difficulties of collecting taxes in cash. Problems of tax collection encountered by the state in African areas and as well as those faced by cattle ranchers and mining employers who found it increasingly difficult to purchase cheap grain from African farmers and who objected to paying the high prices which the Control Board institutionalised, eventually forced the state in 1934 to amend the 1931 Maize Control Act.

The 1934 Act which applied throughout the country was aimed at controlling the price which African producers were to receive and at the same time to institutionalise another price which was set much higher and was reserved exclusively for produce marketed by white farmers. A dual maize marketing system was therefore established that was managed by the Maize Control Board which operated a financial 'pooling' system through which it paid white farmers a higher price from local receipts and to African farmers a lower price (supposedly) based on lower export receipts (Muir-Leresche, 1981a; Keyter, 1978). The dual system proved to be highly efficient since

on the one hand it enabled white farmers to be subsidised by the state and on the other hand by keeping the price paid to African producers low, it allowed cattle ranchers, tobacco farmers and mining companies to obtain cheap supplies of grain and therefore helped to maintain the price of food (the principal wage good) at a low level (Keyter, 1978). The effect of the low prices for the African agricultural sector, in which producers were still required to pay taxes in cash, was to increase maize production and market sales. Consequently, by 1938/9 more than 54% of total production was marketed by the African producers compared to 23.5%-27.1% that was an average sold during the 3 years prior to the adoption of the Maize Control Act in 1931: i.e. over a period of about 10 years, maize sales from the African sector almost trebled (Keyter, 1978; Shopo, 1985). Thus prior to the second World War during a period when world prices were low the state, succumbing to pressure from white settler farmers and from large employers of wage labour (e.g. mining companies), institutionalised a discriminatory marketing system which while disfavouring African maize producers subsidised white farmers and purchasers of black labour power.

The discriminatory marketing system, as far as African producers were concerned, was to continue to 1980 although at several times changes and adjustments were made sometimes through marginal improvements introduced after the second World War to encourage Africans to produce more for the market. For example, in 1940 new legislation allowed private traders approved by the marketing board to make cash purchases of maize from African farmers on its behalf. Again in 1956 through the initiative of the state primary marketing and supply cooperatives were established with the aim of promoting cash farming in the Tribal Trust Lands. In 1961 the right to deliver maize (and other controlled crops namely sorghum and groundnuts to what had by now become the Grain Marketing Board) was extended to the Tribal Trust Lands so that during the sixties potentially three channels for marketing produce were open to African farmers; the Grain Marketing Board (GMB) approved buyer, the GMB itself and the Cooperative Society (Dunlop, 1970; Cheater, 1976).

Most producers in the Tribal Trust Lands after the Second World War sold crops through the Grain Marketing Board approved buyers who in 1965 are estimated to have numbered 1,500 and in 1968, 372 (Dunlop, 1970). However, as alternative marketing facilities came to be increasingly available to

African producers in the sixties and seventies this had the effect of diverting crop sales (especially in the APLs) away from the approved buyer channel; an outlet with which sellers of produce had always had difficulties, especially in realising the full value of the prices prescribed by the board. In theory the approved buyer (often a local shopkeeper) who operated under licence issued by the board, was supposed to buy grain at prescribed prices, sort the produce into appropriate grades and then transport it to the nearest depot. In practice, however, owing to the limited number of approved buyers and the relative absence of competition, the prices which farmers received for their produce was much lower than the traders were legally required to pay. Reports indicate that approved buyers down-graded produce, overcharged on handling and transport costs (i.e. over and above the legal maximum permitted by the Board) and often issued credit notes in lieu of cash payment forcing the seller of produce to buy commodities from the approved buyer at grossly inflated prices (Dunlop, 1970). The effect of these malpractices on those selling produce through the approved buyer outlet was a net reduction in price to one which was in any case pitched lower by the Board for African sellers (see above). In addition after 1949 the state imposed an *ad valorem* marketing levy of 10% on sales of all produce originating from the African farming sector, which had the effect of further reducing the price which Africans received for their sales. The discriminatory levy was not abolished until 1980.

The other main marketing channel which became popular in the TTLs and APLs in the sixties, but less so through the seventies, was the primary cooperative society (Cheater, 1976; Thomson, 1985). The cooperative movement since its inception in 1956 had come to embrace a large number of African producers although in terms of the volume of produce handled by the Coop in comparison to the other two channels it always remained less important than was originally expected. The primary cooperative societies handled about 25.4% of maize sales made by the TTLs in 1967/8, but as Table 6 shows that outlet for maize at least became less important in the late seventies as was the case with the approved buyer outlet. Sales of maize through direct registration and delivery to the Board (GMB) came to be the single most important channel for African producers in TTLs and APLs during the seventies. The limited success of the cooperative societies in becoming a viable marketing outlet for African producers was due to a

TABLE 6: Distribution of Maize Sold by African Producers(1) through Various Channels (Percentages)

Marketing Channel (3)	1955-1956 (2)	1960-1961 (2)	1967-1968 (2)	1968-1969	1969-1970	1970-1971	1971-1972	1972-1973	1973-1974	1974-1975	1975-1976	1976-1977	1977-1978	1978-1979	1979-1980	1980-1981
A/B	96	84	40	71	44	20	30	17	14	20	14	16	13	4	10	2
Coop	-	5	25	18	19	57	24	27	28	10	19	19	14	10	7	3
Direct to GMB	4	11	35	11	37	23	46	57	58	70	67	65	73	86	83	95

Source: Dunlop, 1970; Whitsun, 1978; Agricultural Marketing Authority, 1981

Notes: (1) Includes producers in Tribal Trust Lands (TTLs) and African Purchase Lands (APLs)

(2) Excludes sales made by producers in APLs

(3) A/B = Approved Buyer by GMB

Coop = African Cooperative Societies

GMB = Grain Marketing Board (formerly Maize Control Board)

variety of reasons including: delays in payments to members, high operational costs, lack of funds, management inefficiencies, bureaucratisation and centralised control of primary associations by the cooperative unions and the state i.e. the Ministry of Internal Affairs (Cheater, 1976; Dunlop, 1970; Tickner, 1979).

Given the disincentives to sell produce through the approved buyer and the Coop (particularly in the seventies) African farmers, notably those in the APLs, sold directly to the Boards or through illegal channels. Marketing levies which for producers in the APLs were lifted in 1966 (but were retained in the TTLs till 1980) probably encouraged direct sales to the Boards. The lack of information, however, disallows confirmation of this although it is likely that APL producers in having better access to transport facilities marketed directly through state agencies. In the TTLs, where producers were more remote from main commercial centres, the approved buyer and the cooperatives were likely to have been the two main channels used. Dunlop (1970) estimated that for roughly 90% of producers in the TTLs the approved buyer provided the major marketing facility. Finally, since the GMB did not control sales of foodgrains made within the African sector, producers could sell freely without state interference. Exactly what proportion of total output that was marketed for circulation within the TTLs is not clear since only amounts legally sold outside the areas for consumption in the commercial sector were monitored.

Furthermore, on the basis of existing evidence it is not possible to say whether there were different categories of producers in the TTLs who sold output through different channels for circulation both within the sector and for consumption outside it. Some reports do however indicate that the marketed output originated from a very small proportion of African producers and that the majority even in good years failed to produce a surplus (Dunlop, 1970; Riddell, 1978; de Braganca et al, 1977). However, in the absence of detailed information on differences in scales of production between producers and on the economic and social conditions faced by them in particular periods it is not possible to give a precise account of the nature of commercialisation in African areas and what impact different exchange relations had on production and on patterns of food consumption in the TTLs.

