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EVALUATION OF THE USAID/KENYA
**FERTILIZER PRICING AND MARKETING
REFORM PROGRAM**

FINAL REPORT

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September 1994

Under Contract by the
United States Agency for International Development

Purchase Order No. 623-0243-0-00-4040-00

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Abbreviations Used in the Report

AID	Agency for International Development
ACP	African, Caribbean and Pacific
AFC	Agricultural Finance Corporation
BAT	British American Tobacco
BoP	Balance of Payments
CBK	Central Bank of Kenya
CIF	Cost Insurance and Freight
CIP	Commodity Import Program
CSFC	Cereals and Sugar Finance Corporation
DA	Development Assistance
ESF	Economic Support Fund
EEC	European Economic Community
FPMRP	Fertilizer Pricing and Marketing Reform Program
FC	Fertilizer Committee
GoK	Government of Kenya
IDF	Import Declaration Form
KBL	Kenya Breweries Ltd
KFA	Kenya Farmers Association
KGFCU	Kenya Grain Growers Cooperative Union
KNFA	Kenya National Fertilizer Association
KNFC	Kenya National Federation of Cooperatives
KPA	Kenya Ports Authority
KTDA	Kenya Tea Development Authority
LC	Letter of Credit
MoA	Ministry of Agriculture
MOALD	Ministry of Agriculture and Livestock Development
MoF	Ministry of Finance
MRP	Maximum Retail Prices
OP	Office of the President
PAAD	Project Approval Assistance Document
SAP	Structural Adjustment Program
MT	Metric Tonne

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Chapter 1

INTRODUCTION

In 1970, Kenya's fertilizer distribution trade was on the door step of a golden age. Fertilizer nutrient use had more than quadrupled during the 1960s, and consumption was expected to grow even more rapidly during the 1970s. Fertilizer distribution was highly competitive in the more productive farming areas and in servicing the large farm and estate subsectors. The two principal distributors, KFA and Mea Ltd, were building up retail networks to serve the smallholders. Smallholder fertilizer demand had been spurred by increased planting of new maize hybrids.

At the time, fertilizer distributors had cordial relations with the Kenyan subsidiaries of European suppliers. These subsidiaries ordered fertilizer from their parent companies and covered the Kenyan side of international fertilizer tenders while the European firms supplied the fertilizer and technical expertise. The Kenya Farmers Association (KFA), chartered as a private firm and a cooperative, was the leading distributor.

Unfortunately, the golden age of the 1970s never arrived. Fertilizer imports by weight were lower at the end of the decade than they were in 1970, and nutrients consumption rose only 3 percent compared to over 400 percent the previous decade.

In 1971, a Government of Kenya (GoK) Working Party reviewed the performance of Kenya's agricultural inputs distribution, and was extremely critical of the system, citing high market concentration, collusive pricing, high prices, and formidable entry barriers. The Party complained that smallholder fertilizer access and the development of cooperatives had been ignored. As a result, the GoK implemented fertilizer price controls, allowed less technically competent firms to import and distribute fertilizer, and undertook other reforms in line with the working party's recommendations.

The 1973/74 oil price shock caused fertilizer prices to rise sharply before decreasing suddenly. Fertilizer shortages were followed by gluts. GoK sought aid fertilizer for the first time to mitigate foreign exchange problems. Fertilizer application dropped following price escalations but began to recover as the impact of the oil shock died. New organizations encouraged by the GoK, entered the fertilizer trade. Many, however, eventually withdrew or went into receivership following diminished opportunities for profitable participation in the trade.

In 1978, Kenya was in acute foreign exchange difficulties and once more sought aid fertilizer. Due to its broad clientele, proven administrative capacity and financial viability, KFA was appointed the exclusive agent for distributing donor funded GoK fertilizer. KFA's exclusive agency

together with its other extensive commercial activities, enabled it to increase its share to nearly three quarters of the country's fertilizer market.

As aid fertilizer increased and KFA's market share swelled, its inventories of government owned fertilizer increased to far above what was commercially justifiable. These stocks posed a financial problem to both the government and the KFA, and reflected severe distribution inefficiencies. Such inefficiencies partly resulted from administrative requirements of donor funded fertilizer, GoK's difficulties in correctly forecasting national fertilizer requirements, and the fertilizer and agricultural commodity price controls. As a result, the private sector began disappearing from the fertilizer trade.

The purpose of this assignment was to improve USAID's understanding of the fertilizer subsectors liberalisation process and the roles played by different actors. This was to be achieved by reviewing documents and analysing USAID's involvement in Kenya's fertilizer subsector since 1980. The review and analysis were in respect of GoK, other donors, private and public sector involvement and policies, and in respect of institutions and other relevant activities.

Chapter 2 reviews the evolution of fertilizer trade in Kenya, and is followed by a review of the current structure of the fertilizer market. Chapter 4 reviews USAID's fertilizer projects and programs since 1980 while chapter 5 contains a review of fertilizer programs by other donors. A summary of the activities by multinationals also forms part of chapter 5. A review of the relevant GoK's planning documents and policies is the subject matter of chapter 6, and a review of the history of KFA/KGGCU is brought out in chapter 7. Chapter 8 attempts to relate trends in fertilizer consumption to fertilizer supply, fertilizer prices and producer prices, and chapter 9 summarises the main events in the fertilizer subsector. In chapter 10, an attempt is made to bring out the main orientations in the subsector, while chapter 11 concluded the report and includes a section on recommendations.

Chapter 2

EVOLUTION OF THE FERTILIZER MARKET IN KENYA

The first fertilizer shipment to Kenya was a 300 tonne consignment of single and double superphosphates procured jointly by the Kenya Farmers Association (KFA) and Albatross Fertilizer Company of Holland in 1947, for the more progressive European wheat and maize farmers. The outbreak of the Korean war in 1950 and the subsequent agricultural boom boosted fertilizer application in the modern farming regions of the country. Records suggest total fertilizer imports in 1951 of 6,500 tonnes more than 20 times the first shipment four years previous. Fertilizer consumption continued to increase during the rest of the decade following extensive mechanisation of agricultural operations on the large maize wheat and coffee farms. By the end of that decade, about 22,000 tonnes of fertilizer were imported annually.

About that time, there was rapid expansion of smallholder production under the Swynnerton Plan, with smallholders joining largeholders and estates as fertilizer consumers. Fertilizer consumption during this period grew fast enough for Windmill Holland, Development Finance Company of Kenya, and Dalgety & Co. to establish a bulk blending plant in Nakuru to produce NPK compounds.

By independence in 1963, about 40,000 tonnes of fertilizer were annually applied on the country's traditional cash crops tea and coffee, cereals such as maize, wheat and barley, and potatoes. The Government of Kenya (GoK) had, about that time introduced fertilizer subsidies collected by recognised importers and passed on to farmers¹. Most fertilizer was supplied by the Nitrex Complex cartel of European producers whose representatives imported and distributed fertilizers to an established clientele of large farmers and estates. The fertilizer importers produced a common price proposal for different fertilizer types annually during August for consideration by the Ministry of Agriculture (MoA) representing the GoK. Following MoA's approval which took no more than a fortnight, importers published prices for all major consuming centres.

Smallholder production was gaining dominance due to subdivision of large farms bought out from departing white settlers, introduction of high yielding varieties such as hybrid maize, and legalisative changes paving the way for coffee growing by African smallholders. The smallholder farming community was however not adequately supplied with fertilizer and

¹. Initially, the subsidies (nominal) amounted to kshs 3.95 per unit of phosphate and later increased to kshs 5.00. That for nitrogen was kshs 2.00 per unit. These subsidies translated to kshs 266.00 and kshs 144.00 for DAP 18-46-0 and NPK 20-20-0 respectively. Existing fertilizer importers found it necessary to form the Fertilizer Importers Association to facilitate subsidy collection, such subsidy being paid against import duties. The subsidy component was deducted from prices paid by farmers. See also KOC (1986).

in 1963, the MoA released the Mackenzie report focusing on constraints to increased smallholder fertilizer application. The report recommended, inter alia, the introduction of subsidies on phosphate fertilizers and placing of emphasis on cooperatives and small traders to improve supply to the smallholders². In spite of these measures and rapid commercialisation of smallholder food and cashcrop production, fertilizer use by the smallholder community grew unacceptably slowly during the sixties.

Arising from continued concern over this inadequate growth in fertilizer consumption by the smallholder subsector, the GoK commissioned, in 1970, a Working Party on agricultural inputs to further explore constraints to smallholder fertilizer application³. The oligopolistic structure of the fertilizer market was seen as one of the main villains. At the time, fertilizer imports were shared between Kenya Farmers Association (KFA) representing Albross-Holland (34%) Mackenzie Kenya Limited representing Windmill (24%), Sapa Chemicals representing Monticallen-Edison (5%) and others including Hoechst, BASF and Twiga Chemicals(37%). Two organisations, KFA and Mackenzie, dominated fertilizer distribution in the country, accounting for more than half of the business, each having depots and branch offices in the main farming areas from which fertilizer was sold directly to large farmers, estates, cooperative unions, parastatals and a network of stockists.

The Working Party made proposals to improve fertilizer marketing, and emphasised restructuring of the fertilizer industry to make it more effective and competitive, and to encourage wider application within the smallholder subsector. At the time, import prices were determined by the largest importer who chose c.i.f prices based on comfortable margins, other importers agreeing on this price list. The more efficient importers were then able to offer discounts, but discriminated against smallscale buyers unable to take advantage of quantity discounts. The Party recommended legislation against importer collusion, and proposed that importers be required to individually submit separate f.o.r Mombasa prices for GoK's approval. It also recommended calculation of wholesale mark-up on foreign exchange charge per tonne plus a fixed proportion of the c.i.f value to take account of both fixed and variable costs⁴. In addition, retail margins of atleast 10 percent over wholesale prices, rather than the then fixed kshs 30 per tonne was recommended because the latter discouraged retailers from stocking more concentrated but relatively expensive fertilizers. The Party also recommended restructuring of the KFA to make it

². Ministry of Agriculture and Animal Husbandry (1963). Kenya Fertilizers Working Party Report; Nairobi, September 1964. This report also recommended the establishment of a Fertilizer Advisory Committee consisting of MoA, Treasury, and importers to deliberate important issues such as the fertilizer pricing system.

³. This Working Party produced the Harvelock Report after the chairman of the party, published in Republic of Kenya (1971) Report of the Working Party on Agricultural Inputs. Ministry of Finance and Planning.

⁴ Fixed costs were on a fixed tonne basis and others varied with the fertilizer value.

a more national cooperative society serving different levels farmers. Short term credit for private traders was recommended to promote competition with cooperative unions. Further, a trader subsidised or government operated transportation mechanism to assist remote smallholders, and introduction of the smaller 25 kg fertilizer bag to meet pocket and transport needs of small businesses and smallholders were recommended.

Major changes in the fertilizer market occurred during 1970s. The oil price escalations of 1973/74 pushed international fertilizer prices to levels never experienced hitherto, increased sea freight rates and local transportation distribution costs. The GoK, already exercising some control over price changes by requiring importers to submit price adjustment proposals through the Kenya Fertilizer Association for consideration and approval by the Fertilizer Advisory Committee became increasingly disillusioned with the association which was experiencing difficulties in keeping a systematic price structure in the rapidly changing international fertilizer environment that made it imperative for the association to make repeated requests for price revisions in line with global market trends⁵. Consequently, the GoK made drastic changes related to fertilizer importation and pricing, giving itself full control over import licensing and levels, and established shipping handling and transportation margins.

Fertilizer subsidies were abolished in 1974, and all firms wishing to import fertilizer were required to apply for import quota allocations from an interministerial Fertilizer Allocation Committee. The import quota allocations were meant to regulate fertilizer import types and quantities to conserve foreign exchange, and to break the oligopolistic import structure. In the course of the same year, the GoK, encouraged by intimations from the N-Ren Company of Cincinnati that fertilizer could be obtained cheaply, became directly involved in fertilizer marketing by importing 174,000 tonnes of different fertilizer products nominating the Kenya National Federation of Cooperatives (KNFC) to distribute through the cooperative unions and societies. Meanwhile, the Ken-Ren Company, a partnership between the N-Ren Company and GoK, was established and was expected to have virtual monopoly over fertilizer importation awaiting the construction of its fertilizer factory in Mombasa. The proposed factory was expected to produce enough fertilizer to meet most of Kenya's needs.

The KNFC was overwhelmed by the requirements of its merchandising responsibilities, having had limited previous marketing experience. In the end, the experiment was disastrous.

⁵ By March 1974, fertilizer prices were double their 1971/72 levels. As the dust raised by the international price oil price escalation settled and international fertilizer prices began to drop, the European suppliers and their local representatives maintained a high price structure to recoup trading losses. The GoK's betrayal.

for KNFC, whose merchandising section was wound up four years later having incurred heavy losses occasioned by unsold stocks of government fertilizer.

Further, all fertilizer sold in Kenya after 1976 became subject to the General Price Control Order⁶.

By 1977, the GoK had become profoundly disenchanted with the Ken-Ren arrangement and removed Ken-Ren from fertilizer importation, encouraging local importers to get back to importation again. In 1978, the Ken-Ren project was altogether abandoned. Import licenses were issued to firms attracted to the market by opportunities for bidding on tenders to supply parastatals and private firms with established distribution networks. GoK also aggressively sought out fertilizer related donor assistance, and aid fertilizer became a common feature of the fertilizer market in Kenya. All donor financed fertilizer was, at the time, passed on to the KFA for distribution on a consignment basis.

