

CHANGING PATTERNS OF AGRICULTURE IN SOUTH KYAGWE

MENT RESEARCH by David A. Hougham.  
PROJECT

Remembering an earlier seminar upon the project discussed in this present paper - a seminar more akin to a political conference than to academic discussion - it may seem highly presumptuous of the author to yet again venture into invitations of suggestions and criticism. However he feels that the completion of work in the first selected gombolola, whilst providing no valid conclusions, has encouraged the construction of hypotheses to be tested elsewhere, as well as necessitating alterations in the original methods and objectives of the project. For this reason he feels that further discussion would be of use.

Thus this paper may usefully be divided into three sections, the first of which concerns the methodology accepted for the project as a whole, and for Mutuba 1, south Kyagwe in particular. Whilst the second section will, very hesitantly, discuss some of the information obtained in that first area, the third will outline how the work there has suggested possible hypotheses and changes of emphasis in the work.

SECTION ONE

The interviewing undertaken in south Kyagwe was the initial part of a project originating from the University of Cambridge, and financed by the United Kingdom Ministry of Overseas Development. The broadest outline of objectives, as defined at the conception of the project, was that it would be a "joint agricultural economics and social anthropological survey of the emergence and nature of larger scale African commercial farming in Buganda." The finer outline of objectives, and of methodology, was, as in any comparable project, influenced largely by certain practical conditions.

1. The time available for field work was fixed at 12 months, thus preventing any constant recording of farm activity during a complete farming year (this time period has since been extended by 6 months).
2. The money available was such that the two research officers were able to employ only one assistant each - in both cases an interpreter!
3. It was preferred that a larger number of farmers should be visited on a "single" interview basis rather than a smaller number studied more intensively.
4. There has been a lack of previous work on farm economics, especially in regard to the larger farmers, in Buganda, thus causing there to be no previously gained data from which the present workers could define a "large" farmer.
5. There has been no census of individual farm acreages, incomes, etc. which might usefully have provided a basis for sampling.

There being no time in which to carry out a pre-enumeration survey, nor a proper pilot project, the last two of the above problems have had to be solved somewhat arbitrarily. In regard to the definition of a large farmer, the economist has delineated two categories:-

(a) Farms with a cultivated acreage of 20 acres or more (a figure which began at 25 acres, and may yet be further reduced).

(b) Farms with fenced grazing and 5 or more cattle, whether local or exotic.

Sheep, chicken, fish and other farms are sufficiently rare to be dealt with separately when arising.

Sampling is being undertaken on a geographical basis, with all the unexpected variations that such a system can present one. Already, in 4 gombololas visited by either myself or the social anthropologist, the number of relevant farms has varied from 15 to over 40. Since the commencement of the project, the author has initiated his own very tentative census of relevant farms in the main coffee-banana zone of Buganda (this zone having been finally selected in preference to the whole of Buganda). Local Agricultural Offices have co-operated in the drawing up of totals for individual gombololas, though, due to recent "incidents", there has been a delay in some areas in returning the figures. However, even when collected, the data will be useful only in broad geographically comparative detail. Both the author and the social anthropologist have discovered that, in regard to arable farms, even Agricultural Office acreage data is not particularly reliable.

For the purposes of geographical sampling, the author has, with trepidation lessened only slightly by his own geographical education, divided the main coffee-banana zone into 6 zones. Three of these may be termed to be within the "closer Kampala" area, they being the Kyagwe, Bombo and Mpigi-Jeza zones (nomenclature very arbitrary). A further zone includes Buddu, whilst the last two zones are in the area equidistant from Kampala and Masaka, one of these being near to the main road (i.e. Mawokota) and the other towards the inland edges of the main coffee-banana zone, such as southern Singo and Gomba.

It is therefore intended to undertake interviewing in one gombolola within each of these zones, preferably a gombolola not peripheral to its zone. However since the economist has agreed to work also in gombololas selected by the sociologist, and since the latter's choice will not always coincide with that of the economist, some additional gombololas may be visited and studied. MUSAALE in Bugerere is an example of such.