Some evidence indicates that after the Second World War and before the declaration of UDI, surplus maize production within African agriculture was confined to a limited number of farmers. According to one estimate 30% of farmers in 1959/60 produced 70% of the African maize crop and that the output that was marketed similarly derived from a small section of the African population (de Braganca et al, 1977). The state, it has been suggested, relied on African producers for considerable supplies of cheap maize to make up for the shortfalls in settler production and to reduce the need for imports (Shopo, 1985).

The principal cash crop in white settler areas was tobacco for which the market had been rapidly expanding between 1945 and 1965. However, after UDI and following international sanctions, it became increasingly difficult to export tobacco through normal commercial channels (Muir-Leresche, 1981c). One response to sanctions by the state was to encourage (through generous subsidies) white settlers to diversify crop production away from tobacco to maize and other crops (Muir-Leresche, 1981c). The switch to increased maize production under favourable conditions of competition created by the state had the effect of thwarting the further development of a class of surplus producers in the TTLs. As a result, the employment of African labour by African farmers fell from 56,000 in 1960 to 17,000 in 1969 (de Braganca et al, 1977). Only in the APLs did surplus production continue relatively unfettered during UDI but it was a limited base from which an African rural bourgeoisie could legitimately operate.

In 1966 the Grain Marketing Act (replacing a previous Act) was passed partly in order to control illegal sales of maize made by Africans to urban areas (Shopo, 1985). As stated earlier before UDI the state was not too concerned about 'illegal' maize sales since they did not essentially threaten the markets for settler farmers which were guaranteed by the GMB. However, once output diversification got under way in white settler areas, illegal sales by Africans posed a threat. The 1966 Marketing Act divided the country into two zones for marketing maize: Zone A applied to white commercial farmers who could only sell grain to the GMB and in Zone B (TTLs), African farmers were allowed to trade within the TTLs without restriction but if controlled commodities were to be distributed outside the area into Zone A, they had to be channelled through the GMB (Shopo, 1985). Following UDI the state once again used price and marketing policy

as it had earlier done in 1934 to provide extra support to white settler farmers and discriminate against African maize producers who, by the time UDI was declared and despite unfavourable conditions of production, had come to be effective competitors of the white commercial farmers.

As the agricultural diversification scheme developed momentum in the white settler farming sector the area under maize cultivation and output levels increased rapidly until 1972 (Muir-Leresche, 1981c); thereafter, due to the state's refusal to grant higher producer prices and as the effects of the liberation struggle came to be felt on farming, maize area and deliveries from white areas to the GMB declined (ibid). In the TTLs conditions worsened during UDI: a rising population led to an expansion in the number of cultivators, total arable area increased at the expense of grazing lands and the overstocking of cattle in reduced grazing areas led to problems of disease and the loss of cattle which in turn led to difficulties in obtaining access to adequate draught power for some farmers. Sales of maize to the GMB from the African sector declined rapidly; for example, between 1970 and 1979 average maize sales from African producers were 5% of the GMB's annual intake during the seventies whereas between 1950 and 1958 official sales to the GMB by African producers accounted for 31% (Muir-Leresche, 1981b). According to another source, estimates of grain surpluses i.e. supplies available within the TTLs after meeting consumption requirements within the sector were 8% in good years (favourable rainfall) and as low as 1.5% in bad years (Shopo, 1985). The same source states further that: "from 1957 to 1972, the value of cash sales from the reserves remained static at around \$8 million per annum notwithstanding a two-fold increase in rural population" (Shopo, 1985, p.57). Conditions of overcrowding and over-grazing resulting from severe shortages of land in particular areas of the African agricultural sector were moreover put under further strain during the liberation struggle. Widespread under-nutrition was the result and Zimbabwe at independence had inherited a huge food problem in the rural areas (Tickner, 1978; Sanders, 1980).

This review of maize marketing in Zimbabwe prior to independence has sought to establish the principles, operation and effects of a system which discriminated against African production. In general, exchange conditions since the 1934 Agricultural Marketing Act were established by the state on the one hand to promote settler agriculture and on the other hand to

contain within certain limits commercial developments in the African agricultural sector, while at the same time attempting to ensure the availability of cheap supplies of food. The general thrust of marketing and price policy since the thirties was to maintain differential rates of development in two racially segregated agricultural sectors. However, there were times when, for example, in the period after the Second World War and up until UDI, exchange conditions for African maize producers did improve slightly as the state attempted to promote cash farming and to raise the level of maize sales from that sector for both local consumption and for export. By the fifties and early sixties reports indicate that a class of surplus producers (the so-called master farmers) had emerged in the African areas and though operating in socially depressed conditions (relative to white farmers) this African rich peasantry had come to be an effective competitor of the white settler maize producer. However, UDI and the change in international conditions which followed thereafter led to the collapse of the tobacco market, a market on which white farmers had after World War II come to rely on for providing high returns.

The fall in tobacco prices after 1965 forced the state to reconsider relations between white and African producers. White farmers were encouraged to switch cropping patterns away from tobacco in favour of maize, and even though the real price of maize between 1965 and 1976 remained static, yields and area planted increased substantially. The successful diversification into maize production by white farmers was achieved through large state subsidies (to inputs and capital investment) and through indirect support (infrastructural improvements and research into high yielding maize strains).

To curb competition from African maize suppliers parastatal control over the market was strengthened to both eliminate 'illegal' sales and to apply more stringent quality standards on produce sales from African areas. Production and exchange conditions during the UDI period, compared to the fifties, had turned for the worse in African areas and as a result maize sales declined substantially. The forced retreat towards more subsistence production in the TTLs was made under difficult conditions as population increases forced African producers into cultivating more marginal areas at the expense of lands that had been reserved for grazing. One commentator, alarmed at the state of conditions in the rural areas in 1972 wrote: "The

safety margin of food in the Tribal Trust Lands has fallen to a critical level and creates a real threat of famine conditions in the near future" (Dunlop cited in Shopo, 1985, p.57). Survival in the TTLs between 1975/76 and 1980 became increasingly difficult not only because of precarious conditions of production but also as a result of the escalation of the liberation war. The food requirements of the inhabitants of the TTLs (including those fighting for the liberation army) had therefore to be met from confined areas.

SECTION 3 POST-INDEPENDENCE DEVELOPMENTS IN MAIZE MARKETING AND THE COMMUNAL SECTOR

The Grain Marketing Board since independence has continued to play a pivotal role in the marketing of foodgrains in Zimbabwe. The GMB has monopoly rights for the purchase of foodgrains at prices set by the state (see below). In addition the board is responsible for the distribution, storage, imports and exports of a large number of foodgrains in the country. The crops for which the GMB currently has sole responsibility include, maize, sorghum, wheat, groundnuts, sunflower seeds, soya, pearl and finger millet and coffee. The legislation under which the GMB at present operates was brought into force in May 1966. A subsequent amendment in December 1967 made the Agricultural Marketing Authority (AMA), an umbrella organisation responsible for all the parastatal marketing boards (including the GMB). The AMAs functions are to provide short-term financial facilities for the Boards operations as well as to advise the Minister of Agriculture on pricing and marketing policy for the commodities handled by the parastatals.

Since 1980, few changes to the structure of foodgrain marketing have been introduced by the state. A policy of no change with regards to the marketing system was indeed the recommendation of the Commission of Inquiry into the agricultural industry whose report was published in 1982 (Chavunduka, 1982). The Commission, however, suggested that though the inherited marketing system should be retained, facilities in the communal lands were badly in need of improvement and that the main thrust for change should come through the cooperative societies rather than through existing or new parastatal bodies (ibid). In actual practice, both the cooperatives

and the GMB have been active in extending facilities to the communal areas. The GMB in particular, in conjunction with the cooperatives, has increased the number of depots (and in more recent years grain collection points) in the communal areas, thus providing a more competitive outlet for marketed produce than had been the case in the past.