The 1978/79 coffee boom precipitated a huge jump in fertilizer application on coffee planting and precipitated huge increases in fertilizer imports into Kenya. A large percent of this however went unsold for about 2 years, crushing importers unable to bear the cost of unusually large fertilizer stocks. By the beginning of 1980s, the number of firms able to arrange for and finance fertilizer imports had therefore substantially shrunk. Majority of the large overseas suppliers and trading houses had withdrawn from the market by the late 1970s following deteriorating profit margins, carrying charges on carryover stocks not profitably saleable, enhanced GoK control and involvement, price controls, general domestic credit squeeze and economic recession, and proposed monopolistic marketing and domestic production⁷.

At the turn of the 1980s, the number of capable fertilizer importers had dwindled substantially, and there was evidence of debutantes selling import licenses to more established firms. KFA, which had been nominated by GoK to handle the rapidly

⁶. This was gazetted in the Legal Notice Number 153 of 1976, and required the price controller to work out maximum retail prices for 42 scheduled centres. Initially, different prices were released for each consignment, often leading to incredible anomalies. For example, different MRPs would be announced for the same fertilizer product arriving in Mombasa within the same week by different ships from different ports of origin. In January, 1980, for example, three different price circulars were issued for different consignments of DAP, the differential between the cheapest and the most expensive being more than kshs 600 per tonne. See also Schluter M, Kimuyu P K and Ruigu, G (1985) A Review of the Fertilizer Import Allocations and Pricing Systems in Kenya. Chemical Engineering Consultant, Nairobi.

⁷. By late 1970, large fertilizer marketing firms such as Mackenzie, INTAG, and SAPA Chemicals had withdrawn from the fertilizer business. The 1974 GoK decision to plug the traditional fertilizer import avenues was a blow to members of the Nitrex Complex such as Albatross, Mantedison, Hoechst, BASF; as well as to Windmill; all of whom had offices in Nairobi. All of these companies had large fertilizer sections manned by agricultural and commercial specialists with capacity for carrying out...

increasing imports of donor financed fertilizer on account of extensive distribution network, accounted for the bulk of fertilizer business in Kenya. The take over of KFA by the Kenyan Grain Growers Cooperative Union (KGGCU) in December 1984 however, threw the fertilizer market into more turmoil. Uncertainty about the future prevented KFA from ordering fertilizer in time, leading to potential farmgate shortages during the long rains in 1985, the first long rains after a major draught experienced in 1984. Distribution of fertilizer to the main farming areas was delayed.

A wide range of large and small parastatals and private organisations participated in the fertilizer market in the early to mid-1980s period. Included in these were the KGGCU with the largest market share resulting from the very long experience, its predecessor and wide network in the main farming areas, well as its nomination to handle donor funded fertilizer. It covered every aspect of fertilizer marketing - importation, wholesaling and retailing. Mea Ltd, established in 1961 as a subsidiary of Windmill-Holland, had the second largest market share. It had seven branches and also sold to stockists, cooperative unions and societies⁸. Devji Meghji, a small private firm at the time, also imported and supplied on tender to cooperatives and large estates. It therefore did not have to require a distribution network and held 10% of the market in 1984/85.

There were about 12 other importers, mainly private firms selling to estates, cooperatives and parastatals. Murang'a Cooperative Union was the only union engaged in importation, the latter joined by Machakos and Kirinyaga District Cooperative Unions. Several private marketing organisations, parastatals and commercial firms supplied fertilizer to the network of smallholders that were part of the larger organisation's production schemes. Included in these were the British American Tobacco (BAT), Kenya Tea Development Authority (KTDA), Kenya Breweries Limited (KBL) and East African Industries, who either imported directly or bought on tender or received donor fertilizer allocations.

⁸ The 1970 report of the Working Party on agricultural inputs had recommended the restructuring of the KFA to make it a national cooperative serving different parts of the country. It was later nominated by the GoK as the main avenue for distribution of donor funded fertilizer. Records suggest existence of tension between the GoK and KFA regarding handling of donor fertilizer, KFA claiming that it had minimal participation in ordering of donor financed fertilizers leading to shipment of unpopular types, late arrivals and heavy storage costs. The GoK in turn accused KFA of not repaying the GoK promptly after fertilizer was sold, inflicting cash flow problems to the GoK and allegations of financial mismanagement in KFA. These circumstances appear to have encouraged the GoK to deal with the KFA. The formation of the KGGCU was announced in July 1984, and the directors of KFA were dismissed by the Ministry of Cooperative Development on allegations of mismanagement. The KGGCU immediately announced its intentions to take over KFA, and actually did so during December 1984. KGGCU's laws stated that the Union would have monopoly in grain marketing and distribution of inputs to grain although in effect its scope ended up being vastly wider than just grain growing.

Most cooperative societies and unions supply farm inputs either through their own commercial departments or GoK organised schemes. Small scale stockists supplied fertilizer to rural areas not served by the large organisations such as the KGCCU and the stronger cooperative organisations. Such stockists bought their supplies from major distributors such as MEA and KGGCU at small discounts, and often sold by the kilogram to meet the pockets of the very small smallholders and vegetable farmers.

Donor financed fertilizers have been supplied to Kenya under multilateral and bilateral agreements with different donor countries and organisations. Although the first donor funded fertilizer consignment arrived in 1974, large donor funded shipments began in 1977, becoming more regular after 1979/80, the proportion of donor funded shipments increasing from 27% in 1982/83 to a maximum of 63% of total fertilizer imports in 1987/88. As mentioned earlier, the KFA was initially appointed the government's sole distributor for donor fertilizer. Because KFA also imported fertilizer commercially, it tended to sell these supplies first while charging GoK storage costs for donor fertilizer. Much of this fertilizer was sold on credit to another parastatal, the Agricultural Finance Corporation (AFC), for its loanees. Endemic problems in the AFC's credit system led to delays in repaying KFA, leading to long delays in Treasury receiving shillings deposits of counterpart funds.

These problems strengthened the case for the eventual cancellation by GoK of its sole agency agreement with KFA/KGGCU in 1985. In the course of that year, some 28,000 tonnes of USAID funded fertilizer was distributed by a total of 24 private firms, with number of firms having access to donor funded fertilizer growing to more than 35 in 1987. However, while some donors insisted that their fertilizer be distributed through the private sector, others wanted their fertilizer aid to be channelled through the KFA through its wider distribution network so that such fertilizer could have a better chance of benefitting the smallholders. For donor fertilizer routed through the private sector, tenders were invited for quantity bids, and successful aloecees charged the Mombasa MRP minus 15% payable within 90 days in cash or by bank guarantee. The KFA/KGGCU was supplied donor fertilizer on consignment basis and charged Mombasa MRP minus 10% for sold stocks, and sale proceeds from aid fertilizer used on projects agreed upon mutually between the GoK and donor countries.

Apart from the World Bank, other donors extended fertilizer assistance in the form of aid in-kind. Effective introduction of aid fertilizer to the market made necessary delicate management of shipments to balance fertilizer demand and supply. National fertilizer requirements had to be estimated, donor intentions confirmed, carryover stocks estimated, and the balance allocated to firms for importation in advance of the crop season. Firms intending to import had to make timely requests indicating quantities and types they wished to import. Delays in any of these activities disrupted the national import plan and the multiplicity of the necessary stages made responses to crises

sluggish. The presence of donor fertilizer as aid in k introduced peculiar management problems in fertilizer market that became objects of policy studies and dialogue in the late part of the 1980s.

In 1986, the Kenya National Fertilizer Association (KNFA) was formed, consisting of fertilizer dealers to represent private business interests of firms committed to fertilizer marketing and distribution. The main purpose was facilitation of dialogue between dealers and the GoK and strengthening capacity within the private sector to better serve the farming community. Recently, the KNFA was involved in allocation of aid fertilizer among registered members, but ran into problems related to conflicting interest, resulting from participation of its secretariat in fertilizer trade.

Fertilizer prices were decontrolled with effect from January 1990. Although this was part of the GoK's long term plan, the decision was least expected as policy dialogue at the time revolved around progressive deregulation of the fertilizer market¹⁰. Following price decontrol, KGCCU unexpectedly reduced its fertilizer prices ostensibly to get rid of high stocks of fertilizer in its stores¹¹. This created uncertainty as the private sector doubted the credibility of the price control decision and continued to be concerned about the import quota allocation system.

Recently, the fertilizer market was fully liberalised following the removal of fertilizer from schedule II to schedule I of the import licensing system in November 1993. This shift obviated the need for importers to obtain prior authority from MoA, although they are still required to register with MoA for data collection purpose, but are free to import fertilizer types and quantities of their choice. They, however, still needed to obtain foreign exchange allocation from the Central Bank of Kenya (CBK). However, this last requirement disappeared with the publication of the Exchange Control circular of 14th May 1993 removing import licenses and foreign exchange allocations for fertilizer imports.

¹⁰. The 1987 National Policy for Fertilizer Pricing and Marketing recommended liberalisation of fertilizer trade in some minor fertilizer types and trace elements used in small quantities for flower and tobacco growing as well as raw material for preparing liquid fertilizers.

¹¹. Some of the KGCCU stocks were 2 years old. KGCCU price discounts following price decontrol amounted to 18% of MRPs immediately before the decontrol. These price reductions caused havoc to the sector as some of the registered marketing cooperative unions could not profitably dispose of their fertilizer supplies.

Chapter 3

CURRENT STRUCTURE OF THE FERTILIZER MARKET

Supply Sourcing

Importing firms applaud the degree to which external sourcing of fertilizer products has become simplified. Presently, importers can either import directly, fall back on the assistance from one of the many international trading houses, or have the fertilizer imports lined up by principals whom they represent in the local market. Some of the large users can also invite international tenders for supply of their fertilizer imports. The system of procurement and payment is considered smooth, since there are no more import quota allocations, foreign exchange allocations or import licensing. The importers simply procure proforma invoices from overseas suppliers, and request for and fill Import Declaration Forms (IDF) obtainable from commercial banks. The commercial banks then explore the importer's creditworthiness, determine terms, open the letters of credit (LCs), and submit such letters for confirmation with the suppliers' banks. The importers' banks also pay directly to Central Bank of Kenya (CBK) 2% pre-shipment inspection levy while opening the LC, and in due course organise the requisite foreign exchange payment to the fertilizer suppliers.

During 1993, there were problems in getting LCs confirmed by the supplier's banks owing to Kenya's poor international credit rating, rapid devaluation of the Kenya shilling, and limited availability of the shilling most of which had been tied up in treasury bills. In the circumstance, commercial banks became selective in opening LCs, extending this facility only to a select group of clients. One importer estimates that although international credit lines have been recovering, they were, at the beginning of 1994, only about 30% of 1992 levels.

Organisations that have imported fertilizer during 1994 include KNTC, Mea Ltd, Chemagro, United Millers, Agritrade, Devji Meghji, and Amiran. Further imports by Mumias Sugar and KTDA were expected before September¹². Some private sector firms that have imported fertilizer in the past did not import this time round. In addition, cooperative unions that have previously been active in fertilizer importation, including the KGGCU with its very long history in fertilizer business, did not import any fertilizer this year. The cooperative importers appear unable to bounce back from the crush resulting from KGGCU's fertilizer pricing immediately after the price decontrol. The KGGCU itself has evidently been on dire waters financially going by recent press reports. There is evidence that the cooperative union have began rationalising their involvement in the fertilizer market, restricting such involvement to local fertilizer procurement in

an attempt to meet members fertilizer needs. This is what the district cooperative unions used to do before the fertilizer market went into disarray in the 1970s. Since these unions are not in the fertilizer business as such, they were driven to importation by unreliability regarding fertilizer availability and terms of exchange under marketing arrangement extant at the time.

There are some debutantes in the import end of the market, apparently encouraged by perceptions of increased opportunities for making profits from fertilizer trade. During the most recent fertilizer season, most of these debutants imported DAP creating excess supply of this particular product. Most importers went for DAP because there was enough of the other fertilizer products from the EEC, and word had gone round that the USAID fertilizer program had altogether ended and there was therefore not going to be any USAID funded DAP. It is estimated that DAP imports and carryover stocks amounted to 105,000 mt against a national demand of 75,000 mt. There was therefore excess DAP supply, most of the stocks being reportedly held by the new firms obviously still on the learning curve regarding optimal timing of shipments. Fortunately, the shilling was, this time round, gaining against other currencies and firms incurring stock costs are likely to have been cushioned by foreign exchange benefits depending on the timing of their payment.

Recently, there has been considerable downstream interest by the importers and larger distributors reportedly establishing godowns in the main farming areas. Overall, there is evidence of free entry and exit in the import end of the fertilizer sector, implying increased contestability in this part of the market. This resulted from recent macroeconomic and sectoral reforms, including liberalisation of the foreign exchange market, removal of import quota allocations, import licensing and fertilizer price decontrols. Existing fertilizer importers now operate with the understanding that other firms are waiting to make their debut or return to this segment of the market as soon as the prospects appear promising, and seem now to price their imports with that possibility in mind¹³.

Infrastructural Bottlenecks

Importers are dissatisfied with port operations and narrated frustration related with inefficiencies and inadequate capacity. Massive shipment of food aid needing to be quickly cleared and transported upcountry complicated matters for an already overstretched system. In one case, a ship carrying fertilizer for one of the importers had to wait for 2 weeks before getting a berth in which to dock. Half the equipment allocated by Kenya Ports Authority (KPA) for offloading was out of order and the importer was not allowed to hire private equipment although such equipment was readily available. In the

¹³ A number of importers believe that they keep their profit margins low but seek to to maximize

end, the discharge took twice as long as it should have taken. Working KPA quipment was also wasteful, and the importer in question estimated an eventual US\$ 10 loss related to port problems.