The problem posed by the use of only "single" interviews has been mainly one of appreciating the accuracy of input-output data gained during the interview. Although approximate farm accounts are kept in a few cases, these are the definite exception, and thus much of the farmer's information is guesswork, memory, averages and, perhaps, outright distortion. Further is the problem of the farming year about which the interviewee is to be questioned - for example whilst it is possible in July 1966 to ask for data concerning 1965, this data should, if retained only in the farmer's memory, decrease in accuracy with the passage of time. The work in Mutuba I was conducted in such a manner as to obtain not only the gross margins for individual enterprises, but also to obtain total farm incomes - including food obtained from the two chickens, three goats, and half an acre of cassava. The author felt that the collection of data concerning these minor enterprises only detracted from concentration upon the major enterprises, without any very reliable extra statistics being obtained.

The author's interviewing in Mutuba I was carried out during the same period of time as that of the sociologist. However even then it was found difficult to even arrange joint objectives. The sociologist being concerned, through his study of the large farmer and the society within which he operates, with a larger number of persons, was obviously differing in speed of work from the economist - it being felt further that the economist would, within Buganda, be able to survey more gombololas than the sociologist. Thus the economist has had to define objectives which are applicable not only to gombololas of joint study, but also of use in gombololas in which he would be the only worker. Thus rather than a carefully integrated joint survey, the sociological and economic aspects have tended to diverge.

Above the somewhat academic problems outlined above, the author has discovered that considerable further problems and obstacles are encountered between initial entry into a gombolola and the obtaining of the first interview. These problems, and the time they consume, stem largely from the lack of any census of farm acreages. Whilst a list of relevant cattle farmers may be obtained from the Veterinary Office, using the previous year's cattle census, no such lists exist for arable farmers.

Thus one has to rely on an amalgamation of lists of arable farmers obtained from Agricultural Officers, Gombolola Chiefs and Muluku Chiefs. Upon visiting the farmers whose names appear on these lists, about 50% are usually found to have less than the stated 20 cultivated acres, whilst other relevant farmers are discovered during various discussions with fellow farmers, and even local habitues of bars. Whether any farmers escape the author's net will never, of course, be known.

The farmer is first visited by the author and his interpreter accompanied by the muluku chief - his attendance being helpful in dispelling the farmer's suspicions (only one interview in Kyagwe was refused by the farmer, though another farmer admitted to the interpreter that he had withheld vital information). A date is then fixed for the main interview, which is itself preceded by a tour of the farm, during which the author finds he is able not only to ingratiate himself to the farmer as far as is possible, but able also to obtain visual checks which may prove useful during the later questioning.

As regards quantitative measurement - acreages, quantities sold, etc., the author has had to rely upon the farmer's estimates - there being no available time for acreage or yield measurements. Whilst generally there appears to be a reasonable accuracy in acreage data - often checked against mailo records - such accuracy must deteriorate as one moves from land owned to individual crop acreages. The only real check here is the author's suspect visual ideas of acreages and relative areas. Where there are no farm records, estimates of sales are of doubtful accuracy, often very evidently rounded off to the nearest hundred units. In regard to costs, the chief complication is labour, especially in estimating the percentage distribution between different enterprises. Such is obviously easier to calculate on a banana-coffee farm than on one having bananas, coffee, sugar and cattle.

The effects of the above severe reservations on the accuracy of input-output information will be discussed later.

Information upon the accumulation of capital and land has been ~~of~~ more easily collected than that on the individual enterprises, and few qualms are felt as to the accuracy of this data, although it is possible for a farmer to omit, for several reasons, particulars of land owned elsewhere, or of jobs held.

## SECTION TWO

In this section it is proposed to discuss the results obtained from interviewing 12 farmers in the Mutuba 1 gombolola of Kyagwe. Although there were 16 farmers falling within the categories outlined earlier, 2 of these refused to be interviewed, 1 stated that he had withheld information, 1 has ~~xxxxxx~~ yet to be interviewed, and 1 needs, in the author's opinion, a further visit - but has not returned to his farm during the past two months.

stating

The author has pointed out that although conclusions from 12 farmers is a fairly pointless exercise, the information gained is useful in indicating possible hypotheses for testing. Perhaps this is only the author's way around the problem of drawing conclusions! We would further remind his audience of the limitations on the input-output data outlined above.