One of the main aims of parastatal expansion into the communal areas was to divert sales away from the approved buyer/local trader who, as indicated, earlier provided an inefficient service and tended to exploit producers by purchasing commodities at lower prices than those prescribed by the GMB. As a result of the expansion of state controlled marketing channels the importance of the approved buyer outlet (in terms of volume handled) has certainly declined (see below). However, since the GMBs monopoly control over produce sales only applies when sales made by the communal farmers enter Zone A i.e. areas outside the communal lands, it is not possible to determine by how much the influence of local traders over marketing has actually declined as they continue to exercise some control over the circulation of grain (which is not officially monitored) within the communal areas (zone B). Producers in the communal areas unlike those in the large-scale commercial farm sector have a 'choice' in the marketing of state 'controlled' foodgrains, even though eventually the GMB takes sole charge for the distribution of commodities throughout the country. As before (i.e. prior to independence) three channels for marketed output are currently open to communal area producers: the GMB, the cooperative and the approved buyer. In the case of maize, the GMB continues to be the main channel in the communal areas through which the largest volume is handled.

Since 1981 the number of producers in the communal areas who registered with the Grain Marketing Board increased from 60,000 to 217,189 in 1985 (Homewood and Blackie, 1985; Thomson, 1985). However, not all of the registered producers actually sell grain (Homewood and Blackie, 1985) and some are known to be illegal petty traders who bulk and transport grain directly to the GMB (Harriss, 1986). Nevertheless the remarkable expansion of direct registrations with the board and the fact that between 60% and 86% of marketed maize output from the communal areas is handled directly by the GMB, it..."represents an encroachment upon the power of the other two intermediaries through which the GMB procures: the buying agent (i.e. approved buyer - NA) and the cooperative" (Harriss, 1986, p.52).

The number of depots directly controlled by the GMB (i.e. excluding the depot facilities of the cooperatives in the communal areas and SSCF sector) in 1985 were 53, of which 14 were in the communal areas; almost all have been built since 1980. In addition the GMB introduced a system of 'collection points' in the communal areas, the objective of which was to reach more producers in remoter areas. Around 55 collection points (including 13 mobile units) were set up throughout the communal areas and since the board charged a fixed maximum for transport to the nearest depot, the scheme was successful despite the fact that in the same year the board ran short of gunny bags (Rohrbach, 1985; Homewood and Blackie, 1985):

One other way in which the GMB has, since 1980, 'succeeded in making further in-roads into the communal areas and encouraged direct sales is through a reduction in the time lag between grain deliveries and final payments to producers. This has been quite an important aspect in pulling people away from selling produce to the other outlets and principally from the approved buyer who is generally believed to pay cash on delivery even though the sellers generally receive lower net prices than those officially prescribed. However, the coupling of credit collection by the Board through a system of stop-orders (on behalf of the Agricultural Finance Corporation) with direct grain deliveries has alienated a number of communal area grain sellers who in an attempt to dodge loan repayments have resorted to indirect means to sell grain to the GMB. In an effort to win back some of the boards lost customers, reports indicate that as from this year (1987) credit repayments through stop-orders will no longer be linked to grain deliveries at the point of sale (personal communication, GMB official).

In choosing to retain the single channel food marketing system inherited at independence, the state has since then made efforts to extend the facilities to communal area producers in an attempt to redress some of the excessive imbalances that characterised primary marketing prior to 1980. As already indicated the marketing infrastructure had previously operated principally for the benefit of the white settler farming community. Now, as some observers have commented, exchange conditions in the communal areas have improved as a result of the GMBs expansion (Stanning, 1985; Thomson, 1985; Harriss, 1986). In keeping with the state's programme to reform conditions in rural areas and to gradually put an end to sectoral inequalities in agriculture (Government of Zimbabwe, 1982) the 10%

marketing levy which had previously been imposed by earlier administrations on output sales from communal areas since 1949 was finally abolished in 1980. The ending of the marketing levy meant that the GMB treated all produce sellers equally once they delivered to the depots. Although the process of harmonising exchange conditions in all areas where agricultural production occurs has only just begun and much remains to be done, the achievements over the past 7 years represent a step forward.

3.1 The rise in maize marketing from the communal areas - some recent trends

In an earlier section it was indicated that most of Zimbabwe's agricultural output is produced in the large-scale commercial farm sector. It is also from the latter sector where the bulk of the country's marketed surplus originates; estimated to account for about 75%-80% of the gross value of marketed output during the eighties. Before independence 90%-95% of maize deliveries to the GMB for distribution to domestic and international markets came from the large-scale commercial farm sector. However, since 1980 the sectoral origins of maize marketed nationally has experienced a major transformation: sales to the Grain Marketing Board from the communal area rose from 26,565 tons in 1980/81 to 490,341 tons in 1986/87 and accordingly the proportion of total maize sales to the GMB that originated from the communal area farmers rose from 8% in 1980/81 to 32% in 1986/87 (Table 7).

Furthermore, as Table 8 shows, most of the maize sales made by communal area farmers were channelled directly through the Grain Marketing Board itself and not through other intermediaries.

TABLE 7 GMB Maize Purchases by Sector (tons)

	Marketing Year (April to March)					
	1980- 1981	1981- 1982	1982- 1983	1983- 1984	1984- 1985	1985- 1986
<u>Sector:</u> (3)				(1)	(1)	
LSFC	728,532	1,650,574	1,021,892	464,486	551,612	1,008,97
%	89.4	82	73.4	75	56	60
SSCF	21,053	72,786	52,591	15,591	68,431	66,585
%	2.5	3.6	3.8	2.5	6	3.8
CA	(2) 66,565	(2) 290,488	(2) 317,884	(2) 137,243	(2) 335,130	666,371
%	8.1	14.4	23	22	35	37
Resettlement and ARDA (3) Estates	-	-	-	-	-	62,604
						3.5
TOTAL	816,150	2,013,848	1,392,367	617,182	942,075	1,806,37
%	100	100	100	100	100	100

Notes: (1) Includes GMB intakes from resettlement areas. Separate figures for the resettlement areas were not available but, are not believed to account for a significant proportion of this.

(2) Includes GMB intakes from ARDA estates (state farms)

(3) ARDA - Agricultural and Rural Development Authority LSFC - Large Scale Commercial Farms SSCF - Small Scale Commercial Farms CA - Communal Areas

Source: GMB Registry.

TABLE 8: Communal Area Maize Sales by type of Intermediary

Type of	Marketing Year					
	1980/81 %	1981/82 %	1982/83 %	1983/84 %	1984/85 %	1985/86 %
Direct to GMB by Individuals	62	63	72.5	77.8	73	n.a.
Cooperatives	19	24.3	19	16.8	15	n.a.
Approved Buyer	19	12.5	8.3	5.5	12	n.a.

Source: GMB Registry

It would seem that there has been a significant response in the communal areas to the opening up of markets by the state. The GMB has to some extent also eroded the power of the other two marketing intermediaries and as a result more communal area sellers of primary commodities obtain state-prescribed prices. However, in comparison to the large-scale commercial farming areas, sellers in communal areas continue to face difficulties in realising the full value of the price paid out by the GMB. This is because commodity sellers in the communal areas are still forced to rely on private transporters who tend to charge excessive rates owing to the lack of competition. Secondly, as GMB purchase points are thinly scattered and therefore inaccessible to many people in the communal area, sellers are dependent on channelling output through alternatives where price reductions may be in order of 20% in the case of cooperatives and 35-40% in the case of approved buyers (Harriss, 1986).