There are competitive warehousing and bagging facilities in Mombasa, and a few importers own warehousing facilities. Competitive tendering for warehousing was encouraged by the KNFA's arrangements arising from their involvement in the procurement of USAID funded CIP fertilizer under the FPMRP. Importers now successfully invite tenders for these facilities and are generally satisfied with the arrangement¹⁴.

Rail transport is also a major bottleneck, worsened by heavy use of railway line to transport food aid up country. Most importers were forced to use the more costly road trackage to move their fertilizer. In one case, an importer with up country bagging facilities was forced to organise bagging at the port to facilitate road transportation. Faced with increased demand for their services, road trackage firms react predictably, increasing their trackage rates. Road trackage rates for the 1993/94 season were 20-50% higher than railway transport. Delays at the port and difficulties in obtaining railway wagons forced at least one fertilizer importer to rationalise the timing of transportation and storage of stocks, choosing to keep some of stock in Mombasa warehouses.

The Challenge of Competitive Pricing

There was evidence of fierce price competition and strategic posturing in the recent season. Firms now work out their procurement costs including some return for funds tied in fertilizer and expect to at least recover these in their product transfers. Thereafter, prices move widely depending on the product type, volume of off take, customer type, and competition from other distributors. Prices do not therefore hold for long and vary widely within short time spans¹⁵. For example the price for DAP sold by one of the distributors dropped by 20% between March and June, and was still under pressure during the time of interview. Visits by customers during the interview for this report suggested that although distributors had indicative prices that allowed for quantity discounts, prices were very flexible and customers could obtain ridiculous bargains depending largely on how much 'window shopping' they had done.

¹⁴. One of the warehousing companies was however concerned about manipulations in the processing of tenders invited by the KNFA, accusing the association of having opened tenders and got bidders to lower prices before eventual consideration of all tenders. Similar conflict of interest was reported in allocation of USAID funded DAP, which was handled by the association.

¹⁵. The downward pressure on prices for the immediately past season was compounded by over importation of some of the fertilizer products, as well as by distress sales by one of the financiers to recover fertilizer costs inherited from one of the political banks which went bust before contracts with the government. In consequence, the financial institution was only interested in recovering fertilizer costs, and reportedly sold out most of the fertilizer at very low prices.

Retailers can now technically compete with distributors by exploiting quantity discounts and selling at prices lower than those offered for small purchases by the distributor's branch outlets. The number of retailers has increased although there is incredible entry and exist at this downstream end of the market, depending on the specific time in the crop cycle and financial ability. All kinds of retailers are now selling fertilizer, majority of them on an on-and-off basis¹⁶. So far, distributors have insisted that retailers buy cash. There is no distinction between retailers and final consumers with regard to purchase terms. Discounts are purely quantity based, and lack of credit facilities is a major impediment to full exploitation of these quantity discounts and meaningful participation in fertilizer trade. Firms confess that effective margins are significantly lower than during the price controls, partly because firms now face real supply costs, rather than made up cost sheltered by pricing mechanisms under the price control regimes, and partly due to competitive forces¹⁷.

Absence of a Market Leader

The upstream end of the market is still oligopolistic, with considerable potential for strategic interaction between firms. Most firms are rebuilding capacity to pursue cooperate goals, including optimal pricing, which got lost during the many years of GoK involvement in the sector. Private sector firms are realigning themselves, the main distributors choosing the sort of small distributors they would want to support. Some of the more established small distributors are concerned about encroachment by larger distributors on what have traditionally been their exclusive spheres of operations, and wonder whether there cannot be specific roles for the importer/distributors and pure distributors. Small ditributors are unhappy about distributors establishing outlets/warehouses/branches in areas that have been traditionally covered by these smaller distributors.

Strategic interaction is complicated by the rather limited opportunity for product differentiation, except superficial, and the uncertainties of approximating actual market demand, since the market is subject to considerable uncertainty. Observed prices will depend largely on the extent of strategic interaction among firms, itself depending on the degree of information accessible to firms on other firms' strategies. Information therefore has a premium here, since such information is crucial in strategic posturing. But there is no eminent price leader at this stage, so that such leadership is presently contestable.

¹⁶. One of the importers reported having encountered a butcher selling fertilizer by the kilogramme in a rural trading centre.

¹⁷. This leads to the uncomfortable conclusion that given the cost plus approach to establishment of MRPs under the previous price control regimes, price controls may have enhanced opportunities for exploitation

Market leadership this round is expected to be critically determined by efficiency and corporate foresight, rather than administrative leverage. The larger, more established, partly vertically integrated and internationally connected firms are presently jostling, but the leader has yet to immerge.

Increased Role for Multinationals

The fertilizer market is beginning to attract interests from the multinational commodity traders and fertilizer manufacturers. During the immediately past season, one of these manufacturer supplied fertilizers not only to its local agent, but also won tenders to supply a large end user as well part of the donor funded fertilizer. Over the January-June 1994 period, this manufacturer accounted for 44% of all fertilizer imported into the country. Existing importers and fertilizer donors are therefore increasingly falling back on these trading houses and overseas manufacturers in sourcing supplies. One of the importers had to delay the interview for this study to wind up deliberations with a delegation from an international fertilizer concern interested in having a share of the market. International firms are therefore slowly edging in and appear poised to play a major role in the future.

Aid Fertilizer

During the 1993-94 fertilizer season, the European Community and Japanese government supplied aid fertilizer under different arrangements. The EEC supplied 95,000 mt tonnes of different fertilizer products (20.10.10, 23.23.0, 20.20.0, CAN and ASN) during 1993 and 40,000 mt of CAN as balance of the commitment during 1994. These shipments were part of the 1990 EEC/ACP Stabilisation of Export Earnings (STABEX) program for compensating countries for loss of export earnings¹⁰. Japan supplied 6,000 mt of MAP during February/March 1994 and is expected to supply another 23,000 mt of the same product during the latter half of 1994.

How were these donor shipments introduced to the fertilizer market? For the Japanese shipment, international tenders were invited although only Japanese firms were qualified to tender. The fertilizer could however be sourced from any country within the OECD. On arrival, the aid fertilizer was cleared and warehoused by the Government Coast Agent which clears all government shipments. The MoA then calculated the cost price and invited quantity tenders at a single fixed price. Payment was either cash or bank guarantee payable within 120 days.

The EEC shipment was managed by a task force consisting of representatives from EEC, MoA, Treasury, and 2 independent

¹⁰ ... generated from the sale of aid funded fertilizer were to be used to improve the coffee sector, for which a project has already been prepared.

consultants. MoA released tenders for international competitive bidding for the supply of this program's fertilizer. The task force then evaluated the tenders and pushed them through the normal tendering system. Tenders were also invited for local warehousing and banking services with the winning bank being required to represent the task force on all banking matters including receipt of local bank guarantees from alloces' banks, issuance of letters of release, collection of counter part funds and putting such funds in interest bearing accounts. Distributors were invited to make quantity and price bids, subject to a maximum of 5,000 mt and a minimum of 2,000 mt. Firms making highest price bids were allocated first, followed by the second highest until all the fertilizer was not allocated. Distributors were required to pay kshs 100 per mt to the administering bank as performance bond upon tender, to be used as part of the payment if the bid was successful, and refunded if no fertilizer was not allocated. The payment was through bank guarantee effective 120 days from the date of letter of release interest free. Successful distributors not picking up their allocations within 21 days from date of notification of release forfeited bonds and the fertilizer not picked up immediately re-advertised¹⁹.

There was intense consultation among some of the donors regarding the timing and pricing of the EEC fertilizer, and pricing and timing decisions benefited from USAID's experience in the fertilizer sector.

Farmers' Reactions

There was over supply of different fertilizer types during the 1993/94 season, and farmers needing and able to buy fertilizer appear to have obtained all their requirements. Carry over stocks at the end of June, 1994 were estimated at 131,306 mt. Farmers are however worried about future economics of fertilizer application, considering possibilities of increased fertilizer prices once the fertilizer market has fully stabilised. Farmers fear that the gap between producer and fertilizer prices will continue to grow and work against long term value-cost ratios and therefore against fertilizer use. There is also concern about lack of credit line to farmers, except those who are members of cooperative societies through which input credit is channelled. Farmers who are regular customers are able to negotiate credit with distributors, but

¹⁹ 20% of the original allocations had to be re-advertised following failure of the alloces to collect their allocations. Distributors were very happy with the way the ERC fertilizer was managed and considered relatively more transparent. Some, however, had problems selling EEC CAN because of presence of cheaper shipment of same fertilizer product imported commercially. There were also reports of threatened legal action against the task force by alloces whose allocations were cancelled because they had raised bank guarantees with banks considered shaky at the time and therefore unacceptable to the program's administering bank. It was also learned that some kshs.500,000 was lost by non performance of...

this is limited and out of the reach of majority of farmers .

²⁰ . While in Kitale, we witnessed a credit transaction between a seed farmer and one of the local stockists. This credit was interest free and the two parties intimated that this kind of transaction was not necessary which is difficult to replicate.

Chapter 4

USAID'S FERTILIZER PROJECTS AND PROGRAMS SINCE 1980

1980 & 1981: AID provided BoP support through a \$ 20 million Economic Support Fund (ESF) that financed 31,924 mt of DAP, 10,216 mt of MAP, and 20,910 mt of TSP, totaling 63,000 mt of the three fertilizer products²¹. 42,000 mt of these arrived between January 22nd and March 29th 1981, and the rest between October 29th 1981 and January 11th 1982. Importation and distribution of fertilizers under this program was handled exclusively by the Kenya Farmers Association, which prepared tenders and conducted inspection, supervised offloading, arranged warehousing and distributed through its extensive warehousing in line with crop requirements and established cropping patterns. All obligated resources under this program were used. Kshs. 164 million generated under the program were applied to support selected development projects stipulated in the 1982/83 and 1983/84 government budgets. Under this program, GoK was required to put proceeds from sale of fertilizer into special accounts and use such proceeds to support Kenya's economic development projects agreed upon between USAID and GoK²².

1982: USAID extended to GoK under the Agricultural Sector Grant (615-0228), \$ 4.4 million Development Assistance (DA) Grant for BoP and Budgetary support to finance importation of 9,200 mt of DAP and 5,000 mt of MAP, imported during 1983/84²³. This grant resulted in generation of Kshs. 64.9 million deposited in special accounts with the Paymaster General by December 1984, and utilised in priority projects agreed upon between USAID and GoK. Upto kshs. 13.8 million, equivalent of \$ 1 million, was used, by mutual agreement, to compensate GoK for costs incurred in preparing the fertilizer for sale (offloading, handling and bagging), and the rest on Self Help Water Supplies during 1983/84 budget year. The fertilizer was sold to the KFA and the private

²¹. This was spelt out in USAID's Project 615-0200 of Kenya, and Agreement 615-K-601 and Amendment 1 & 2. See also Project Assistance Approval Document (PAAD) Number 615-0230.

²². Some of the potential beneficiaries of counterpart funds under this program were the Agricultural Credit Scheme, Rural Roads, Agricultural Extension, Soil Conservation, the Rural Development Fund Agricultural Research, the Kabaraka Hatchery, Rural Water Supplies and Food and Farm development. Most of these were part of the 1981-1984 development budgets.

²³. Procurement plus competitive shipping of fertilizer under this program amounted to \$ 2.9 million only, and the balance amounting to \$ 1.5 million used to support US flag ships. There is no evidence of conditionalities attached to this program, but it would seem that counterpart funds generated under the program

sector²⁴.

1984: USAID extended to GoK, under the Agricultural Development Program, (615-230) US\$ 13 million on concessional terms to import 50,000 mt of DAP to be delivered during October 1984 - October 1986. The program, commodity import in nature, was associated with major policy reforms initiated as part of US structural adjustment program in Kenya to support improvement in agricultural inputs supply. Local funds generated under this program were to be utilized on mutually agreed upon priority projects spelt out in the 1984/85 and 1985/86 development budgets.

Prior to first disbursement under this program, GoK was required to furnish to AID:

a. Evidence of having established a Fertilizer Committee(FC) to implement the private sector fertilizer distribution policy

b. Evidence of publication of fertilizer stock levels and donor fertilizer financing intentions known as of date of signing of project agreement. Publication of stock levels was to be made by the Ministry of Agriculture and Livestock Development (MOALD) and donor intentions by Ministry of Finance (MOF)

c. Evidence of having published an up to date compilation of commercial fertilizer import applications received as of date of project agreement. Such compilation was to be made by the FC

d. A fertilizer import plan specifying types, quantities and timing of fertilizer imports as well as anticipated donor financing. This plan was to be published by the FC.