72 square miles in area, Mutuba 1 gombolola is located about 20-30 miles east of Kampala, lying between the Kampala-Jinja road and the northern shores of Lake Victoria. Topographically it is perhaps divisible into three areas. In the south, near the Lake, the landscape is dominated by long higher ridges rather than hills, although the slopes are not particularly severe. Some of the valleys between the ridges are little more than lakeside swamp, filled with the common mass of dead trees. In the east of the gombolola is an area of low hills and extensive swamp. Most of the centre, north and west consists of the rounded hills more readily associated with the coffee-banana zone of Buganda, although in the centre of the gombolola the hills are more outstanding. The



soils, although generally conforming to the Buganda Catena, are less fertile, according to Agricultural Office estimates, than further inland in Kyagwe. Local agricultural extension workers believed yields to be 20% than those of the inland area. Yet, whilst ~~xxxx~~ several of the slopes in the gombolola are fairly steep, the author saw few cases of soil erosion.

As regards population the author has attempted to compare figures for Buganda, Kyagwe and Mutuba 1, but since the figures for the former two are often heavily influenced by the changes in Kampala and its immediately surrounding suburbs, such comparisons may be invalid. With a population density of 303 persons per square mile, Mutuba 1 is exceeded by only 28 other gombololas in Buganda, although most of these are in the same main coffee-banana zone, especially around Kampala. Its rate of population increase between 1948 and 1959 was 1.3% less than that of Buganda, and 9.7% less than that of Kyagwe. Whilst the higher Buganda rate is probably easily explained by Kampala, the gombolola does not appear to have increased in population as fast as the rest of Kyagwe. Of interest might be the rate of increase of the non-Buganda population, which, if high, might indicate considerable immigration. During the same period as that above, the non-Buganda population of Mutuba 1 increased by 28%, whilst that of Buganda, again noting Kampala, increased by 80%.

Thus it would not appear that, since 1949, there has been any very exceptional increase of population in Mutuba 1.

The author, having obtained population figures for individual muluka, had hoped to be able to discern any varying densities of population within the gombolola, but he was unable to obtain accurate area data for these much smaller divisions. The range of individual muluku populations was from 1,794 (8.3% of the gombolola population) to 3,751 (17.3%).<sup>1</sup>

Although the Kampala-Jinja railway line crosses the north of the gombolola, the author doubts if it is of much importance to the local inhabitants. The better murrum roads are found only in the west and south of the gombolola, Kisoga village, in the south, being the main road focus. The centre and north-east ~~xxxxxx~~ is served only by an enlarged track.

Meteorologically, 1965 was for both Kyagwe and Mutuba 1 remarkable for the long drought which afflicted most of Buganda, what relief there was being often in the form of damaging hailstorms. Because of the drought rainfall at Mukono fell from the previous nine year average of 69" to a 1965 total of 39". Sugar, coffee and some cattle farmers commented adversely upon the drought - and the probably reduced yields for the first sugar crops may discourage some of these beginning the enterprise. It is not possible to discern the extent to which lower coffee yields claimed by most of the farmers was attributable to the drought, or rather to the less intensive picking resultant from low prices. The failure, as a result of the drought, of the large expected

<sup>1</sup> Population data obtained from:-

Geographical and Tribal Studies (source: East African Population Census 1948). East African Statistical Dept.. Nairobi. 1950

Uganda. African General Census. East African Statistical Dept. Entebbe. 1959

Population by Sex and Age group for Protectorate-Provinces-Districts-Counties-Divisions-Parishes. Uganda. General Census of African Population. Volume 1. E.Afr. Statistical Dept. Entebbe. 1960

cotton crop in Mukono Division doubtfully had any severe repercussions<sup>2</sup> in Mutuba 1, where the crop is apparently only of very minor importance.

An important influence on agriculture in south Kyagwe has undoubtedly been the existence in the area of large estates, the most famous being the sugar estate at Lugazi. In Mutuba 1 the estates are to be found predominantly in the north-west and the south. In the former area, south of Mukono, are several sugar estates and factories, most of which also purchase African produce. The south of the gombolola is more noted for the large coffee estate in the Nsonga area. The Lugazi estate is adjacent to Mutuba 1 in the north-east.