However, despite the continuing problems for some communal area farmers in not being able to realise the full value of state prescribed prices for 'controlled' commodities the weight of evidence supports the view that, in comparison to pre-independence times, exchange conditions have improved significantly. The expansion of marketed output from the communal areas is not only confined to maize. Though not as spectacular, deliveries of cotton and sorghum and in the last two years groundnuts made by farmers in the communal areas through the parastatal marketing boards have also risen since 1980 (Thomson, 1985). The increased rate of commercialisation appears closely tied to greater access to state run markets through which producers in communal areas obtain more remunerative prices than in alternative outlets. New market opportunities are not, however, the only reason for the expansion in sales and the associated commercialisation in the communal areas although, as the above evidence indicates, they are an important factor.

Recent evidence shows that the use of yield increasing inputs notably of fertilizers (see Table 9) and hybrid seeds has, since independence, steadily risen in the communal areas (Rohrbach, 1985; Harriss, 1986; Stanning, 1985). The supply of credit from the Agricultural Finance Corporation (AFC) has also increased (see Table 10) and extension

facilities have also markedly improved during the post-independence period. More and better access to yield increasing inputs, extension advice and credit indicate that these factors have been equally important in enhancing the process of commercialisation in the communal areas.

TABLE 9: Fertilizer Deliveries to the Communal Sector (MT)

1978/79	90000
1979/80	27000
1980/81	90000
1981/82	96000
1982/83	98000
1983/84	109000
1984/85	128000

Source: Windmill Fertilizer Co. (Pvt) cited in Rohrbach, 1985

TABLE 10: Agricultural Finance Corporation Credit to the Communal Sector

	Number of Loans	Total Amount (000\$)	Average Size (\$)
1979/80	2850	478	170
1980/81	18000	3600	200
1981/82	22000	9900	450
1982/83	39000	13100	336
1983/84	52500	28000	533
1984/85	64000	30000	470
1985/86*	97761	52189	534

Source: Agricultural Finance Corporation (AFC) and Rohrbach, 1985.

Notes: *Loans granted to individuals and institutions in the communal area (including resettlement farmers) for the period 1/4/85 to 31/12/85 only.

However, disaggregated data on maize sales from the communal areas tend to suggest that higher rates of commercialisation are probably limited to certain areas/regions, namely in Mashonaland. A high percentage of aggregate maize deliveries from the communal lands are from areas such as Mangwende, Wedza and Guruve which have recorded high production growth rates. As Table 11 shows, 18 communal lands out of a total of 170 in 1984/85 accounted for 83% of total maize deliveries to the GMB; and in 1982/83, the equivalent figure was 70%. Although it is not possible to confirm precisely (given the lack of data) what proportion of the rise in marketed maize output has been as a result of increased production and/or reduced retentions, the overlap between those areas contributing most to

communal area maize sales and those areas recording the highest increase in output suggests that it is probably higher production that has contributed most to the increase in market sales.

While most of the commercialisation in the case of maize can be described as 'normal' (Harriss, 1986) a certain amount sold by communal farmers has been 'forced' due to the need to repay short-term AFC crop loans borrowed by the latter to purchase fertilizers and seeds. Since disaggregated data by region or by type of communal farmer for the uptake of AFC loans are not available it is not possible to trace which areas/farmers have been selling grain under conditions of 'distress', i.e. in order to pay back crop loans. However, since the AFC have been following a 'prudent' financial policy which, in the case of communal areas means lending to those who have the means (labour, land and draft power) to grow crops successfully, it is probable that most of the credit given for maize has been concentrated in agro-ecological Zone II of Mashonaland and has been allocated to those farmers who own cattle for draft power. Increased commercialisation whether 'normal' or 'forced' is therefore more likely to be in the same areas. Finally, it has been reported that households which may be selling maize and other food commodities under 'distress' may not be retaining enough supplies to meet annual food requirements and as a result may suffer from a certain amount of under-nutrition and some resulting malnutrition (Harriss, 1986). At present, data are not available to confirm this hypothesis.

TABLE 11: Quantities of maize delivered by the highest eighteen-
maize selling communal areas to the GMB (metric tons)

	Marketing Year				
	1980- 1981	1981- 1982	1982- 1983	1983- 1984	1984- 1985
Quantity of maize sold to the GMB by the 18 highest selling communal areas	37,744	160,998	221,631	115,946	279,000
Quantity of maize sold to the GMB by all the communal areas	66,565	290,488	317,884	137,243	335,130
% of maize sales by top 18 to total maize sales of communal areas	56.7%	55.4%	70%	84.5%	83%

Notes: (1) The highest maize selling communal areas, consistently over time, have been: Mangwende (Mash. E), Hurungwe (Mash W) areas, Chiweshe (Mash. C), Guruve (Mash. C), Gokwe (Midlands), Zwimba (Mash. W.), Mukwichi (Mash. W), Chinamhora (Mash. E), Uzumba (Mash. E), Chirau (Mash. W), Musana (Mash. C), Chikwaka (Mash. E), Wedza (Mash. E), Kandeya (Mash. C), Sabinorth (Manicaland), Chiduku (Manicaland) Madziwa (Mash. C), Mhondoro (Mash. W).

Source: GMB Registry

One recent study has indicated that, in areas outside of Mashonaland, with the exception of one region in Midlands province (Gokwe), the state induced commercialisation process (i.e. through the provision of more credit, seeds, fertilizers, extension advice and parastatal marketing outlets) has yet to be realised (Moyo et al 1985). In the provinces of Masvingo, Mataberland and parts of Manicaland and Midlands, the potential for successful crop production is low, environmental degradation is widespread and it is reckoned that many families have to depend on purchasing staple foods (if they have the means to buy). Reports indicate that within the latter areas (which cover a large part of the communal lands) under-nutrition and malnutrition is common even in those years when the rains have not failed (World Bank, 1983a). Of course in conditions of drought, as one might expect, crop failures can lead to considerable hardship for those who neither have adequate stocks of grain available from own-production nor the means to purchase food.

Between 1981 and 1983 most areas of Zimbabwe were severely affected by drought and in order to avoid acute starvation the government launched a drought relief programme: the Department of Social Services purchased large quantities of grain from the GMB which were then transported to the worst affected regions of the country (mostly in the communal areas). In 1982/83 the government bought 46,343 tons of maize for drought relief and in 1983/84 when conditions worsened, food aid purchases by the government increased to 223,900 tons (Agricultural Marketing Authority, 1984). While the drought relief programme succeeded in avoiding a major catastrophe in the rural areas it indicated that the food system in many communal areas was highly fragile, and that though some areas in Mashonaland (see Table 11) were in fact selling (supposedly) surplus grains during the drought period most of the other communal areas were at the time heavily reliant on importing their food requirements.

In conclusion, the review of trends in the marketing of maize from communal areas shows that, since 1980, sales have risen substantially in comparison to levels before independence. Much of the apparent growth in marketed output has been a result of initiatives led by the state to increase the pace of agricultural commercialisation in communal areas through (a) the opening up of more primary commodity markets, (b) expanding credit facilities, (c) providing more technical assistance and extension advice to farmers and (d) improving access to yield increasing inputs. From the view-point of national food security and the attainment of high levels of self-sufficiency in food (a principal objective of the state), the contribution of the communal areas to gross marketed output since 1980 has been an undoubted success. However, as pointed out above, the phenomenon of rising maize yields followed by high growth rates in production which have in turn led to more maize output in the communal areas being marketed, has been confined to few regions and to a limited number of 'surplus producers', although precisely what percentage of total producers in the communal areas constitute the latter is not known.