In addition to these conditions precedent to disbursement, the GoK covenanted to

- . Announce, annually, wholesale and retail fertilizer prices by November 1st each year beginning 1984. Such announcement was to be made by the FC
- . Publish fertilizer stock levels and known donor fertilizer financing intentions by June 1st of each year beginning 1985. The publication of stock levels was to be made by the MOALD and donor intentions by the MOF
- . Distribute a list of commercial import applications compiled by the FC by July 15th each year beginning 1985
- . Get the FC to develop a fertilizer import plan specifying types, quantities and timing of fertilizer

²⁴. Due to use of US flag carriers the cost of fertilizer was significantly higher than that of fertilizer shipped differently, and special amendment of the grant agreement had to be made to facilitate sale of this fertilizer to the KFA and private sector at comparable prices.

imports as well as anticipated donor financing by July 30th of annually, beginning 1985

- . Complete the review and revision of the fertilizer pricing structure to provide adequate compensation for and promote wide distribution. The objectives of such review and revision were to
 - i. Establish wholesale and retail fertilizer prices on a timely basis to make it possible for farmers, distributors and importers to plan ahead,
 - ii. Implement a standardised price structure for fertilizer of the same type arriving at different times,
 - iii. Establish price levels, wholesale and retail for different clients, such as authorised importers, large distributors, small distributors, village stockists, large users and small users,
- . Establish a pricing policy authorizing application of a surcharge for fertilizer sold in properly marked packages of 25 kg or less
- . Ensure that all fertilizer purchases from GoK by private distributors were paid for in cash or through bank guarantee not exceeding 180 days, such payments being made to the special account specified below
- . Establish a special interest bearing account with Cereals and Sugar Finance Corporation (CSFC) for depositing Kenya shillings generated from sale of fertilizer made available to GoK under this program. Counterpart funds so generated were to be used on mutually agreed upon development activities in the areas of agriculture, health, nutrition and family planning, education, social services, water development, environment and natural resources, energy and regional development. Annual interest earnings on deposits made in the special account were to be 12.5 percent
- . Quarterly, through the CSFC, provide USAID a report detailing the status of the special account, including account balance at the beginning of the quarter, amount and proof of individual payments made during the quarter, amount and purpose of disbursements from the account during the quarter, and the balance at the end of the quarter. Procedures to be followed by GoK in implementing and reporting on the special account were to be further amplified by AID in its implementation letter
- . Provide access to 120% of the amount of foreign exchange estimated as necessary to implement the fertilizer import plan

Evaluation of this program indicated that all conditions precedent to disbursement were satisfied by December, 1984²⁵. Subsequently, 20,828 mt of DAP imported under this program arrived in Kenya during April, 1985 and another 28,500 mt during October of the same year.

1986: Structural Adjustment Program 615-240:

Under this program (grant number 615-K-607) Kenya was provided with BoP support and technical assistance while GoK implemented policy changes necessary for acceleration of structural adjustment in the Kenyan economy. BoP assistance was to be provided entirely through the private agricultural industrial and commercial sectors, and counterpart funds were to be used for mutually agreed development purposes in the public sector, and for the establishment of a trust fund to support private sector development activities and cover operating expenses for the AID mission in Kenya. The three year \$74 million program consisted of a \$40 million Fertilizer Market Development Program, a \$28 million CIP (cip), and a \$6 million Technical Assistance Program. The grant was to be made from ESF resources, and was to be authorized in three tranches, namely \$ 25 million in the 1986 financial year, \$22 million in 1987, and \$ 27 million in 1988. The fertilizer component of the first tranche in 1986 was \$14.355 million, although the PAAD in which this component was spelt out also contained justification for an additional \$5.645 million for fertilizer as (first priority), and a \$3 million private sector commodity import program (third priority)

Disbursement under this program was conditional on GoK fulfilling the requirement that:

a. Prior to the first disbursement, evidence was to be produced as prove that a separate, numbered Special Account had been established in the Paymaster General into which proceeds of Kenya shillings from the sale of fertilizers procured under the agreement would be deposited

b. Prior to disbursement of funds for the second and subsequent procurements, GoK was required to submit

i. A full report on and accounting for all local currency proceeds generated under the 1984 SAP program agreement, the 1984 Agricultural Development program and the 1985

²⁵ IFDC (1985) Evaluation and Recommendations for Improving Fertilizer Marketing in Kenya USAID Agricultural Development Program Project No. 615-230. The program was a watershed in getting the private sector back to the fertilizer business. Ten months into the program period, 16 private sector firms had participated in distributing the first shipment of 20,800 mt of DAP which was almost thrice the number of such firms (6) that had participated in distributing AID fertilizer in 1982.

SAP agreement ammendment

- ii. A detailed proposal for use of Kenya shillings generated or to be generated under the agreements referred to in (i) above. In preparing such proposal, the GoK was to take into consideration and respond to a proposed local currency programming plan provided by AID.

In addition to these conditionalities precedent to various stages of disbursements, GoK covenanted to

- . Take necessary steps to ensure that Kenya shillings generated under this program were promptly deposited in the Special Account, that bank guarantees were strictly enforced and limited to 180 days, and that fertilizers would be sold to legitimate distributors only;
 - . Allow all major fertilizer importers importing more than 2000 mt annually to receive import allocations up to their proven requirements;
 - . Provide approved distributors with assured access to at least as much fertilizer as they imported the previous year;
 - . Award import allocations in a timely fashion, twice a year up to end of February for short rains, and upto the end of August for next year's long rains;
 - . Announce fertiliser prices in a timely fashion, twice a year, January for long rains and August for short rains.
 - . Establish retail ceiling prices to include a gross margin sufficient to encourage retail marketing organizations to provide extension services and distribute fertilizers in the rural areas;
 - . Establish a Fertilizer Unit within the MOALD to monitor the Kenya and world fertilizer situations and develop a fertilizer information system covering national fertilizer needs, prices, stocks, imports, sales, importers performance, and research information on fertilizer response trials and cost benefit studies. Information obtained by this unit was to be used for decision making and for developing the import plan;
 - . Implement a fertilizer pricing system which establishes wholesale and retail prices based on Benchmark International C&F prices (BIP);
 - . Increase total fertilizer supply consisting of commercial imports, donor aid, and carryover stocks;
- bond to expand exports and foreign exchange earnings.

These plans to be announced at the same time as the GoK's new budget year and implemented by July 1987, except as the parties may mutually agree;

- . Schedule annual US-Kenya bilateral meetings to review policy aspects of GoK's development strategy;
- . Schedule monthly bilateral meetings to review policy implementation aspects of the GoK's development strategy;
- . Establish separate special accounts in the Paymaster General and deposit therein local currency in amounts equal to proceeds accruing to GoK as a result of the sale of fertilizer. Funds in such special accounts would be used for such economic development purposes as are mutually agreed upon by AID and GoK, provided that the first kshs 21 million would be entrusted to AID for deposit to the trust account to meet the requirements of United States,
- . To promptly, fully and regularly report on and account for all Kenya shillings generated from sale of fertilizer procured under this agreement in accordance with procedures to be mutually agreed upon by AID and GoK. In the event that GoK fails, within 21 days of date of specific request from AID to report on and account satisfactorily for funds required to be deposited in the Special Account established under this agreement, AID was to, at its discretion, suspend all disbursements or terminate this agreement through written notice to GoK.

Other conditionalities and covenants were added during subsequent agreement amendments. As an example, a second amendment dated May 13th 1987 to provide GoK with the second tranche of the structural adjustment assistance program and which sought to help GoK make further progress in fertilizer marketing and policy reforms, rationalise its budget with regard to use of counterpart funds and promote AID - GoK policy dialogue required GoK to, before first disbursement of funds under this amendment

- a. Detail the use of local currency proceeds already generated under previous SAP agreements for 1984 and 1985;
- b. Analyse projected CIF Mombasa prices for major fertilizer types to be imported for the 1987 short rains. This analysis was to contain recommendations for retail ceiling price adjustments. If new prices were necessary, the new prices were to be announced and become effective in August 1987.

Before any additional disbursement could be made, GoK further agreed to

- c. Submit a full report on and accounting of all local currency proceeds generated under the FY 1986 Structural Adjustment

Assistance Program agreement and;

- d. Submit an agreement detailing use of local currency proceeds generated under the Structural Adjustment Assistance Agreement for FY 1986.

In addition to these conditionalities accompanying the amended agreement, GoK also covenanted to

- . Adopt and implement the new fertilizer pricing formula, based on the BIP, by March 31st, 1988;
- . Establish wholesale and retail margins by March 31st, 1988 with increased margins for retailers;
- . Develop a plan for financing reproduction and distribution of an educational leaflet on fertilizer use. The financing of such leaflet was to be included in the MoA's budget;
- . Schedule meetings to review the allocation and use of counterpart funds and other implementation issues;
- . GoK and AID were to jointly agree to the use of local currency proceeds generated under this amendment for AID supported and other priority development activities in accordance with the following order of preference:
 - i. Financing counterpart contributions of the GoK in the development votes on the budget for AID financed projects,
 - ii. Financing counterpart contributions of GoK in development votes of the budget for development projects or activities closely related or complementary to AID financed projects,
 - iii. Financing development projects or activities of district focused informal sector development.

This grant amendment added a total of US\$ 14.495 million, US\$ 11.295 million to the existing fertilizer commodity import program, and US\$ 3.2 million for consultancy services and policy related studies, assessments and seminars.

1989: The Fertilizer Pricing and Marketing Reform Programme
615-0243:

The broad objective of this program was to increase fertilizer use by smallholder in rural Kenya. This was to be accomplished by strengthening and promoting a fertilizer market at prices reflecting costs including adequate profits to importers and distributors. Under this program foreign exchange was to be

available for fertilizer imports and counterpart funds generated used for mutually agreed upon development purposes and for trust fund to cover the operating expenses of USAID/kenya. This was a three year, US\$ 45 million program supporting pricing, import allocations and promotion of policy reforms for fertilizer market development. The grant was to be made in three tranches of US\$ 15 million for each of the 1989, 1990 and 1991 financial years. Each tranche consisted of US\$10 million in ESF and US\$ 5 million from the Development Fund for Africa. Each years funding was authorised through the ammendment of the Project Assistance Approval Document.

Prior to the first disbursement under this agreement, GoK was required to furnish to AID

- a. An opinion of acceptable counsel that the agreement had been dully authorised and that it constituted a legally binding obligation of the GoK in accordance with all its terms;
- b. A statement representing and warranting that the named person or persons have authority to act as the representative(s) of the GoK together with a specimen signature of each person certified as to its authenticity;
- c. Evidence that GoK had established a separate numbered Special Account for deposit of Kenya shillings equal to all proceeds accruing to GoK as a result of sale or importation of fertilizers under this agreement. Funds in the Special Account were to be deposited in accordance with the covenant for deposit of local currency and utilized in accordance the appropriate covenant.

Prior to disbursement of the third fertilizer tranche under this agreement, GoK was required to have,

- a. By no later than August 31st, 1989 undertaken the allocation of the first tranche of fertilizer funded under this program to recipients in accordance with selection criteria agreed upon with AID.
- b. By no later than September 1989, developed the methodology and statistical requirements for determining official fertilizer prices utilizing technical assistance based upon terms of reference jointly developed by GoK and USAID;
- c. By no later than September 30, 1989, published official fertilizer prices as that date, which prices were to be based on the Benchmark International Price (BIP) formula.
- d. By no later than September 30, 1989, made available to AID the list of recipients of the fertilizer allocation approved by the GoK as of that date.
- e. By no later than October 31st, 1989 undertaken the allocation of the second tranche of AID funded fertilizer to recipients in accordance with specified election criteria;

- f. By no later than October 31st, 1989, made available to AID the list of recipients of fertilizer allocation approved by the GoK as of that date;
- g. By no later than December 31st, 1989, reviewed official fertilizer prices previously established, made necessary revisions therein and published any changes in the official prices, such prices having been based upon the BIP formula;
- h. Not later than June 1st, 1990, published official fertilizer prices as of that date, which prices were to be based upon the BIP formula;
- i. Continued to apply the methodology and statistical requirements developed pursuant to an earlier conditionality, utilizing technical assistance based upon terms of reference determined jointly by GoK and USAID;
- j. Instituted and was to utilize the AID CIP mechanism for importing and allocating AID funded fertilizer.

Prior to disbursement of the fourth tranche under this agreement, GoK was required to have undertaken the following:

- a. Continued the AID CIP mechanism for importing and allocating the fourth tranche of AID funded fertilizer provided that the said CIP mechanism has not, in AID's judgement, caused significant delays in making fertilizers available to farmers,
- b. By no later than September 30th, 1990, reviewed the official fertilizer prices previously published, made necessary revisions therein and published any changes in the official prices, such prices having been based on the BIP formula.

Prior to the disbursement of the fifth tranche under this agreements, the GoK was required to have undertaken the following:

- a. Continued the AID CIP mechanism for importing and allocating the fourth tranche of AID funded fertilizer provided such CIP mechanism has not caused delay in making fertilizer available to the farmers,
- b. By not later than June 1st, 1991, reviewed the official fertilizer prices previously established, made the necessary revisions and published any changes in the official prices, and the said prices to be based on the BIP formula
- c. Continued to apply methodology and statistical requirements developed pursuant to an earlier condition of this agreement for determining official fertilizer prices, utilizing technical assistance based on terms of reference developed jointly by GoK and AID

Prior to disbursement of the sixth tranche under this

agreement, the GoK was required to have undertaken the following:

- a. Continued the AID CIP mechanism for importing and allocating the sixth tranche financed fertilizer, provided that such mechanism had not, in the AID's judgement, caused significant delays in making fertilizer available to farmers,
- b. By no later than September 30th, 1991, reviewed the official fertilizer prices previously established, made necessary revisions therein and published any changes in official prices, which prices would have been based on the BIP formula.

In addition to these conditionalities, the GoK covenanted to

deposit in a Special Account, all Kenya shillings accruing as a result of sale or importation of fertilizer. For all private and public sector importers who do not resale the imported fertilizer, the amount of Kenya shillings to be deposited were to be the Kenya shilling equivalent of the AID dollar disbursements under this grant calculated at the highest dollar rate available to everyone in Kenya at the time that AID effected payments to the corresponding bank in the USA of the participant's commercial bank in Kenya. For public importers who resold the fertilizer, the amount of Kenya shillings deposited was to be the proceeds from such resale. Deposits to the Special Account were to become due and payable 120 days of advice from AID as to the disbursement made under the agreement

To entrust Kenya shillings equivalent at the time of deposit to US dollars 2.2 million to AID for deposit into a trust account to meet the requirements of AID according to a scheme to be agreed upon between GoK and AID. These funds were to be used for the administrative costs related to the operations of USAID/Kenya. Funds transferred under the agreement were to be held in trust for GoK and interest earnings, if any on funds so held were to be added to the trust account. Title to any assets purchased from the trust account were to be vested in GoK, and any such assets on hand as of date of termination of this agreement were to be returned to the GoK. Any balance remaining in the trust account upon termination of agreement or US assistance program in Kenya, whichever was earlier, was to be returned to GoK.