Before considering the results of the questioning of the farmer's the author would wish to draw attention to a feature of farm distribution in Mutuba 1 which has also been found in a Busiro gombolola by the sociologist, namely a tendency for the larger farms to be grouped together geographically. Out of the 16 relevant farms in Mutuba 1, the arable farms, exotic cattle and local cattle farms all appear to occur in distinct areas. Thus 6 of the nine arable farms are in the extreme south-east of the gombolola. Although lake-shore disease problems of the past may have enabled farmers in that area to resist tendencies to selling land in small parcels, there being a lack of purchasers interested in farming there, the author believes that a more probable explanation is that later immigrants into the area tended to buy or rent small shambas in the northern parts of the gombolola, closer to the Kampala-Jinja road. The cattle farms may well, in their distribution, reflect the importance of being adjacent to a road. At least one cattle farmer cycles four times a day from Nakisunga to Mukono to deliver his milk to a collector. In the Busiro gombolola the author understands that nearly all the large farms are to be found in one ~~xxxxxxx~~ muluku. However in his present area of work in Mawokota there appears to be less geographical concentration.

It was indicated above that, as regards crop yields, especially in regard to coffee, the price structure of the past year has been of prime importance. Whilst the author would not describe present coffee prices as indicative of a "collapse" in prices, the changes have been such as to alter the relative profitability of different enterprises.

At the beginning of 1965 the minimum price for dry kiboko was fixed at 50 cents per lb., only to be reduced in May to 40 cents per lb.. This compares with a price of ~~1~~ Sh. 1/50 at the peak price period in 1954, and the price had not previously fallen below 50 cents per lb. since 1951 - when 50 cents was obviously worth more in money terms than at the present. The 1960s fall in price has not only influenced the emphases on different enterprises, but also has changed some of the methods of production and types of coffee sold. Most farmers still picking coffee have stated, both in Kyagwe and Mawokota, that during the past two years they have employed less labour, and picked less extensively. Further they have almost uniformly ceased to sell dry cherry, selling only wet cherry. Since it needs three times as much picked cherry to produce one pound of dry cherry than wet cherry, and since the price per lb. of dry cherry is only twice that of wet cherry, this new tendency is far from surprising. In regard to prices and farm processing, a single interesting case has recently been observed in Mawokota, where a farmer was able to give full figures for his own farm production of ground coffee for shop sale. Excluding packaging costs (all done in evenings by farmer and family) the receipts for the ground coffee were equivalent to 31 cents per lb. of wet cherry, a 50% higher price than that the same farmer was able to get selling the wet cherry direct to local traders. It would, therefore, appear that, given a local market for the finished product, farm production of packed ground coffee is possibly a more profitable approach, in the short term, for the enterprising farmer than other forms of selling coffee. In regard to the selling of wet rather than dry cherry several coffee factories and co-operative works visited by the author indicated that it seemed that, by buying wet cherry from the farmers, they were better able to regulate the quality of coffee sold to the next purchaser.

<sup>2</sup> Data for above from Annual Report 1965. Mukono Division, Department of Agriculture.

The pricing system as regards the farmer is most complicated in Mutuba 1 in regards to sugar cane. The Mutuba 1 growers are not outgrowers in the sense by which that term is normally applied to sugar growers in Kyagwe. In Mutuba 1 all of the growers have begun the enterprise without previous agreement with a factory. However, upon selling the crop to a factory, several factors can affect the price paid. The farmer may both cut and transport the cane to the factory himself, may cut it himself but have the factory provide transport, or may request the factory to both cut and transport the cane. Not only will the price paid to the farmer differ in all these respects, but will further differ in regard to the height of the cane at the time of cutting. Nor need the transport costs be arranged by the "ton-mile", but can alternatively be paid for by the lorry load. In Mutuba 1 3 sugar growers said that they had received, or were expecting to receive, prices of 30-45/- per ton, whilst two other growers quoted 40-55/- per ton. The sugar factories quoted prices paid in the range 35-55/- per ton, noting especially the lower quality and yields ~~xxxxx~~ of the African cane compared to their own estate production. It would be interesting to know whether true African outgrowers are more efficient producers than the more individualistic growers encountered in Mutuba 1. A further factor noticeable in that gombolola was the agreement, on the part of both farmers and sugar factories, that the price paid to African growers is subject to very strong competition between about six buyers.