Informal reports and the results of small surveys do nonetheless indicate that the largest sellers of grain (consistently over a period of time) tend to be farm holdings which are above average in size and, most importantly, tend to own above average amounts of cattle (Callear, 1982; Truscott, 1985; Moyo et al, 1985; Rukuni, 1985). A further aspect of food security in the

rural areas is that despite rising levels of food self-sufficiency in the country, large sections of the communal area population (and indeed elsewhere e.g. wage workers in the large-scale commercial farming sector) continue to face problems of inadequate access to food; either due to shortfalls in the amount of food produced by individuals and/or, as a result of a failure in the market to redistribute food on appropriate terms to those in need of it, or because of low wages among wage workers.

SECTION 4 PRICE POLICY, SUBSIDIES, MAIZE MARKETING AND FOOD SECURITY IN ZIMBABWE

For all controlled agricultural commodities, that is for which marketing parastatals have monopoly purchase rights, producer prices are set by the state (Ministry of Agriculture) in conjunction with the AMA (the parent body responsible for overseeing the financial running of the marketing boards) and the unions representing the farmers - principally the commercial farmers union. The prices at which marketing boards sell commodities to wholesalers and to the food manufacturing industries are also set by the state and is the responsibility of the Ministry of Trade. Thus sales of all controlled commodities (with the exception of sales taking place within the boundaries of the communal areas) made to the marketing boards and those made by the latter occur at prices officially prescribed by the state.

The practice of officially controlling agricultural prices, and indeed the mechanisms by which this is done, is not a recent development in Zimbabwe. As noted in an earlier section, the state in Zimbabwe has for a long time intervened in food markets to regulate both producer and selling prices. Evidence suggests that the price of grains and particularly that of maize has been used by the state to achieve a number of things including redistributing incomes, transferring resources between sectors and fostering technical change in agriculture (Muir-Leresche, 1981b; Thomson, 1985; Harriss, 1986). The institutional means by which the latter have been achieved in the past as well as now is through the GMB which was, as noted earlier, originally set up at the initiative of white settler farmers. The state has been highly successful in the past in using the instrument of price to encourage maize production over and above those

levels indicated by effective demand. At other times, however, as in the seventies when nominal prices remained static and real prices fell for most of the decade, the state used prices to keep the cost of living low and instead chose other measures to encourage production e.g. through input subsidies and charging low interest on loans for fixed capital investments (Muir-Leresche, 1981b).

During the UDI period the state pursued a cheap food policy and though the GMB at the time operated on a 'no profit no loss' basis. The government after 1976 increasingly came to cover the board's financial losses which resulted from the fact that the GMB's maize selling prices were maintained marginally above its purchase prices, i.e. those paid to producers (Callear, 1981; Muir-Leresche, 1981b). In addition, in 1979, subsidies were paid to grain millers and edible oil producers to keep down the price of basic foodstuffs. According to one study, the rationale for a cheap food policy in the late seventies was...."an attempt to build urban political support for an unpopular government after it became clear that the countryside had been won over by the guerrillas" (Bratton, 1987, p.183). The subsidies paid out to the Grain Marketing Board on the maize trading account alone rose from Z\$272,000 in 1975/76 to Z\$12,757,418 in 1978/79. Other food commodities for which urban consumer prices were subsidised included wheat, soya beans and beef (Callear, 1981).

At independence Zimbabwe therefore inherited a price and marketing system through which it was possible for the state to support farmers as well as subsidise consumers (mainly urban) by using the mechanism of subsidies to cover the deficits incurred by marketing boards and by private food processing firms. An examination of price policy over the past seven years clearly indicates that the state has indeed manipulated the prices of controlled products in such a way as to provide incentives to producers (e.g the domestic price of maize has been maintained above international parity levels) and at the same time to subsidise urban food consumers, at least up to 1983 (Mkandawire, 1985; Thomson, 1985; Davies and Sanders, 1987).

Following the imposition of an IMF/World Bank stabilisation programme in 1982/83 the state was forced to abandon the cheap food policy which it had pursued since 1980 and to drastically cut back on consumer food subsidies

(Mkandawire, 1985). Subsidy reductions, and in the case of some commodities a complete withdrawal of state support to keep urban food prices low led to large price increases in 1982/83; approximately 90-95% for maize meal, 25-30% for bread, 25% for edible oils, and 60-85% for beef (Davies and Sanders, 1987). The consequence of the reduction in the amount of subsidies that the state paid to the marketing boards and the private food processing companies to cover operational losses was to make a large contribution to a steep rise in the basic cost of living after 1982 since in order to make ends meet, boards and food companies were forced to push up selling prices. A further squeeze on real earnings, particularly for the low income earners, came as a result of a freeze on wages imposed as part of the IMF agreement between January 1982 and September 1983. Since then minimum wage levels in nominal terms have risen, although they have not compensated for previous price increases. The combined effect of the withdrawal/reduction of food subsidies and the decline in the level of real wages since January 1982 has been to severely erode the purchasing power of the low paid wage workers in industry and in agriculture with serious implications for the state of nutrition for some sections of the population (see Davies and Sanders, 1987 for further details).

Hence since independence it would appear that there have been two phases with regard to the effects of food and wages policy in Zimbabwe. In the first phase between 1980 and 1982, through a combination of subsidised retail food prices and increases in the level of minimum wages, the state's strategy was to pursue a cheap food policy. In real terms the earnings of wage workers rose during this first period. In the second phase (1983-1986) real earnings declined, particularly for the low paid, and the purchasing power of industrial and agricultural wage workers was eroded by increases in the price of basic food following a drastic cut back on subsidies and by a freeze on wages (1982-83). The transition from phase one to phase two came about as a direct result of deflationary measures introduced by the state in compliance with IMF short-term stabilisation policies (Mkandawire, 1985).

Regarding the impact of producer prices for the farm sector, evidence suggests that the thrust of agricultural and food price policy since 1980 has been relatively favourable to farmers, although there have been periods when revenue gains have to some extent been off-set by rising inputs costs

(Bratton, 1987; Thomson, 1985; Harriss, 1985). The behaviour of producer prices over the past few years, according to one study, indicates; "periods of relatively stable nominal prices and corresponding decreasing real prices, then periods of substantial nominal price increases to compensate for the declining real values" (Thomson, 1985). Analysis of real gross margins per hectare for large-scale commercial farms shows that since 1980, values for maize declined slightly whereas those for wheat and soya beans increased (Commercial Farmers Union, 1985/86). In contrast to figures on gross margins provided by the Commercial Farmers Union (CFU), estimates by the Ministry of Agriculture show that gross margins per hectare for maize for the 1980/85 period had (with the exception of one year - 1984/85) risen steadily (see Thomson, 1985). Notwithstanding the fact that there is a small difference in gross margin estimates for maize between the CFU and the Ministry of Agriculture it is possible to conclude that the impact of maize price policy on producers has not been unfavourable.

Further confirmation that agricultural price policy in Zimbabwe has not squeezed agriculture can be obtained from a comparison of actual prices received by farmers for certain commodities with equivalent import/export (i.e. border) prices. In the case of maize (which in most recent years has been exported by the country) the ratio of producer price to the border price (f.o.b export price less internal transport and marketing costs) indicates that between 1981/82 and 1983/84 maize producers were heavily subsidised; the ratio increased from 1.18 to 1.67 in that period (Thomson, 1985). An earlier study similarly found maize producers to have been subsidised (Jansen, 1982). Both Jansen and Thomson's comparisons of domestic producer prices with border equivalent prices, however, found that for several other 'controlled' commodities local prices were below international parity levels (e.g. cotton, wheat and groundnuts), thus representing an implicit 'tax' on producers. Why in the case of some controlled crops the level of domestic prices have been kept low, whereas those for other crops (e.g. maize) have been kept high in relation to border prices is not clear.