Counterpart funds generated under this program were to be utilised in mutually agreed upon purpose as follows: financing local host contributions, except salaries and personnel costs, USAID assisted projects in the agricultural sector, support of line items within the GoK's Agricultural Development budget in which AID has some interest, and support of line items within the GoK's development budget other than agriculture in which

AID has particular interest and which are supportive of AID's country development strategy statement

- . Provide AID with detailed accounting of use of local currency, the timing and format for such reports being specified by AID as part of this agreement.
- . Any unencumbered balances of funds which remained in the special account upon termination of this assistance were to be disbursed for such purposes as may be agreed between AID and GoK.
- . By no later than February 28, 1990, to undertake and complete a study in collaboration with AID to assess the potential for decontrol of fertilizer prices, providing AID with a copy of the said study. Terms of reference for such study were to be jointly developed by AID and GoK.
- . By no later than August 31st 1990, to incorporate the results of the said study on the decontrol of fertilizer prices into a fertilizer pricing policy, subject to assessment of administrative and economic feasibility
- . Prepare annual import plans to maximize adequate and timely fertilizer imports by the private sector
- . Expedite the issuance of fertilizer import licenses and to make available adequate foreign exchange for fertilizer imports to achieve a minimum of 5% growth per year of total fertilizer imports.
- . By no later than June 30th 1990, to introduce import performance bonding to minimize duplication of import licensing.
- . By no later than February 28th.1990, to publish and distribute and or encourage private fertilizer distributors to publish and distribute educational materials to farmers to promote appropriate fertilizer use.
- . To continue to pack fertilizer in 10 and 25 kg bags as the consumer demand warrants
- . To continue to maintain adequate pricing incentives for agricultural output prices consistent with promotion of fertilizer use at cost price
- . Develop by March 31st. 1990 a plan of action to strengthen the fertilizer inputs Unit in the MoA, particularly in the area of price analysis and monitoring of fertilizer market developments
- . In consultation with USAID/Kenya. develop a protocol (Scope of Work) for a study to investigate changes in

soil pH and consequent effects on agricultural productivity to be completed not later than December 31st, 1989

- . Undertake baseline studies relating to acid soils, fertilizer usage and effects of DAP fertilizer on soil pH, to be completed not later than June 30th, 1990
- . To begin, not later than the midpoint of the program, the study called for by the Scope of Work, including recommendations for mitigating environmental concerns, if any
- . Reaffirm its commitment to eventual elimination of price controls and quantitative restrictions on fertilizer imports, and in furtherance of that objective covenanted to
 - i. take appropriate steps to achieve the eventual elimination of the price controls and quantitative restrictions on imports
 - ii. on a periodic basis to consult with AID as to plans, projections and progress in furtherance of liberalization of fertilizer importation

These USAID's fertilizer projects and programs since 1980 were concerned about increasing farmers' access and use of fertilizer by improving public management of the fertilizer sector, improving pricing systems and getting a proper fertilizer market going by promoting the role of the private interests in the sector. In pursuit of this, its conditionalities were focussed on building of capacity for development and management of the fertilizer import plan through establishment of the fertilizer committee and inputs unit, tidying up the procedure and timeliness of establishing and publishing the maximum retail prices by basing these on the benchmark international C&F price and making periodic and timely reviews and revision of the pricing structure to build in wholesale and retail margins to promote wider wider distribution; and more meaningful and increased private sector participation in fertilizer importation and distribution.

The 1986 Fertilizer Marketing Development Program was a watershed in the development of these broad objectives, as it was in the course of this three year program that the private firms began playing an increasingly major role in the sector, the BIP pricing system was implemented and different MRP prices announced for each of the two rain seasons, and the development of promotional material realised. During the 1989 Fertilizer Pricing and Marketing Reform Program (FPMRP), further conditionalities were proposed for concretising private sector participation including development and application of a specific criteria for

allocation of USAID DAP, utilisation of USAID mechanism for importing and allocating USAID DAP, and reliance on the Kenya National Fertilizer Association to allocate the same. Further proposals were made regarding review, revision and timing of publication of MRPs; strengthening the fertilizer inputs unit, and taking steps towards eliminations of price controls and quantitative restrictions of fertilizer imports. USAID's projects and programs made for clear progression towards eventual liberalisation of the fertilizer market. There was however the occasional overshoot in some of the conditionalities and covenants, such as requiring GoK to ensure 5% annual growth in fertilizer imports without regard to growth in domestic demand, and requiring GoK to continue to pack fertilizer in small bag rather than requiring it to create incentives for the private sector to continue to pack fertilizer in bag sizes convenient to the smallholders. The programs nevertheless pursued the common goal of promoting increased fertilizer application through increased private sector participation.

Chapter 5

OTHER FERTILIZER DONOR PROGRAMS
AND ACTIVITIES OF MULTINATIONALS

Other Donor Programs

During the 1980s, donor shipments averaged 36% of all fertilizer imports, increasing from 12% in 1983/84 to a record 63% in 1987/88 fertilizer season. Over the years some 12 donors have supplied fertilizer to Kenya under different programs and terms. Included in these are Norway, Denmark, Sweden, West Germany, Italy, Japan Netherlands, Finland, United States of America, United Nations Food and Agricultural Organisation, World Bank and the European Economic Community. Donor assistance has however not been consistent in terms of quantity and continuous supply.

Sweden :

First supplied aid fertilizer to Kenya during the 1982/83 season, its fertilizer assistance becoming more regular during the second half of the 1980s. Upto 1987, Sweden used any funds not fully spent or committed for future payments on Kenyan projects for import support. Such funds would be available for importation of any goods needed by Kenya. There was no particular emphasis on fertilizer imports, and imports procured using such funds were decided through negotiation between MoF and the Swedish Embassy. The use of counterpart funds generated under SIDA projects was determined entirely by GoK²⁶. Due to improvements in project implementation, there has not been any surplus or uncommitted funds available for importation of goods since 1987, and therefore no shipments of Swedish aid fertilizer. The Swedish embassy has not had a clear policy on its fertilizer assistance and been not been interested in recent developments in the fertilizer market in Kenya.

Netherlands

Over the 1980's, the government of Netherlands consistently supplied aid fertilizer to Kenya, having continuously supplied the country with fertilizer through balance of payments support since 1979/80. Its fertilizer program included technical assistance in carrying out necessary studies for understanding the structure of the fertilizer sector and making proposals for improvement²⁷. Netherlands however stopped its fertilizer assistance to Kenya in 1989 after unsuccessfully trying to get

²⁶ Such funds were also not audited by SIDA.

²⁷ Most of the studies fell under the fertilizer infrastructure improvement program implemented through contracting to a consulting firm.

GoK to develop a meaningful fertilizer policy. The embassy of Netherlands was dissatisfied with GoK's failure to meet the deadline for liberalisation of the fertilizer market, and was not convinced about GoK's commitment to proposals contained in the fertilizer policy paper tabled during June 1989. The embassy saw the policy document as a half hearted effort to address what it considered important issues in the fertilizer sector. At the same time, interest in the Hague also shifted to specific projects involving women and smallholder farmers, and the Netherlands has no plan of getting back to aid fertilizer except through co-financing of agricultural sector adjustment operations organised by the World Bank and co-financed by other bilateral donors.

Japan

The Japanese government has also supported Kenya through aid fertilizer, having supplied fertilizer to Kenya every year since 1979/80 except during 1986/87. During 1993/94, Japan supplied one quarter of all aid fertilizer shipped into Kenya, the rest being supplied by the European Union. A further 23,000 mt of Japanese fertilizer still expected during the course of this year. The agreement between the Japanese embassy and GoK is that at least two thirds of counterpart funds generated from sale of Japanese fertilizer be deposited in special accounts to be used specifically on agro-cultural projects. The origin of Japanese aid fertilizer is not restricted as long it is within the OECD countries, but tendering is restricted to Japanese firms. The embassy has otherwise had no specific policy on the type of farmers to benefit from its fertilizer, and has therefore left pricing and distribution issues entirely with the GoK. Since 1991 however, the embassy requires that the private sector be fully involved in the marketing and distribution of its fertilizer aid. It fully supports World Bank's conditionalities spelt out under ASAO II, which the Japanese government is co-financing.

Germany

West Germany directly supplied Kenya with a total of 27,000 mt aid fertilizer during 1986/87 and 1987/88 seasons only²³, but reverted to either agricultural grants or import assistance loans under which Kenya can import a wide range of goods including agricultural inputs, excluding military hardware, polluting agents, luxury goods and chemical useable as feedstock in drug production. Agricultural grants make available foreign exchange for importing essential inputs for the agricultural sector, including fertilizer. This donor has not been interested in supplying fertilizer as commodity aid, but continues to give general balance of payments support, giving GoK the opportunity to decide its foreign agricultural import priorities. A recent attempt by the Germany embassy to assist Kenya with fertilizer

²³ West Germany was supplying aid fertilizer in the 1970s, but stopped in 1978/79, resuming in the second half of the 1980s.

ran up against corruption and the program eventually floundered. The embassy has never had any policy regarding either marketing or beneficiaries of fertilizer funded under its programs, and has no contact of any nature with local institutions handling fertilizer.

Italy

The government of Italy supplied a total of 23,000 mt of aid fertilizer to Kenya during 1984/85 and 1985/86 but has never supplied any more. There are however some indications that it might supply some more. Italian aid fertilizer to Kenya has been ad hoc without any evidence of concern for policy.

Norway

The Norwegian government supplied aid fertilizer to Kenya regularly during most of the 1980s, except 1982/83 and 1984/85. It however stopped its Kenyan programs in 1990 following disagreement with GoK over procedural matters. When its programs were active, Norway did not have specific policies related to beneficiaries of fertilizer funded through its programs, or preferred methods of distribution and marketing.

Finland

Finnish funded fertilizer was first supplied in 1984/85 and during this and subsequent season amounted to 25,000 mt. Finland's last fertilizer assistance was some 12,000 mt supplied in 1988/89. Studies carried out in the late 1980s indicated that Finland was agreeable to having their aid fertilizer distributed in a way that helped develop the fertilizer market in Kenya²⁹.

The World Bank

The World Bank became involved in the donor segment of the fertilizer market in 1986 under the first Agricultural Sector Adjustment Operation (ASAO I) program whose broad objectives included promotion of intensification of agricultural production, improvement of produce incentives, and expansion of flow of public and private resources for agricultural investment³⁰. Under ASAO I, US\$ 18 million or 30 % of funds available under this program, was allocated to fertilizer imports through BoP support. ASAO I was co-financed by the European Community, the Saudi Fund, the governments of Japan, the Netherlands, Federal Republic of Germany, and Denmark.

²⁹. Agriconsult (1988) USAID/Kenya Fertilizer Marketing Development Program Impact Study; Final Report.

³⁰. These objectives were to be achieved by increasing supply of agricultural input supply and boosting use of inputs such as fertilizer and improved seeds among smallholders, maintaining adequate and flexible producer prices, restructuring and rationalising public investments in the sector, improving access to credit, and reforming parastatals.

Under ASAO II, the World Bank extended a IDA credit of US\$ 75 million, 89% of which was for agricultural imports and the balance for sectoral management support. Imports eligible for importation under this program include fertilizers for which US \$ 25 million was dedicated, agricultural chemicals and seeds (US\$ 10 million); agricultural machinery, equipment and spare parts (US \$ 20 million); veterinary supplies US\$ 2 million); and petroleum products (US\$ 10 million). The list of chemicals eligible for financing under this program was agreed upon during negotiations, and only pesticides considered by IDA as suitable under Kenyan conditions were to be financed through credit available under ASAO II. Co-financing of this operation was expected from the African Development Bank, Federal Republic of Germany, United Kingdom, the Netherlands, and Japan³¹. The operations allocated to imports was to be released in two equal tranches of US\$ 33.5 million each, the first one upon credit effectiveness expected around March 1991 and the second one about 12 months after³².

The World Bank's programs were supportive of efforts made by the GoK and part of the rest of the donor community towards private sector development, demonstrated by building private sector considerations into its conditionalities.

The European Union

The Commission for European Countries (CEC) imported some 135,000 mt of different fertilizer products during 1992/93 and 1993/94, 60% during the later period. This was considered providential as most of the other donors other than Japan did not supply any fertilizer. The European Union's program was however a one time undertaking, as the union is expected to sustain its general import support program by making foreign exchange available to GoK for general import. Counterpart funds generated under its fertilizer program will be used to develop agricultural infrastructure.

³¹ Procurement procedures under ASAO II were designed to promote rapid resource use while ensuring efficiency and accountability. Imports by GoK and private sector were to follow international competitive bidding for amounts in excess of US \$ 2 million. For amounts below US\$ 2 million, GoK was required to follow public procurement procedures reviewed by and acceptable to IDA. This required soliciting for 3 price quotations. For the private sector, purchases were to follow established commercial practices namely, invitation of quotations from eligible suppliers from at least 2 countries, direct contracting being allowed only for proprietary equipment or where there is need for compatibility with existing equipment.