Prices involved in the third enterprise studied considerably in south Kyagwe were stabler and more fixed than those for sugar. Milk from exotic cattle was fetching, for the farmer, 3/20 Sh. per gallon, the only farmer selling Nganda milk in large quantities stated that he also received this price. However most Nganda milk was sold locally in bottles, the price varying, presumably upon whether sold in a Cinzano or Raig's bottle. Mature Nganda cows and bulls appear to have been sold for between Sh.300-400, whilst exotic cattle were sold for figures varying from 750-1400 Shillings.

Of more direct interest to the farmer than pure prices is obviously their effect on gross margins for the individual enterprises. Already, above, the author has suggested that such figures be approached with hesitation. This is especially true in respect to sugar. Of the normal three crops harvested from the initial planting, no farmer in Mutuba 1 has yet harvested more than one crop. The author has therefore had to assume yield changes, and price changes, for subsequent cuttings. He has in fact assumed yields for the second and third cuttings of 75% and 60% respectively of the first crop. A price increase of 5% per crop (about 3.3% per annum) has also been assumed, mainly in the light of the strong local price competition. The G.M. was calculated by a discount system, opening up costs being included.

Of the five sugar growers interviewed, four, by the above calculation, should, at the end of the third cutting, expect to have gained gross margins of between Sh.500-600 per acre per 12 months, whilst in the case of one farmer the figure was just over Sh.300. Given the expected adverse effects of the 196<sup>e</sup> weather, and in one case partial fire, the ultimate G.M.s might be higher. As will be seen, only one coffee farmer had, in the 12 months for which he was questioned, gained a higher gross margin per acre of coffee picked. The gross margin per 100/- costs for sugar seem likely to fall in the range of Sh. 150-400. Again the lower of these limits is exceeded by only one of the Mutuba 1 coffee farmers in respect to his coffee enterprise.

All 12 farmers had coffee planted, though only 5 continued to pick all their coffee acreage. 5 farmers had ceased altogether to pick coffee, three of these having developed exotic cattle enterprises, and two having begun growing sugar. 2 farmers were picking less than 40% of their coffee acreage, neither of whom had developed an alternative enterprise. It should be noted that only four farmers had a planted coffee acreage in excess of 10 acres, although only two of these picked all their acreage, the other two being those who had reduced picking to below 40%.

Gross margins per acre of picked coffee, based upon one years receipts and costs (i.e. not discounting) varied from minus 475/- per acre to plus 1200/- per acre, although only 2 farmers exceeded the average



(sum of all coffee G.M.s divided by sum of picked acreages) gross margin of Sh.251 per acre picked. If the G.M.s are related to the coffee acreage planted, the figures immediately decline, the range per acre being minus 120/- to plus 600/-, Gross margins per 100/- costs ranged from minus 42/- to plus 197/-.

In respect to cattle farmers, with fenced pasture, the gross margins varied from 329/- to 6,815/-, and, as regards G.M. per grazing acre, from 9/- to 574/-, three of the five farmers in this category having gross margins per grazing acre in excess of 500/-. The 9/- achievement was mainly the result of the farmer replacing a large number of local cattle with a small number of exotic cattle on the same grazing area. From the other four cases, of which two possessed exotic cattle, one a local/mixed herd, and one a purely local herd, the two exotic enterprises do not stand out as especially more profitable than the others. However since no farmer had more than 10 cattle, this may not be surprising.

From these figures it would not seem that, amongst the twelve larger farmers in Mutuba 1 with cattle or sugar enterprises, there is generally much difference between the profitability of the two enterprises, though both appear preferable to coffee at the present. There are, however, fairly large differences in the problems faced in developing the two enterprises. Once sugar has been first planted, the initial capital costs of clearing new land and of buying cuttings is usually apparently covered by the profit on the first crop. With cattle, however, the capital costs are more severe, and the time elapsing before they are covered by profits must be longer. Since the author has not used any very complicated discounting system for cattle, he feels that in reality sugar gross margins are probably higher than those gained with cattle. In regard to the initial capital required, none of the ~~xx~~ sugar farmers had required institutional loans, whilst four of those who had enclosed cattle grazing had done so. Yet, as will be seen, the ready capital available to the sugar farmers was in almost all cases greater than that available to the cattle farmers.