To some extent the objectives of price policy itself are unclear as a number of factors appear to enter output pricing decisions in varying degrees of importance depending upon the economic and political significance of particular crops to the country. Recent studies clearly

indicate that apart from economic and technical considerations, e.g. such as demand levels and costs of production, producer prices are politically determined "both in terms of the fixing process and in terms of the anticipated effects" (Harriss, 1986; also see Thomson, 1985 and Bratton, 1987). Consequently, in reaching policy decisions about actual prices there seems to be no coherent longer-term a priori strategy; this is reflected in the fact that in present day Zimbabwe there is perhaps surprisingly, given the extensive involvement of the state in the food distribution system, no policy statement or Act which specifically relates to agricultural prices. Some sense of the direction of policy intentions can, however, be obtained by examining the processes by which price levels for particular commodities are arrived at within the state machinery and by looking into the effects of actual prices once they come to be implemented. Regarding the latter, that is an examination of the effects of agricultural price policy on producers, evidence suggests that in Zimbabwe state prescribed prices for several controlled commodities have in general been set at levels favourable to producers. This is the conclusion which emerges regardless of the criterion used in arriving at this judgement; i.e. whether on the basis of costs of production estimates or by the relation of domestic producer prices to international market prices, or by the movement of real producer prices over time.

For maize alone, the results of price performance tests show that by international comparisons producer prices in Zimbabwe have been set high although in spite of this, as shown above, since 1980/81 gross margins in the large scale commercial farm sector have declined slightly as have real prices (Thomson, 1985). It would seem that in the case of maize the continuation of a policy of maintaining high prices for producers is largely due to the importance that the state appears to attach to the attainment of a high level of domestic self-sufficiency (Government of Zimbabwe, 1982).

However, the pursuit of a strategy which has been aimed at securing national supplies of staple food (maize) by setting domestic producer prices at a high level has specific consequences with regard to food security in the rural areas. Moreover, as indicated above, in the urban sector high retail prices for maize meal have had undesirable effects on

food consumption especially for low paid consumers since the drastic reduction of state subsidies on maize meal (Davies and Sanders, 1987).

4.1 'Problems with National Maize Surpluses and the Need for Restructuring the Market'

Favourable weather conditions in recent years and the maintenance of a high level of self-sufficiency in maize through a system of incentive prices and centralised control of marketing have generated substantial surpluses which the GMB have either had to store at a high cost and/or to dispose of onto world markets at a loss - given that domestic producers prices have for most recent years been higher than world prices. The high costs associated with sustaining a high degree of self-sufficiency in maize within the existing price and marketing system have led to calls for reform, in particular to introduce measures whose aim would be to limit the size of surpluses e.g. by setting marketing quotas and by operating a dual pricing system. Under a proposed quota system it is possible that the large producers may be worst affected (depending on how the quota system is structured) since, after delivering a stipulated amount to the GMB, producers would receive export parity prices for each ton delivered thereafter. Whether a quota system would succeed in limiting the level of maize surpluses and in controlling the associated costs of managing surpluses would very much depend upon how effectively the state is able to prevent the development of a parallel market. Experience from other countries demonstrates that effective policing of quotas is not only extremely difficult but that it is highly costly as well.

A further point which needs to be noted concerns the state's desire to maintain a high degree of domestic self-sufficiency in maize and the government's strategy to fulfil the former objective by means of extending marketing, credit, extension and infrastructural facilities to the communal areas. As indicated above, since 1980 the response in some parts of the communal areas to a package of 'incentives' provided by the state has been quite remarkable: for maize at least, current evidence indicates that production and marketed output have both risen sharply as more inputs have been made available and as marketing facilities have expanded. However, as one or two recent reports indicate, while rising sales of maize from the communal areas to national markets have certainly helped the country's food

security status, especially in times of drought, these achievements have only been possible as a result of the state incurring (unjustifiably) high short-term costs (Blackie, 1984; Child et al, 1985; World Bank, 1984; see also Bratton, 1987).

The basis for such a claim essentially rests on the view that the expansion of the current grain marketing system to remote rural areas has involved the GMB (and therefore the state) in a highly costly exercise. Firstly because the GMB has had to pay out high uniform prices to all categories of producers throughout the countryside and secondly, by reaching out to sellers of small quantities of grain (maize), the boards unit marketing costs have as a result been pushed up. As Blackie and others have stated, a single channel state monopoly marketing system for the communal areas is inappropriate on account of the high unit cost involved in providing services to small-scale producers scattered throughout the countryside (Blackie, 1984; World Bank, 1984 expresses the same views). The appropriateness of a policy which applies pan-territorial pricing is also questioned for it not only prevents production taking place according to the principles of comparative advantage, but also places the burden of storage and transportation on the GMB which is considered to be an inefficient use of resources since a system of state subsidies is required to cover Board losses. In such circumstances producer pricing decisions come to be heavily influenced by the availability of treasury funds (ibid).

While there is some factual truth in what Blackie and others have argued with regard to the inefficiencies associated with single channel primary marketing systems and pan-territorial pricing, what is questionable are the policy recommendations which they propose. The recommendations essentially revolve around the untested belief, at least in Zimbabwe, that firstly, international prices would provide a better guide to domestic pricing policies, and secondly, that the marketing function for food and agricultural commodities would be better and more efficiently served by private sector multiple channel distribution systems. Based on the above assumptions the case has been made for a considerable reduction in the state's involvement in both the price fixing process and in the management of maize marketing (Child et al 1985; Blackie, 1984).

Actual proposals for a reformed maize marketing system in Zimbabwe thus include: (a) the establishment of a floor price (export parity) and a ceiling price (import parity) and within these lower and upper limits for produce prices to be determined by prevailing domestic supply and demand conditions; (b) the GMB to act as a buyer and seller of last resort when prices move outside the limits given by border prices; and (c) the provision of incentives to attract intermediaries from the private sector to take over the marketing function relinquished by the GMB (ibid). A reformed and more open marketing system would thus end the inefficiencies associated with rigid state control of prices, reduce or eliminate the need to cover losses made by the parastatal boards, remove the need for existing price subsidies and taxes on either producers or consumers, allow incentives for more storage to take place in the private sector and finally, would iron out seasonal price peaks and troughs by permitting price arbitrage to occur as commodities would be allowed to move freely between surplus and deficit regions (ibid).

In theory such proposals for change and the expected benefits that are intended to be derived from them may seem plausible. However, a number of considerations which are crucially left unstated in the analysis which precedes the policy recommendations implies that the problem of reform is in reality much more complex than that supposed by the market liberalisers. An underlying assumption of such policy recommendations is that a withdrawal of state interference in the market (and more generally in the economy) combined with higher incentives for private capital will lead to improved economic efficiency. Some objections to the market liberalisation approach and its proposals for reform are provided below.

To begin with, in making the case for marketing reform as articulated by Blackie and others, it is often asserted on the basis of selective information that India provides in some sense a 'model of agricultural success' for countries such as Zimbabwe (Blackie, 1981). For example as Child et. al. state, citing the findings of one study: "Gsaenger and Shmidt show the Pakistan and Indian economies to be similar to that of Zimbabwe, with distinct surplus and deficit areas, dualistic production, low per capita incomes and 30-40% of the staple food being marketed. Their data suggest there is little market exploitation: price differentials between markets reflect transport costs, returns on storage are reasonable and

voluntary procurement operations are usually able to stabilise prices" (Child et al, 1985, p.366). However, in treating India as a case where production successes are attributed to the application of correct policies (i.e. high producer prices coupled with private and state marketing in food grains) two important effects, apart from the rise in marketed food output since the sixties, are overlooked: firstly, that food insecurity in rural (and indeed urban) areas has not significantly declined as a result of rising levels of food self-sufficiency (Sen, 1987) and secondly, as one authoritative study of grain marketing in India has pointed out, using different data and a different conceptual approach, that private mercantile control over foodgrains is highly exploitable (Harriss, 1981; see also Bharadwaj, 1985).