³² Overall project disbursements were estimated at US\$ 34 million during 1991, US\$ 36 million in 1992, US\$ 2.5 million in 1993, and US \$ 2.5 million in 1994, with a closing date of December 31st, 1995. However, the program was discontinued after only 50% of the resources made available under the program were utilized. This was due to failure of GoK to satisfy the agreed conditionalities.

TABLE 1: FERTILIZER SHIPMENTS FROM DIFFERENT DONOR PROGRAMS, 1979/80 TO 1993/94, MT

DONOR COUNTRY	79/80	80/81	81/82	82/83	83/84	84/85	85/86	86/87	87/88	88/89	89/90	90/91	91/92	92/93	93/94
NORWAY	9,400 00	4,700 00	5,890 00	0 00	8,430 00	0 00	27,000 00	15,000 00	17,110 00	11,000 00	9,000 00	0 00	0 00	0 00	0 00
DENMARK	0 00	0 00	0 00	0 00	0 00	12,500 00	17,500 00	0 00	0 00	0 00	0 00	0 00	0 00	0 00	0 00
SWEDEN	0 00	0 00	0 00	7,000 00	0 00	0 00	10,500 00	10,000 00	15,000 00	0 00	0 00	0 00	0 00	0 00	0 00
FINLAND	0 00	0 00	0 00	0 00	0 00	7,000 00	18,000 00	0 00	0 00	12,045 00	0 00	0 00	0 00	0 00	0 00
NETHERLAND	40,000 00	13,000 00	18,000 00	40,000 00	0 00	24,400 00	20,000 00	30,000 00	30,000 00	10,000 00	24,850 00	0 00	0 00	0 00	0 00
JAPAN	8,152 00	7,500 00	8,800 00	3,000 00	2,500 00	4,100 00	8,370 00	0 00	8,705 00	8,640 00	6,919 00	23,262 00	5,000 00	17,143 00	27,000 00
ITALY	0 00	0 00	0 00	0 00	0 00	3,000 00	20,000 00	0 00	0 00	0 00	0 00	0 00	0 00	0 00	0 00
W/GERMANY	0 00	0 00	0 00	0 00	0 00	0 00	0 00	7,000 00	20,000 00	45,000 00	12,000 00	40,000 00	25,000 00	0 00	0 00
EEC	0 00	0 00	0 00	0 00	0 00	0 00	0 00	0 00	0 00	0 00	0 00	0 00	0 00	55,000 00	80,000 00
FAO/OTHERS	0 00	0 00	0 00	4,500 00	0 00	1,000 00	0 00	0 00	0 00	33,032 00	0 00	0 00	0 00	0 00	0 00
USA	0 00	43,107 00	20,000 00	0 00	14,210 00	21,000 00	28,719 00	20,000 00	51,500 00	53,007 00	50,750 00	43,850 00	44,100 00	0 00	0 00
TOTAL	57,552 00	68,307 00	53,498 00	54,500 00	25,148 00	73,000 00	145,589 00	82,000 00	142,315 00	172,724 00	111,519 00	106,912 00	74,100 00	72,143 00	107,000 00

Source: Ministry of Agriculture, Livestock Development and Marketing, Nairobi.

Table 2: JAPANESE FERTILIZER ASSISTANCE TO KENYA, 1979-93
Grant in Aid for Food Production

Date	Commodity	Value in Million Yen
23 Nov. 1979	Fertilizer	300
21 Nov. 1980	Fertilizer	400
5 March 1982	Fertilizer	400
24 March 1983	Fert. chemicals & machinery	600
29 March 1984	Fert. chemicals & machinery	700
13 July 1984	Fertilizer and chemicals	500
28 Sept. 1985	Fertilizer and chemicals	700
18 April 1986	Fert. chemicals & machinery	200
23 Feb. 1987	Fertilizer and chemicals	800
12 April 1988	Fertilizer and machinery	800
16 Dec. 1988	Fert. chemical & machinery	900
5 March 1990	Fertilizer	900
2 Oct. 1990	Fertilizer	800
12 July 1991	Fertilizer	900
2 July 1992	Fert. chemicals & machinery	900
17 March 1993	Fertilizer	200
19 May 1993	Fert. chemicals & machinery	1,100
TOTAL		11,100

Source: Japanese Embassy, Nairobi.

Activities by Multinational

A number of multinational are presently active in the fertilizer sector in Kenya. Norskhydro appointed Chemagro as its agent in Kenya in July 1990 and has since supplied the market through this arrangement. During the 1993/94, Norskhydro also won the tender to supply 30,000 mt of CAN funded by the European Union, and another to supply Brooke Bond with its fertilizer requirements. Every thing put together, Norskhydro supplied a substantial share of the Kenyan market during the 1993/94 season.

Transammonia is a large trading house that first supplied the Kenyan market in 1976 through MEA Limited. In the past, it has supplied Rumanian and Jordanian fertilizers but is presently operating from South Africa. Transagro, another Germany trading house, supplied KNTC with fertilizer for the first time in 1988 and also recently won a tender to supply part of the European Unions funded ASN, 20:20:0 and 20:10:10 fertilizer products.

Kemira is a Finish company that has been supplying the Kenya Tea Development Authority with NPK compounds since last year. For the 1993/94 season, the George Stafford Corporation of United States also supplied 13,000 mt of American DAP to Devji Meghji. Other multinationals such as BASF and Ciba-Geigy which had participated in the fertilizer sector in past appear to have restricted their operations to other chemicals owing to past extensive government controls in the fertilizer business.

Multinational companies are therefore beginning to come back and are likely to play a major role in the liberalised market. We expect further strategic realignment in the sector to include further establishment of relationships between established importers/distributors and overseas suppliers, including manufacturer and trading houses. Further, other multinational companies that had backed off from the sector are expected to begin reasserting themselves to exploit profitable opportunities arising from the liberalised market.

Chapter 6

GOK'S FERTILIZER POLICIES SINCE 1980

1979: Development Plan, 1979-83.

The main thrust of this plan was rural development considered crucial in poverty alleviation. The plan recognised that most of the country's high potential land was already fully utilised, so that greater productivity required land use intensification and application of improved technologies³³. More intensive land use to generate higher yields per acre meant additional use of purchased inputs, especially fertilizers³⁴. Planned fertilizer application was to increase at 9% annually (in value terms, 1976 prices) during the plan period so that by the end of 1983, planned national fertilizer use was expected to reach 245,000 mt from an estimated 96,000 in 1976³⁵. The Gok also undertook to support and develop more genuinely competitive markets by ensuring that Gok's participation and legislations encouraged the development of efficient marketing arrangements promoting competition between the private, public and cooperative sectors³⁶. It also recognised that favourable prices for agricultural products and low prices for consumer goods and agricultural inputs were necessary for reduction of rural poverty.

The plan recognised that under the Integrated Agricultural Development, fertilizer application had started to pick up, so that under this and other programmes, fertilizer utilizations would achieve a planned growth rate of 9% per annum. Other than mention of these programmes through which fertilizer consumption was bound to keep increasing, there were not specific proposals to bring about the planned fertilizer use growth targets.

1983: Development Plan, 1984-88³⁷

The objectives of this plan were similar to those of the previous one, ie to increase food production, promote growth in

33. The plan anticipated wider application of known technologies since no research breakthroughs were immediately available.

34. The plan recognised the crucial role that smallholder production was going to play since this mode of production had previously been effective in land use intensification, so further research and extension was to focus on smallholder production.

35. Republic of Kenya (1979) Development Plan 1979-83 Part I-Government Printer, Nairobi. Table 6.4 p.216. Use of all purchased agricultural inputs was expected to increase at 6.7% annually.

36. The promotion of competition between the private, cooperative and public sectors appears to have been with regard to agricultural output marketing, although the spirit would also have covered promotion of efficiency in the procurement and distribution of agricultural inputs as well.

37. Republic of Kenya (1983) Development Plan, 1984-1988. Government Printer, Nairobi.

agricultural employment, expand agricultural exports, resource conservation, and poverty alleviation, and achieve food self sufficiency in basic food stuffs. In pursuit of these objectives, utilization of purchased agricultural inputs was targeted to increase at 4.3% over the plan period. Like in the previous plan, two thirds of the planned increase in agricultural production was to result from intensification of land use. Attention was to be paid to, inter alia, improved management and administrative procedures to promote efficient resource use (this probably included use of foreign exchange in importation of purchased agricultural inputs including fertilizers). On crop inputs, the plan stipulated that programmes would be designed to ensure that adequate input supplies reached farmers on time and at reasonable prices. Efforts for coordination and demonstration of benefits from fertilizer use were to be channelled through the National Extension Project, with special attention to smallholders. Further, the MoA was to ensure that adequate amounts of appropriate quality of fertilizers were imported and distributed to farmers. The Plan did not however spell out how this was to be achieved³⁸.

1986: Sessional³⁹ Paper Number 1 of 1986³⁹

The paper noted that fertilizer use varied from one part of the country to another and from crop to crop, and that increased fertilizer use was pivotal in increasing agricultural yields. It also observed that fertilizer use was far less than recommendations, although there were high estimated return to fertilizer application. Fertilizer supplies were not always available at the right time and in sufficient quantities. Smallholders were disadvantaged because of a. long distances to retail outlets, b. packages of 50 kg too costly for smallholders with limited working capital c. retail margins too small to encourage stocking and transportation by local shopkeepers, and d. cashflow and managerial bottlenecks facing the cooperative unions and societies with more direct contact with smallholder farmers. Policy proposals tailored to addressing these constraints included the following:

- GoK was to continue licensing established importers and distributors including KGCCU, cooperatives with adequate capacity, and private firms with demonstrable competence in the field. MoA was to determine suitable fertilizer types and licensed applicants were to be judged partly on the ability to supply fertilizers
- maximum retail prices were to be set only for a limited number of trading centres, retailers outside these centres being permitted to set own prices

³⁸ The National Extension Project was a new extension management system based upon regular visit to contact farmers and periodic in-service training for frontline staff. It involved research staff in designing, supervising and analysing farmlevel trials.

³⁹ Republic of Kenya (1986) Economic Management and Renewed Growth, Government Printer, Nairobi.

- . Gazetted prices were to include substantial margins to encourage re-bagging into smaller more convenient quantities
- . extension service was to be used to actively promote fertilizer use, publicise suitable types for each location, crop and time, make spot checks on fertilizer types being stocked, and inform farmer where and from whom they could purchase correct fertilizer types
- . credit facilities and crop payments systems were to be improved to enable farmers purchase fertilizer when needed. This was translated into prompt payment from agricultural marketing agencies, encouraging donors to channel funds to commercial banks at concessional rates earmarked for onward lending to smallholders, and GoK to encourage churches non-governmental organisations and individuals to establish savings and credit schemes

1988: Development Plan, 1989-93⁴⁰.

For the first time in planning history in Kenya, a specific subsection of the chapter on agriculture was dedicated to fertilizers. The plan declared fertilizers as the most dominant input in Kenyan agriculture whose consumption was expected to reach 400,000 mt by 1992 from an average of 100,000-250,000 in previous years. The plan considered the foreign exchange and transportation costs as the main constraints to fertilizer application. The GoK was to seek to increase fertilizer consumption especially within the smallholder farming community. For this to happen, the plan envisaged a number of incentives:

- . import allocation procedures had already been restructured, putting fertilizers under schedule I of the Customs Tariff Schedule, through which automatic import licenses are granted under the MoA monitoring and surveillance.
- . marketing system was to be reentered more competitive to permit more efficient fertilizer distribution and provide better margins to retail distributors and stockists.
- . channeling of fertilizers through the private sector was to be improved through greater use of cooperatives and indigenous entrepreneurs
- . system of distributing small packets, which had already been initiated, was to be expanded to facilitate greater access to fertilizer by smallholders who may not afford the large 50 kg packets

⁴⁰ . Republic of Kenya (1988) Development Plan, 1989-93. Government Printer, Nairobi.

- . the extension system was to be strengthened to propagate education on right types, quantities, and timing of use guaranteeing highest returns from such use
- . GoK was to examine the economics of local fertilizer production and expanded use of enriched farm yard manure and other appropriate farm and non-farm wastes

1989: National Policy for Fertilizer Pricing and Marketing

A first draft of this policy was first released in 1987 but became official upon approval by cabinet in June 1989⁴¹. The policy document paid tribute to the big disparity between actual and potential fertilizer use (175,000 mt against 650,000 mt), the fact that farmers do not always use recommended fertilizer levels and that others do not use any at all. The policy paper argued that this resulted from: a. the fact that fertilizers are not readily available to farmers when needed, b. general lack of farmer information on why, when and why to use fertilizers, c. absence of fertilizers in small packages appropriate to smallholder farmers with limited capital resources, and d. unfavourable climatic conditions that made fertilizer use uneconomical and risky. Problems of the fertilizer system as it existed then were:

- a. non availability of data for accurate forecasts of the national fertilizer requirements by type. There was a felt need to project annual fertilizer requirements on crop basis, covering major and minor crops,
- b. the import quota allocations to importers had varied rather wildly over the years, and there was need to set minimum requirements qualifying a firm for quota allocation. This minimum needed to be clearly spelt out to reduce the number of applicants and ensure allocations are sufficiently large to permit exploitation of scale economies during purchase and shipment.
- c. poor coordination of commercial and aid importation leading to possibilities of over supply and deficit. Policy document recognised the need for commercial importation to take into account fertilizer to be received under all donor programs,
- d. the pricing method was considered unsatisfactory because of absence of a pricing basis. The pricing formular did not ensure adequate margins for retailers in the rural

⁴¹ Ministry of Agriculture (1987); National Policy for Fertilizer Pricing and Marketing. Nairobi. This paper recognised the importance of agriculture in Kenya's economy, having accounted for 30% of GGP in previous years. Within the agricultural sector, fertilizers were recognised as the major inputs accounting for 18-27% of total expenditure on agricultural inputs during 1984 and 1985.

areas, and needed upgrading,

The main thrust of the national fertilizer policy therefore was to address these shortcomings to ensure that fertilizer was always available to farmers when needed at prices affordable especially by the smallholders. This was to be achieved through:

- . enhancing accuracy of estimating national fertilizer requirements on crop basis taking into account reserve stock needs,
- . carefully coordinating aid fertilizer with commercial imports and programming its arrival to minimize disruption of domestic marketing,
- . ensuring that importers make realistic applications and import full allocations with the assistance of performance bonding,
- . specifying separate quantities for short and long rains during allocation,
- . encouraging group purchases and shipping to promote exploitation of scale economies and make possible for firms with small allocations to import profitably,
- . refining system of application of benchmark international pricing to allow more accurate estimation of C&F prices to be used in setting the maximum retail prices,
- . formula for setting maximum retail prices to include sufficient margins to make it profitable to sell outside the main distribution centres at points closer to the farmers,
- . making sufficiently frequent price reviews for world prices to be reflected in domestic maximum retail prices,
- . monitoring retail prices outside the main trading centres to allow immediate action to be taken to redress local shortages,
- . in the long term to liberalise fertilizer importation limiting GoK's role to monitoring for types and quantities imported,
- . in the long run, donors to be requested to supply aid fertilizer in the form of concessional funding,
- . removing trace elements, potassium and tobacco types from import allocations
- . rationalising aid fertilizer so that requests to donors are based upon improved coordination between MoA and

Treasury.