It has been stressed that there is a close liason, though not in any formalised scheme, between the sugar growers of Mutuba 1 and the local factories. In the area of Mawokota in which the author is at present working, sugar has not yet been developed as an enterprise since, in contrast to Mutuba 1, there is only one local sugar factory, as usual with its own estate. The farmers fear that if their cutting coincided with that of the factory, there would be no willingness by the factory to purchase their crop, which would then have to be transported, at 55 cents per ton mile, to the Kyagwe factories, thus making the enterprise doubtfully profitable.

The author has indicated that much of the questioning, and perhaps the side giving greatest accuracy of results, is concerned with the accumulation of resources. The two chief approaches to this section are through obtaining details on land previously or presently owned, and non-farming jobs held now or in the past. Obviously it may, with a sufficient number of interviews, be possible to correlate these to the extent of the farmer's agricultural changes and performance. At present one can only indicate a few facts from Mutuba 1.

Of those farmers recently planting sugar, of which there were five, all have income other than that obtained from farming, some with more than one other source. Other occupations occurring within these sugar farmers are trader (2), co-operative manager (2), shop-owner, mechanic, engineer. Of those who have enclosed their grazing, the list of other sources of income for the five farmers is less emphatic. Only three had other sources, one being an engineer (also listed under sugar growers), one a small shop-owner, and one a primary school teacher. The annual income from their non-farming sources of the last two of these certainly does not exceed that of any of the sugar farmers. Yet, as pointed out above, it is these people who have had ~~xxxx~~ to capitalize their recent farm developments most.

Of the three farmers having neither sugar nor fenced pasture, one had no other source of income, one had been a local butcher for 30 years,

and a trader for one year, whilst the third was a Kampala business-man.

In investigating the farmer's accumulation of land, he has been questioned upon both the history of his present farm, and for details in regard to land owned elsewhere. Also the "farm" may include separate ~~xxx~~ holdings in close proximity to one another, and managed as one unit. In Mutuba 1 this only occurred twice, both the farmers with local cattle having three holdings in the same muluku, one of which, in both cases, had recently been purchased purely for opening up as fenced grazing.

Of the twelve farms involved, four had been purchased completely, and four either inherited from, or given by, the present farmer's father. Two farms had been partly purchased and partly inherited, one farm was part purchased and part rented, and the last farm completely rented. In two cases the farmer had purchased an area of land part of which he had previously been a tenant.

Excluding early tenancy rights, or small areas added subsequent to obtaining ownership to the main area of the farm, possession of two farms had occurred previous to 1940, of three between 1940 and 1950, two between 1950 and 1960, and five since 1960. It is hoped later to have an idea of the historical changes in land price, but until enough information has been obtained, this is not yet possible.

The only farmers not owning land other than their farm in Mutuba 1 were three of the five cattle farmers - again reflecting the apparent lesser capital resources and accumulation. However two other farmers owned, as well as their farm, only a small shamba, once their residence, and now in both cases occupied by a near relative. Four farmers also owned one other area, the acreages of these second "farms" varying from 22 to 200 acres. One person owned two other "farms", with a total acreage of 210 acres, whilst two persons owned three other "farms", with a total of 748 acres (including 485 acres in Toro) and 123 acres. Two farmers also each owned eight development sites in the Kampala area.

Of the 11 other "farms" whose acreage exceeded ten acres, one was in the process of being planted with coffee, one with cocoa, and one planned as a large cattle farm with fenced grazing. Four, including that in Toro, were tenant occupied, three were as yet unopened, whilst one, of 200 acres, had never been visited by the farmer since he inherited it in 1945.