A second objection to proposals for market reform in Zimbabwe which are aimed towards increasing the role played by private intermediaries in the distribution chain, is the naive assumption that marketing efficiency will somehow be improved with the progressive withdrawal of the state from the sphere of distribution. In the context of Zimbabwe it is important to note that state control over the price setting process and in the management of food distribution initially took place at the request of white settler farmers (see above). The primary beneficiaries of state intervention in food markets up until 1980 were white farmers and to some extent wage workers during the seventies when a cheap food policy was in operation. As several recent studies have found, state control over prices and marketing before independence was both efficient and explicitly oriented towards supporting white settler agriculture (Thomson, 1985; Harriss, 1986; Lacey, 1977). Moreover, it has to be acknowledged that after independence the grain marketing system under the management of the GMB, from the view-point of farmers (both large-scale and small-scale) and in ensuring that urban areas are adequately supplied with food, has worked well, even though, as noted above, the unit costs in providing a marketing outlet to small-scale producers in the communal areas have been quite high.

The key question is, would a privately run food marketing system necessarily be more efficient? The limited evidence available on the structure and function of food markets in the communal areas before independence (see above) does suggest that, from the view-point of farmers, private traders (i.e. the approved buyers) were exploitative. The positive

'sales' response recorded from some of the communal areas since the GMB's expansion and the partial displacement of the private trader and to some degree the cooperative society, provides material evidence against the view that the withdrawal of the state from primary marketing would be better. Furthermore, given acute transport problems in communal areas, a reversal of policy away from state marketing to a private multi-channel system is likely to lead to a further concentration of monopoly power among those owning the means of transportation.

Hence, calls for marketing reform away from the dominance of a single channel system (the GMB) need to acknowledge that: (a) historically, private marketing systems in Zimbabwe have not worked for the benefit of most producers; (b) the state has been the active agent in creating markets where previously none existed (or only to a limited extent) and in offering the most remunerative prices to farmers and (c) on grounds of distributional efficiency it is unlikely, given the limited availability of transport facilities in rural areas and the lack of competition in the transport sector, that more involvement of private intermediaries in foodgrain marketing would succeed in greatly improving existing efficiency levels (for further discussion see - Thomson, 1985; Harriss, 1986). Of course under an internally liberalised primary commodity trading structure public sector distribution costs would be transferred onto private capital.

4.2 Rural Food Insecurity - The Malnutrition Problem

In among the arguments put forward by Blackie and by Child et al (op cit) for a multi-channel decentralised foodgrain distribution system is the view that the GMB in its present form has been pulling grain out of the rural areas for urban sector consumption and for export. It has been suggested that the rise in the level of maize sales from the communal areas to national markets cannot be regarded as a 'surplus' (i.e. over requirements) in rural areas especially during periods of drought (Blackie, 1984). The erroneous presumption that rural areas are generally self-sufficient in food and that 'market sales' represent a 'surplus' has often influenced the state in its planning of the marketing system. Thus in Zimbabwe, "the GMB system was designed with the implicit assumption that rural food supplies will be provided for by local production" (Blackie, 1984, p.21). The result, as in present day Zimbabwe, is that there is no mechanism other

than by administrative fiat for food to flow from surplus to deficit areas. The problem facing Zimbabwe... "is not the procurement of adequate national maize supplies but improved and cheaper distribution to rural food deficit areas" (Blackie, 1984, p.22).

While disagreeing with proposals (see above) for more private sector involvement in a liberalised foodgrain distribution system in which theoretically, given appropriate price differentials commodities would flow from surplus to deficit areas and price equalisation would occur in all regions, Blackie has nevertheless identified a serious deficiency in Zimbabwe's current marketing system: that is, food price policy and marketing structures have since 1980 worked primarily for the benefit of producers selling grain (mainly the large-scale farmers) and the marketing system has succeeded in ensuring that urban centres are adequately stocked with food supplies.

In the rural communal areas consumers located near urban centres to some extent benefited from the operation of consumer subsidies between 1980 and 1982 but in general the direct impact of the cheap food policy for the rural population is believed to have been negligible (World Bank, 1983a). Compared to urban areas prices in rural areas have been reported to be much higher (World Bank, 1983a; Harriss, 1986). Precise estimates, neither of retail price levels in rural areas nor of the proportion of the rural population that is dependent upon the consumption of purchased staple foods, are available. However evidence obtained from some surveys does suggest that food self-sufficiency levels among communal area families are not high and that many families are dependent upon market purchases or on receiving food remittances from relatives in urban areas to meet annual food requirements (Truscott, 1985a; 1985b; Callear, 1982; Moyo et al 1985). The latter reports and other informal accounts of conditions in the rural areas indicate that a large number of people in Zimbabwe's communal areas have since 1980 continued to face problems of obtaining access to a nutritionally adequate diet at all times of the year. (World Bank, 1983a).

Reasons for the continuation of a food problem in Zimbabwe's rural areas, given the high degree of national self-sufficiency in foodgrains, are not known precisely. The lack of information particularly on the structure and operation of food markets (outside the control of the GMB) in communal

areas prevents a full analysis of the problem of rural food insecurity from being conducted here. The final section of this paper outlines issues which require further empirical investigation for generating the kind of information which would enable a thorough analysis of the persistence of the problem of hunger in rural areas to be carried out. It will be suggested that the focus of such an investigation should not just be an examination of different patterns of production, income and consumption among rural households in communal areas but that it should also include an evaluation of the influence of different exchange relationships on households access to basic items of food.

The next few paragraphs first provide a summary of available evidence on the extent of malnutrition in rural Zimbabwe.

The most comprehensive statement on health and nutritional conditions in rural Zimbabwe since independence is provided in a World Bank study (1983a) which, apart from summarising the findings of recent research, presents the results of specially commissioned surveys by its own 'mission'. A later UN document provides additional information and a more up-to-date assessment of the health and nutritional status of women and children in Zimbabwe (UNICEF 1985). It would appear from a survey of existing information that Zimbabwe has a major nutritional problem. Several recent studies have indicated that the incidence of under-nutrition and malnutrition is particularly high among rural households in the communal areas and among the families of black wage workers in the large-scale farm sector (World Bank, 1983a; Davies and Sanders, 1987). One recent paper attempting to examine the impact of IMF stabilisation policies on the state of health conditions in Zimbabwe stated: "The predominant health problems are nutritional deficiencies, communicable diseases, and conditions related to pregnancy, child birth and the new born period. They particularly affect two vulnerable groups of the population: young children and women in the child bearing years. Malnutrition underlines much of the morbidity and mortality" (Davies and Saunders, 1987, p.3 emphasis added). Summarising the evidence obtained from 23 nutrition surveys (most of which were conducted before the prolonged drought had affected the country) the World Bank report found that: 23% of children under the age of 5 may have had second or third degree malnutrition, based on a weight for age measure; that stunting was observed among 30% of the children; and that 9% were

wasted (World Bank 1983a). The weight for age measures placed the Zimbabwean figures roughly in line with other African countries although the incidence of stunting and wasting was considered to be much higher than elsewhere (ibid).

The statistics on malnutrition in Zimbabwe therefore present something of a paradox: malnutrition and under-nutrition particularly in the rural areas is high though infant mortality rates in comparison to other African countries are considered lower (UNICEF, 1985). Furthermore, as earlier sections of this paper have sought to emphasise, Zimbabwe not only has a high degree of self-sufficiency in food but in recent years market sales of important food commodities have risen substantially from the rural areas. In the context of Zimbabwe, it would seem that per capita measures of food availability within the country do not provide a real indication of the state of food security for the country's population. Data on nutrition levels (summarised in World Bank 1983a) clearly indicate that food security levels between rural households are highly variable and moreover that the incidence of malnutrition tends to be much higher in the rural areas at the start of the agricultural season (October - January) when supplies retained by households from the previous harvest are running low.