1993: Development Plan 1994-96⁴²

This current plan observes that fertilizer use, estimated to be 237,000 - 253,000 (1993), was considerably below the estimated potential, and makes reference to steps stipulated in the previous plan as necessary in increasing fertilizer use, namely, the revision of import system placing fertilizers under the schedule for which the granting of import licensing is automatic, reentering the market system more competitive and giving better margins to promote distribution in the more remote areas, greater use of the cooperative movement and private sector in distributing fertilizer procured through the public sector, introducing the smaller fertilizer bags that are more convenient and affordable by the smallholder subsector, and strengthening the extension system to propagate education on the right types, quantities and timing of fertilizer application.

During the plan period, fertilizer use will be further increased through

- . ensuring availability of adequate foreign exchange for importers
- . improving credit facilities and timely payment for farm produce
- . examining the feasibility of increasing local production and increased use of farm yard manure and other farm and non farm wastes. Due to failure of past attempts by GoK to invest in fertilizer manufacturing and in accordance with current policy of divesture, incentives and government support will be given to the private sector to invest in the future development of the fertilizer industry.
- . to complement supply of inorganic fertilizers, use of bio-fertilizers and nitrogen fixing agents will be promoted. In this direction, farmers will be encouraged through extension, to adopt organic farming whenever appropriate.

⁴³ 1994: National Food Policy⁴³

This document includes an agricultural inputs policy as part of the national food policy, with a broad objective of ensuring availability of adequate quantities of quality inputs to farmers and, to the extent possible, ensuring timely

⁴² . Republic of Kenya (1993) Development Plan, 1994-96 Government Printer, Nairobi.

⁴³ . Republic of Kenya 1994; National Food Policy ,Sessional Paper No.2 of 1994.

application of appropriate amounts. Fertilizer policy would therefore be focused on:

- . achieving efficient and timely importation.
- . strengthening measures to increase fertilizer use, especially among the smallholders⁴⁵,
- . keeping prices low by continuing to allow duty free fertilizer importation and encouraging cooperatives, farmer companies and farmer groups to import fertilizers for their members⁴⁶,
- . ensuring that importation of fertilizers and other key agricultural inputs are given priority in utilization of foreign exchange;

GoK's fertilizer policies revolved around addressing a persistent concerns over increased use especially by the smallholders by keeping prices as low as possible, through extension, improving crop payment system, reentering the market competitive and developing agricultural input related credit schemes. GoK also sought to ensure adequate fertilizer supplies by keeping fertilizers duty free, giving fertilizer imports high priority, and exploring the potential for local production. It also sought to promote wider distribution by restriction gazetted prices to a limited number of scheduled trading centres but allowing retailers elsewhere to fix their own prices. In the long, GoK was to liberalise fertilizer importation and distribution. There was however apparent reluctance in entrusting the private sector with the full responsibility of ensuring timely availability of sufficient fertilizer quantities in acceptable cost. Memories of past nasty experiences with private sector participation appear to have lingered on since the 1980, and appear to have reduced the enthusiasm with such participation was approached⁴⁷. GoK's policy statements however explicitly supported increased private sector participation, even though the

⁴⁴. This document also observes that fertilizer application has been declining in recent years despite liberalisation of importation and distribution, this decline resulting from increased relative fertilizer prices propelled by erosion in the shillings value. The forex crunch of 1992/93 also precipitated importation difficulties.

⁴⁵. This was in appreciation of the role that fertilizers would play in intensification of land use considered imperative in future increases in food production.

⁴⁶. GoK reiterates its commitment to avoiding subsidies, and therefore using other mechanisms to keep fertilizer prices low enough for increases application by the smallholders.

⁴⁷. It is because of this distrust that the policy documents qualify the sector to specifically include cooperative societies and indigenous firms. Unleashing of unfettered private sector interests is considered politically risky since pricing results, especially during times of increasing global fertilizer costs, could cause hne and cry in the farming communities.

specific means through which this was to be achieved were not always made clear⁴⁸.

⁴⁸ . It is also the case that distortion caused by extensive-government controls create opportunities for rent extraction and a network of persons benefitting from status quo and therefore least interested in any form of change.

Chapter 7

A REVIEW OF KFA/KGGCU

The Kenya Farmers Association had the British East Africa Farmers Association established in 1919 as its origin⁴⁹. It was registered as a cooperative society under the Cooperative Act in 1931 but acquired dual registration later when it was also registered as company under the Companies Act. It has its head office in Nakuru supported by a network of 44 district branches concentrated in the high potential areas of the country⁵⁰. KFA's coverage of the medium and low potential area was limited since its agents were reluctant to move into these areas due to low profitability⁵¹. Over the years, it evolved to become a powerful national organisation. Membership was open to farmers actively involved in farming activities. Many of its members were largescale farmers but the number of medium and smallscale farmers increased after independence but especially during the 1970s and 1980s. KFA also extended services to non-member farmers including smallholders, as well as other cooperatives⁵². During the middle of 1980s, KFA had a network of over 3,000 stockists/agents scattered across the country. Most of these were private businesses supplied by KFA on a cash basis.

KFA's main functions included importation and distribution of farm inputs, buying, storage and selling of grain especially wheat as an agent for the National Cereals and Produce Board, and acting as GoK's agent in extending to farmers financial advances related to cereals⁵³. It also had sole agency for distribution of Kenya Seed Company's seed. A typical KFA shop stocked a wide of merchadise required by the farming community such as chemical,

⁴⁹ .The material presented here on KFA/KGGCU draws heavily from Hanan Betty 'Institutions' in The World Bank (1985) Kenya: Agricultural Inputs Review Volume III Working Papers Washington D C.

⁵⁰ . KFA also had three wholly owned subsidiary companies namely the KFA Agricultural Machines Ltd, KFA Auctioneers Ltd, and Kenfa Steel Works Ltd. The first of these offered agricultural machines, implements, tractors, and combined harvestors and the organisation had specialised departments including credit control, the Wool Centre, Cereals and Produce, Shipping, Travel and Agricultural services. The organisation's policies were developed by an elected board of directors. Eleven of these were elected by members from among themselves once every 3-4 years and 2 were full time employees of KFA. Permanent Secretaries from the ministries of Agriculture and Commerce represented GoK in the board of directors.

⁵¹ . Limited profitability resulted from limited opportunity for cash sales and difficulties in covering distribution cost due to fixed margins.

⁵² . By 1985, KFA operated 32,000 member and non-member accounts. Each member had only one share with a nominal value of kshs.20 only. This single share requirement was regardless of the level of the member's farming operations.

⁵³ . The KFA also recovered, on behalf of the Agricultural Finance Cooperation, the New Seasonal Credit Scheme from crops it purchases from farmers. Its role as NCPB's agent for handling and storing maize in the Rift Valley was suspended by the OP in 1983.

fertilizers, hardware, clothing, seeds and tools. Agricultural machines, tractors, combined harvestors were offered by the agricultural machines subsidiary. In 1982, fertilizer trade accounted for about 38% of KFA's total turnover⁵⁴.

KFA branches formed the largest retail network in the country, and supplied the bulk of fertilizer used by the non estate sector. Following the withdrawal of private firms from fertilizer importation in the mid 1970, KFA became a critical organisation in the fertilizer procurement and distribution, accounting for over 70% of total fertilizer sales. It also handled the bulk of aid fertilizer, having been granted sole agency by GoK for distribution of fertilizer⁵⁵.

In August 1984, the management of KFA, including its board, was dismissed by the commissioner of cooperatives in what appeared the culmination of an enquiry instituted by the Ministry of Cooperative Development in 1982, and replaced with a new team. A month earlier, the KGGCU had been launched with the objectives of purchasing maize and other crops from its members, acting as agents or brokers for purposes of disposing of members produce, purchasing, importing, manufacturing and selling agricultural inputs, and for manufacturing, importing and constructing vehicles, tractors, agricultural plant and equipment. It was also supposed to hire equipment to its members, to provide transport and other services to members as requested, as well as undertake and provide research, advisory services and training in production of maize and other crops. KGGCU was also to receive deposits from and extend loans to its members as well as banking and allied services⁵⁶. In December 1984, KGGCU took over KFA's assets and operations, and the sole agency agreement was passed on to the new organisation.

In the period leading to the eventual take over of KFA by KGGCU, there was considerable uncertainty in the fertilizer market as KFA was unable to order its share of commercial fertilizer imports because it was no longer certain about its future. On the other hand, the management at the helm of the new organisation had no experience and KGGCU could therefore not immediately play the import role previously played by KFA. Although KGGCU still retained KFA's extensive distribution network, there would have been fertilizer shortages in the period immediately following the take over. GoK was however able to successfully request for increased donor assistance and generously give quota allocations to other commercial importers

⁵⁴ . Hanan, *ibid* para. 4.04, p.9

⁵⁵ . This agreement was later seen as an impediment to development of fertilizer market as it gave KFA/KGGCU unfair advantage and created uncertainties in the sector. It therefore became the object of policy dialogue and was eventually broken in 1985.

⁵⁶ . Membership to KGGCU was restricted to farmers growing more than two acres of grain and at least one acre of rice, and thereby excluding a large number of small scale farmers.

⁵⁷ to make up for the potential shortfall. The KGGCU however enjoyed considerable support from the GoK and was able to immediately begin to give meaningful service to its newly recruited members and the farming community in general.

As KGGCU took over KFA, donor funded fertilizer was beginning to dominate fertilizer imports in Kenya, giving donors a rare opportunity to influence developments in the sector. The sole agency agreement was broken within a year of the take over although KGGCU continued to have access to government fertilizer on better terms than other organisations⁵⁸. KGGCU therefore continued to control the lion's share of the market. Its role as a market leader was demonstrated by the fact that when fertilizer prices were eventually decontrolled in January 1990, it was the only fertilizer marketing organisation that released a price list to further assert its role as market leader and enhance its market share⁵⁹. At the time, it was felt that KGGCU did not cover its marketing costs in its pricing, and that its pricing system was not commercially sustainable⁶⁰. Potential loss caused by this pricing was compounded by the loss of preferential treatment regarding access to donor funded government fertilizer in subsequent years⁶¹. In recent years, the organisation has been unable to comply with financial requirements necessary for fertilizer importation including importation through donor programs. In the last two years, KGGCU has been unable to procure any fertilizer supplies and has therefore ceased to distribute fertilizer despite its elaborate distribution network. There was virtually no fertilizer in all KGGCU's stores during the 1993/94 fertilizer year⁶².

⁵⁷ Most shipments were however late and could not reach the farmers in time for application. There was therefore heavy carryover stocks during 1985.

⁵⁸ KGGCU still remained the alcee of last resort for donor fertilizer but on a consignment basis, while other alcees were required to pay either in cash or bank guarantees within a specified time period.

⁵⁹ KGGCU's management indicated that their pricing behavior following price decontrol was also to reduce heavy stock levels. They also indicated that their pricing was also cost oriented although subsequent problems facing the organisation suggested otherwise.

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⁶⁰ IFDC (1990) The Impact and Expected Consequences of Fertilizer Price Decontrol in Kenya.

⁶¹ Under the USAID Fertilizer Pricing and Marketing Reform Program, KGGCU lost access to fertilizer under consignment basis being required to procure bank guarantees like all other private sector firms.

⁶² KGGCU's management was optimistic that GoK would one day bail them out of their financial woes, giving the organisation an opportunity to bounce back and play its role in the sector. Recent press reports indicate efforts by the KGGCU's management to restructure its organisation including provision for increasing membership fees by 500% and shortening its name. See also Daily Nation(1994) 'KGGCU seeks to change its name' Wednesday September 5th, 1994.