It is hoped that the information summarised in this Section will be accepted as indicative of a changing pattern of agriculture in one small area of Buganda, a fact perhaps emphasized by the fact that none of the exotic cattle had been obtained, nor any sugar planted, before 1964 (although some enclosure of grazing has been recorded in the late 1950s.) All but two farmers stated that their farming businesses had expanded in the last five years, the two exceptions being elderly coffee farmers, both picking only a percentage of their planted coffee, and remembering, with flowing description, the days of high coffee prices, one also having had a large local cattle enterprise for his butchery. It might be added that of the four farmers also qualifying in the categories studied, two had very recently begun local cattle enterprises with fenced grazing. Further three of them also had a sizeable non-farming income, all three being traders.

### SECTION THREE

As will be seen from the questionnaires given out with this paper, the data used above is only part of that obtained. Other information obtained includes that on management, land prices, inter-cropping, changes in cropping techniques, labour wages, and contact with extension workers. However the discussion in Section Two of this paper is intended to cover what the author believes to be the primary concerns of the project. He hopes, however, that in any subsequent discussion of the paper, nobody will feel inhibited from discussing the secondary data as above.

The work in south Awagwe indicated the necessity of more closely defining the objectives to be aimed at in the research, especially in



regard to the use of input-output data obtained. With the divergence between the economist and sociologist, the simple use of such data as an index of the farmer's agricultural performance, to be compared to sociological factors, would not be very useful. Further it would seem to ignore what, to the author, is his luck in being able to study a farming system during a period of some economic stress, and definite sudden changes.

Thus, on the economics side, he has felt that input-output data should be collected only for a farm's major cash enterprises. Thereby one would hope, at least comparatively, to know the likely gross margins for certain enterprises, and to relate these to the inputs of capital and land. Yet even were the author to be so presumptuous as to believe that such information might be of use in future agricultural planning, the data alone is useless unless some of the decision making factors are analysed. In this respect, and from the south Kyagwe work, as yet not importantly different from results obtained in Mawokota, the author has risked constructing a series of hypotheses to be tested.

1. That the recent level of coffee prices has been such as to have caused most of the larger farmers to have adopted, or seriously considered adopting, new enterprises.

2. That whilst a cattle enterprise utilizing fenced grazing can be developed in most of the main Uganda coffee-banana zone, the development of new crop enterprises will depend upon the extent of the existence of local processing factories with capacity above that of their own estate production.

3. That the larger farmer who has alternative sources of income, and has owned his farm for several years, is more likely to adopt, as alternative enterprises to coffee, cash crops yielding a quick return to capital invested in opening up the necessary land.

4. That the farmer with more limited land and capital resources, and therefore requiring institutional loans, will develop enterprises in which the return to capital is slower. (The author suggests that this is because the Agricultural Office, which recommends farmers for loans, prefer that the farmer receives a succession of fairly small loans - better thus suited to such enterprises as cattle and cocoa than to sugar).

5. That the farmer only very recently able to purchase a fairly large farm will prefer cattle enterprises even to the extent of destroying coffee trees, but that farmers with established coffee trees will usually not yet be willing to destroy them.

It is hoped that these hypotheses will provide a framework within which the south Kyagwe results may be usefully discussed, as well as ideas that other persons may have, either theoretical, or from their own field work.

-----

<sup>3</sup> see page 6. These sugar calculations, especially in regard to yields, are based mainly on Sugar Outgrowers' Schemes in Uganda by M.N.Mehta. Record of the Ninth Annual Meeting of the Uganda Agricultural Association 1962.

RDR/21

Mukono

Sinja

MUTUBA I, KYAGWE

Kampula

N  
↑

Sesha

C - Over 20 acres cult.  
L - Local cattle (fenced)  
E - Exotic cattle.



0 1 2 miles

Approx. scale.