With regard to changes in nutritional status over the post-independence period, reports do not reflect a clear pattern of change. Davies and Sanders (1987), citing the evidence obtained from Ministry of Health surveys carried out among rural children in 1982 and in 1984, state that there has been a... "rise in the prevalence of under-nutrition from the 18-22% reported in 1982 to the 48% reported in 1984" and that the change... "is so marked that it seems reasonable to conclude that there has been a deterioration in the nutritional status of (at least non-urban) children in Zimbabwe" (ibid, p.21). However, as the same authors comment, other studies do not support the pattern of change indicated by the Ministry of Health reports, and instead point towards the lack of a clear trend over time in the nutritional status of young children. The absence of a discernible shift is somewhat surprising since the fall in real incomes which is likely to have occurred as a result of the drought and due to the effects of stabilisation policies would lead one to expect that conditions would have deteriorated. However, it is probable that the impact of at least two programmes designed to protect nutritional levels would have offset the

worst effects of drought in the communal areas; that is, the drought relief programme which distributed free food in drought affect regions and the child supplementary feeding programme which has attempted to improve the diets of children in rural areas. Both the latter two programmes are reckoned to have been successful in moderating the effects of drought on households in rural areas worst affected (World Bank, 1983a; UNICEF, 1985; Davies and Sanders, 1987).

In considering the impact of IMF stabilisation policies on the income of communal area households and how food consumption has been affected, the effects of two factors would seem to be relevant: prices and urban remittances. As indicated earlier, when in 1982/83 the state withdrew or reduced consumer subsidies on a number of basic food items, this led to a sharp rise in the retail price of food in urban areas. Since then, owing to the effects of price increases as well as a small rise in nominal wage levels, real income levels for wage workers in urban areas and in the large-scale commercial farm sector have for some time been declining. Given that, on average, 30%-50% of communal area households (CSO, 1985b) are dependent on receiving remittances from relatives working in urban areas it is probable that declining real incomes between 1983 and 1986 would have reduced the value of remittance flows and thereby contributed to a fall in incomes in rural areas. A more direct effect of stabilisation policies on rural incomes would have taken place through rising prices. Clearly net sellers of commodities in communal areas would have benefited from high producer prices whereas for net buyers of food rising prices would have led to a fall in real incomes (Davies and Sanders, 1987).

Recently a number of rural household surveys have reported that very many families in the communal areas are dependent on seasonal wage work in agriculture and on casual work in the informal sector (Moyo et al 1985; Truscott, 1985b; Callear, 1982). To the extent that the movement in wage levels in communal areas are influenced by national statutory levels (minimum wages), which in real terms have been declining, it is probable that the real incomes of those rural households reliant on casual wage work would also have declined by some amount.

Finally, with regard to the beneficial effects of rising food prices on net sellers of food in communal areas, it needs to be noted that, in the light

of evidence provided earlier on the patterns of maize sales, it is probable that those households experiencing a net gain in incomes actually form a small proportion of the total rural population and tend to live in selected parts of the countryside where rates of commercialisation have been highest i.e. in Mashonaland (also see Table 11, above).

As Davies and Sanders (1987) note in their recent paper, there is evidence to suggest that differentiation in the communal areas is fairly extensive since land, implements and draft power are unequally distributed between households (see also CSO, 1985b; Rukuni, 1985; FSRU, 1984; Truscott, 1983, 1985a; Moyo et al 1985; Callear, 1982). One study conducted during the drought years found that the process of differentiation had accelerated as a result of the drought since families were forced to sell cattle to those who could afford to buy (Leys, 1986). Informal accounts also indicate that stratification has increased in rural Zimbabwe during the post-stabilisation period (personal communication - Agritex officer). "This growing stratification means that a large and growing stratum of people have to depend increasingly on remittances from family members in wage employment. With no increase in the absolute number of people in wage employment and with stabilisation policies causing a fall in real earnings of those in jobs, clearly there is a fundamental contradiction which is manifesting itself, as a growing layer of increasingly impoverished households" (Davies and Sanders, 1987, p.11).

CONCLUSION RURAL FOOD INSECURITY AND THE QUESTION OF CAUSALITY - AN ISSUE FOR FURTHER RESEARCH

Given the paucity of data it is not possible to examine comprehensively the precise relationships between continuing food insecurity in rural Zimbabwe and the processes that have led to the increased commercialisation of maize (and cotton) since independence. However, as has been indicated above, available evidence (however fragmentary) does suggest that the two processes could be quite closely associated. The World Bank inquiry into health and nutrition was unable to arrive at a firm conclusion as to the exact causes of malnutrition in rural areas although the report had succeeded in identifying several contributory factors including: poverty, nutritional ignorance, shifts in dietary patterns, family separations and

social problems such as alcoholism (World Bank, 1983a). A full analysis of the problem of rural poverty was severely constrained by the lack of accurate data particularly on income levels (including remittances), on household budgets, on the availability and adequacy of food supplies from own-production, on patterns of food purchases made by families throughout the year and on prices paid for inputs and for food. In other words, while the World Bank report had been able to identify some of the important factors which may have accounted for the relatively high incidence of malnutrition it had been unable to analyse the problem of rural food insecurity among rural households in terms of 'food entitlement failures' (Sen, 1981, 1985).

In the case of Zimbabwe, as the above discussion has sought to emphasise, rising levels of food availability per head (in aggregate terms) has not necessarily implied increasing food security in the sense that all individuals have improved access to a nutritionally adequate diet. The increased level of maize marketing from the communal areas since 1980, while having raised the level of self-sufficiency in the nation, would appear not to have solved the problem of food insecurity in the rural areas. An adequate understanding of the food problem in Zimbabwe's rural areas (which as already suggested cannot be presumed to be self-sufficient) requires a new focus on differential access to food, including an examination of the various determinants of both market and non-market entitlements to food.

An analysis of the determinants of exchange entitlements to food through the market requires information on the structure and functioning of rural food markets. In Zimbabwe, as elsewhere, this is a very under-researched area. There have been few attempts to research the impact of market structure and functioning on 'food entitlements', especially the 'exchange entitlements' of those households whose 'ownership entitlements' through production fall short of adequate food requirements (Harriss et al 1984). Given that market dependence for food among the inhabitants of the communal areas is extensive (Moyo et al 1985; Truscott, 1985a, 1985; Callear, 1986), a better understanding of rural food market structure and functioning and its impact on production and consumption, is essential for predicting the impact of national food policies on rural nutrition and food security.

Evidence to date indicates that patterns of food production and consumption in Zimbabwe's communal areas are strongly influenced by GMB marketing policy and other aspects of government food policy (wages, prices, subsidies) but in ways which are still poorly understood. The crucial link in the relation between rural access to food and government food policy is rural food purchase and distribution and it is precisely about this connection that there is little information at the household level and for various classes. In an earlier section it was suggested that urban and rural food consumption markets and labour markets are closely interlinked and that the ties between them run through remittances and through the distributional effects of food subsidies. The high level of dependence on remittance flows from the urban sector among rural families (CSO, 1985a) indicates that rural food purchase patterns and production patterns are likely to be strongly influenced by such flows which are in turn affected by changes in incomes policy in the urban sector and/or changes in policy towards indirect income transfers (e.g. through consumer food subsidies or other fiscal measures) to urban workers.

However, at present the data are not available to analyse precisely the impact of these effects on rural food security nor is it possible to predict properly the consequences of changes in state policy towards urban sector employment, wages and food prices on rural food security.

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