- ==== - farmac
- - murrum
- - - - - murrum/track
- +++++ - railway
- ~~~~~ - swamp.

Nakisunga

Kisoga

Kiyola

Nkokonjeru

C

C

C

C

C

C

C

C

C

C

C

C

C

C

C

C

Kibanga Port

Nsonga





KDR/21

INDIVIDUAL FARM SUBSIDIARIES - MUTUBA 1, KYAGWE

- KM 1 28 acres owned (inherited 1953). 20 acres cultivated - 12 coffee, 8 bananas, 1 millet, 1 cotton. No cattle. 1 other plot owned - 5 acres. No other sources of income. Only 27% coffee acreage picked. Negative coffee gross margin. Negative farm income.
- KM 2 30 acres owned (taken over from father in 1955). 30 acres cultivated. 16 coffee, 10 sugar, 1 mbidde, 1 food. 1962 purchased 65 acres in Busiro - developing for coffee. Manager local co-op coffee works and private coffee trader.  $\frac{1}{2}$  coffee acreage immature. 100% mature acreage picked. Coffee G.M. - 1198/- p.a. & 129/- per 100/- costs. Sugar planted 1965. Est. G.M. - c500/- p.a. & c 162/- per 100/- costs. Mbide G.M. of 4,115/-. No cattle. Est. farm income of 13,966/- p.annum, = 466/- p.acre.
- KM 3 72 acres owned ( purchased 1955), of which 40 cultivated, 10 rough grazing, 10 tenanted. 30 acres coffee, 8 bananas, 1 groundnuts, 6 other food. 19 local cattle. Formerly tenant on small shamba on land now owned. In 1954 purchased 110 acres nearby - unopened or tenanted. 1964 purchased 100 acres same muluku - tenanted. For 20 years local butcher, 1 year coffee trader. 37% of coffee picked. Coffee G.M. of 287/- p.a. & 197/- per 100/- costs. 82/- p.a. G.M. cattle. Total est. farm income - 5,412/- p. annum = 108/- p. arable/grazed acre.
- KM 4 50 acres owned ( purchased 1946), of which 20 cultivated. 20 acres coffee, 7 acres bananas. Farm managed by brother. No cattle. 1945 purchased 7 acres same gomb. for residence. 1958 purchased 256 acres same ssaza. Tenanted or unopened. 1961 purchased 485 acres in Toro - not opened, illegally tenanted, and wishes to sell. 9 development sites and 1 residence owned in Kampala area. Formerly coffee factory manager, later Vice-President of national co-op union. Tenant manager Kampala petrol station. 100% coffee picked, with G.M. of 52/- p.acre, 15/- per 100/- costs. Negative farm income.
- Coffee enterprise begun 1946. First income 1952. After this, till 1960, coffee receipts over 20,000/- per annum. Since 1960 mainly below this figure. 1965 receipts 8000/-. Since 1946 accumulated farm income of 90,700/-.
- KM 5 40 acres owned, ( purchased 1961-62), of which 33 acres cultivated. 1936-61 tenant on 10 acres of same land. 4 acres coffee, 20 acres sugar, 5 acres bananas, 4 acres cotton. 5 acres other food crops. No cattle. 1965 purchased 40 acres in Sugerere for cattle enterprise. Assistant manager of Coffee company. Till 1957 coffee and maize trader. No coffee picked. Est. sugar G.M. 510/- per acre, 357/- per 100/- costs. 1020/- per annum G.M. for pigs. Farm income est. c 15,000/- per annum, 450/- per cult. acre.
- KM 6 35 acres owned ( purchased 1947), of which 31 cultivated. 8 acres coffee, 20 sugar, 5 food. 4 local cattle. 1948 purchased 23 acres in neighbouring gomb. - unopened. 1950 purchased 60 acres in same adjacent gomb. - 21 acres planted cocoa. 1950 purchased 40 acres same adjacent gomb. - unopened. 1958 purchased 11 acres mutuba 1, sold at 100% profit in 1960. Also owns 7 development sites in Kampala. Coffee trader, shop owner and local garage owner. 100% coffee picked. G.M. of 365/- per acre, 12/- per 100/- costs. Most of first sugar crop lost in fire. Est. G.M. per acre per 12 months of 121/- per acre & 200/- per 100/- costs (excl. fire). Total cattle G.M. of 350/-. Farm income est. 3,675/- per annum, 119/- per cult. acre.

---

This work is licensed under a  
Creative Commons  
Attribution – NonCommercial - NoDerivs 3.0 Licence.

To view a copy of the licence please see:  
<http://creativecommons.org/licenses/by-nc-nd/3.0/>