Chapter 8

FERTILIZER SUPPLY, PRICES AND USE TRENDS

Importation and Use

Other than some small quantity of SSP blended in Ruiru using rock phosphate imported from Majingu mines in Tanzania, the different fertilizer products used in Kenya are imported. Levels of total imports of all fertilizer products fall within the 200 - 300 thousand metric tonne range, attaining peaks of 345 and 365 thousand tonnes in 1985/86 and 1988/89 respectively, but falling to 200+ thousand tonne level (table 4). Fertilizer importation in the last ten years has swung widely without a clear trend. Years of peak importation correspond with increased donor importation, such importation accounting for 42% of total imports in 1985/86 and 60% in 1988/89. In addition to aid fertilizer, other considerations influenced total fertilizer imports into Kenya. Moisture conditions stabilised and farming activities reestablished during 1985/86 following the severe draught experienced during 1984. There were perception of increased fertilizer application during the 1985/86 season. High import levels led to heavy carryover stocks which took a year to clear.

During the following year (1986/87), total fertilizer imports fell by about 35%, commercial imports shrinking by 25% and donor shipments by 44%. A year later, total imports declined further as a result of a drastic decline in commercial imports, from 152 thousand metric tonnes during 1986/87 to a mere 83 thousand in 1987/88. During the 1987/88 season, fertilizer imports could not meet farmers' needs, and the sector had to fall back on stocks carried forward from 1985/86. Following this draw down, there were fears of shortages and donors and commercial imports were significantly increased during 1988/89⁶³. Fluctuations in fertilizer import levels resulted from difficulties in pitching imports at the correct level and attempts to synchronise supply and demand, primarily as a result of complications related to accurate estimation of demand levels.

Kenyan farmers use more than 15 different fertilizer products on different crops for planting and top dressing. Imports of DAP, CAN, NPK 25:5:5+5s and NPK 20:20:0 in that order dominated the sector during the last 10 years (table 5) The importance of DAP increased significantly over the 1983/84 - 1993/94 period from 21% of all fertilizer imports in 1983/84 to 33% in the 1993/94 season. The contribution of phosphates increased from 35% to 41% of total imports between 1983/84 and 1993/94, while that for nitrates declined from 47% in 1983/84 to 28% in the 1993/94 season. In other words, there was a reversal of the relative importance of phosphates and nitrates, the latter

⁶³ Commercial imports jumped by 160% and donor shipments by 153% between 1987/88 and 1988/89.

losing to in favour of the former. Compounds continued to account for 30% of total imports. On balance, there was increase dominance of higher activity fertilizer types in total import with corresponding increase in nutrient availability in the country. Aid shipments contributed to overall fertilizer availability, and therefore had a definite impact on agricultural production in Kenya⁶⁴.

Total fertilizer application has not increased much since 1985/86, when it peaked at 238 000 metric tonnes increasing gradually from about 135 000 tonnes in 1980. This peak corresponded with the record fertilizer importation during the same year. Consumption somewhat peaked again in 1988/89 at 272 000 tonnes, also corresponding to high imports recorded during that year. Throughout the period and between these peaks, fertilizer use was around 220 000 tonnes. Increased use generally trended with availability.

To what use are the various fertilizer products put? Cropping cycles embody two distinct fertilization requirements during planting and top dressing. The planting fertilizer types include DAP applied on maize, wheat, potatoes, horticultural crops, millet and sorghum. MAP is used in planting barley and maize, and TSP in planting coffee sugarcane, cotton, pyrethrum, rice, bananas, citrus and passion fruit, while SSP is used in planting sugarcane, beans and maize. Compounds such as NPK 20:20:0, NPK 20:10:10 and NPK 17:17:17 are applied on potatoes, maize, pineapples, coffee, bananas and maize. SA is used for top dressing maize, sugarcane and rice. Maize and sugarcane are also top dressed with CAN, used to top dress cotton and bananas. Maize, coffee, cotton and bananas are also top dressed with ASN, while maize, sugarcane coffee and pineapples are alternatively top dressed with Urea. NPK 25:5:5+5%S is used exclusively for top dressing tea, and one of the other minor compounds (NPK 15:15:6+6+4Mgo) is one of the many fertilizer type used for top dressing coffee. Other minor compounds are also used for top dressing tobacco. MOP and SOP are used for top dressing all crops depending on potassium deficiency, while other trace elements including folia feeds are used on various crops depending on soil nutrient conditions. Maize and coffee farmers have the widest choice of planting and top dressing fertilizers, and rice and tobacco farmers the narrowest choice.

⁶⁴. Donor funded fertilizer also released scarce foreign exchange for importation of essentials, and counter part funds generated from fertilizer related donor programs helped in relaxing wider resource constraints and in project financing. Aid fertilizer therefore had macroeconomic impacts that were far beyond agricultural production.

Table 3; TOTAL FERTILIZER IMPORTS, CONSUMPTION AND CARRYOVER STOCKS,
1983/84 TO 1993/94

('000 Metric Tonnes)

	83/ 84	84/ 85	85/ 86	86/ 87	87/ 88	88/ 89	89/ 90	90/ 91	91/ 92	92/ 93	93/ 94
Commerc. Imports	188	133	199	152	83	149	74	76	170	176	203
Donor shipment	25	73	146	82	142	217	112	107	74	72	107
Total Available	213	208	345	234	225	365	213	221	244	248	310
Consump.	143	175	238	227	238	272	237	212	253	233	244
Carryover Stocks	71	31	107	3	-13	49	-24	8	-9	15	29

Source: Ministry of Agriculture, Livestock Development and Supplies, Nairobi.

Table 4: FERTILIZER IMPORTS BY PRODUCT TYPE, 1983 - 1993
('000 Metric Tonnes)

PRODUCT TYPE	83/ 84	84/ 85	85/ 86	86/ 87	87/ 88	88/ 89	89/ 90	90/ 91	91/ 92	93/ 94
DAP	41	48	67	65	77	93	82	75	84	105
MAP	16	0	8.5	1	5	4.5	3.5	7.7	5	16
TSP	13	4	16	8	6.3	7.5	0	10	4.5	1.8
SSP	0	3	7	4	0	0	0	0	0	3.5
SA	14	23	13	4	3.5	15	0	10	0	7
CAN	45	27	41	48	37	51	25	24	24	57
ASN	29	9.5	11	8.4	15	15	13	0	7	0
UREA	5.5	16	39	6.8	6.5	22	15	4	21	22
NPK20: 20:0	25	20	45	18	18	22	6	10	2	10
NPK 25:5:5+ 5S	22	26	44	36	26	46	53	45	53	50
NPK20: 10:10	11	19	41	24	15	18	7	3	8.5	30
NPK17: 17:17	0	4	6.4	4.5	5.3	57	1.5	16	0	0
NPK23: 23:0	2.5	0	0	0	0	8	0	10	20	4
NPK15:1 5:6+6+4 Mgo	0	0	0	1.5	1.5	1	0	1.8	.5	0
NPK6:18 :20+4Mg o	0	2	0	1	1	2	2	1	0	0
MOP/SOP	1.4	3.6	4.1	1	4.1	2.9	2.1	3.5	.89	0
OTHERS	7.2	4.4	2.4	.2	7.1	1.3	2	.68	13.5	12.8
TOTAL	213	208	345	234	227	365	213	221	244	310

Note: Totals may not tally with figures presented elsewhere due to rounding off errors.

Source: Ministry of Agriculture, Livestock Development and Supplies, Nairobi.

Table 5: NATIONAL FERTILIZER AVAILABILITY AND CONSUMPTION, 1993/94
('000 Metric Tonnes)

Fertilizer type	Stocks: 30.6.93	Imports: July 93 to 15.1.94	Total available for short rains	Stocks at 15.1.94	Consumption short rains	Imports, Jan 94 - 30.6.94	Total available for Long rains	Stocks at end of June 94	Consumption Long rains	Total Consumption 1993/1994
DAP	28.85	0	29.85	11.68	18.17	104.6	116.2	58.31	57.93	76.10
MAP	.300	9.84	10.14	8.69	1.44	6.1	14.79	6.08	8.71	10.15
TSP	2.96	1.80	4.76	2.46	2.29	0	2.46	1.27	1.20	3.49
NPK20 20 0	15.71	10.00	25.71	11.14	14.57	0	11.15	1.34	9.80	24.37
NPK23 23 0	19.80	3.48	32.28	15.75	7.53	0	15.75	3.04	12.71	20.25
SSP	0	3.50	3.48	3.48	0	0	3.48	0.069	3.41	3.41
SA	4.0	6.74	10.74	6.0	4.74	0.251	6.25	5.25	1.00	5.74
CAN	16.0	0	16.0	12.23	3.77	56.85	69.08	36.66	32.42	36.19
ASN	3.58	0	3.58	0.015	3.57	0	0.002	0	0.015	3.58
UREA	7.62	16.41	24.04	22.11	1.93	5.5	27.51	6.51	21.11	23.04
NPK25 5 5	1.8	41.9	43.7	13.24	30.46	0	13.24	0.748	12.49	42.95
NPK 20 10 10	0	30.0	30.0	21.30	8.7	0	21.3	8.88	12.42	21.12
NPK 17 17 17	1.9	0	1.9	0.65	1.25	0	0.65	0	0.646	1.90
OTHERS	4.6	1.26	5.86	1.83	4.03	11.54	13.36	3.156	10.21	14.24
TOTAL	108.11	124.91	233.03	130.6	102.4	184.8	315.4	131.31	184.08	286.52

Source: Ministry of Agriculture, Livestock Development and Marketing, Nairobi

Importation, Producer Prices and Use

Previous studies have demonstrated that domestic fertilizer application in Kenya as in other countries is determined by a multiplicity of factors including technical requirements, marketing practices, government controls, weather conditions and economic forces including costs of fertilizer procurements, profitability of different crop enterprises and credit availability⁶⁵. These studies also established inverse fertilizer price and use relationships, so that when fertilizer costs are high relative to prospective producer prices, fertilizer use is severely restricted. Overall fertilizer availability, both donor funded and commercial, also impacts on use, because prospective fertilizer returns cannot be translated into reality unless the different fertilizer products are available.

Comparing fertilizer importation and use reveals that these trended together for most of the 1980s, with imports levels pulling use, suggesting that availability was important in determining levels of use (figures 4 & 6). The impact of fertilizer availability disappeared after 1989/90, as levels of importation and use no longer trended together. Comparing fertilizer price indices and consumption indices reveals that fertilizer prices did not have their expected effect on fertilizer utilization during most of the 1980s, as both prices and use showed an upward trend. The upward trend here is likely to have been the result of factors other than prices, such as availability of supplies. After 1989, however, trends in prices and use went towards opposite directions. This suggests that after 1989, fertilizer prices began to play their traditional market role, so that increased fertilizer prices lead to reductions in fertilizer use, *ceteris paribus* (figure 5). In aggregate, the impact of fertilizer prices was swamped by other factors during most of the 1980s when fertilizer was subject to price controls. Following decontrol, fertilizer prices began to assert themselves, shaping fertilizer consumption in the market.

Nominal coffee prices and fertilizer use generally trended together during most of the 1980 (fig.8), except during the 1986 - 88 period when fertilizer use increased significantly as coffee prices stagnated. In the more recent period, the two variables trended differently. These trends are replicated when comparison is made between fertilizer use and nominal prices for tea, maize and wheat (figs.12,13 & 17). Although nominal producer prices for these crops have been on an upward trend in the recent past, fertilizer use does not seem to have responded accordingly. These trends are retained when real prices for these different crops are used, except coffee for which real prices and fertilizer use

⁶⁵. See for example, USAID (1984) *Kenya's Fertilizer Situation and Related Policy Issues*. Agricultural Development Office, USAID Kenya and Kimuyu PK, Jara, MA and Mturi, W(1991) 'Determinants of Fertilizer Application of Smallholder Coffee and Maize in Murang'a District, Kenya' *Eastern Africa Economic Review* Vol.7 No.1

⁶⁶trend together(figs.7,9,11,14,15,16 & 18) .

On the basis of this partial analysis, we conclude that fertilizer prices, previously swamped by other factors, have become important determinants of fertilizer use in the recent past following price decontrol. The potential influence of the producer prices of most crops on fertilizer use has not yet been experienced, the real prices of coffee being the only exception⁶⁷.

⁶⁶.Real prices for crops are estimated using a 1982 based GDP deflator.

⁶⁷. The usefulness of this cropwise analysis is reduced by use of aggregated national fertilizer consumption data along with prices of specific crops. More meaningful analysis require data on fertilizer use on each of the crops under consideration.

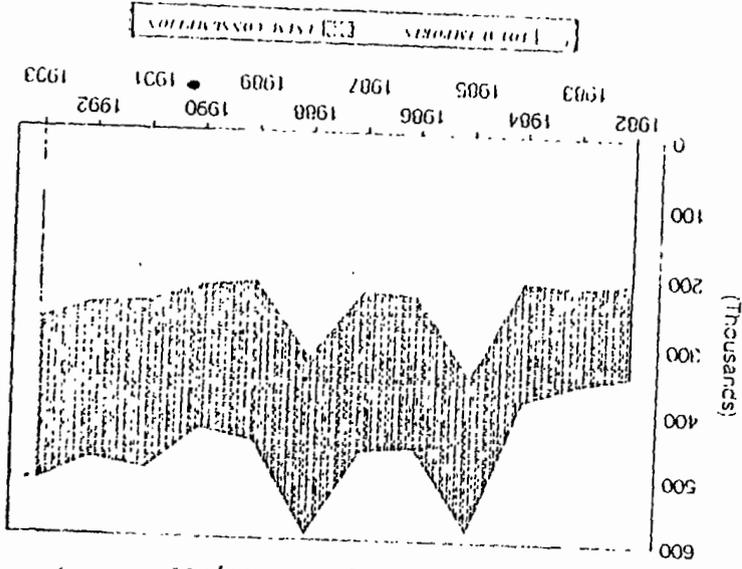


Figure 4
FERTILIZER IMPORTS AND CONSUMPTION, 1982-1993, MT.

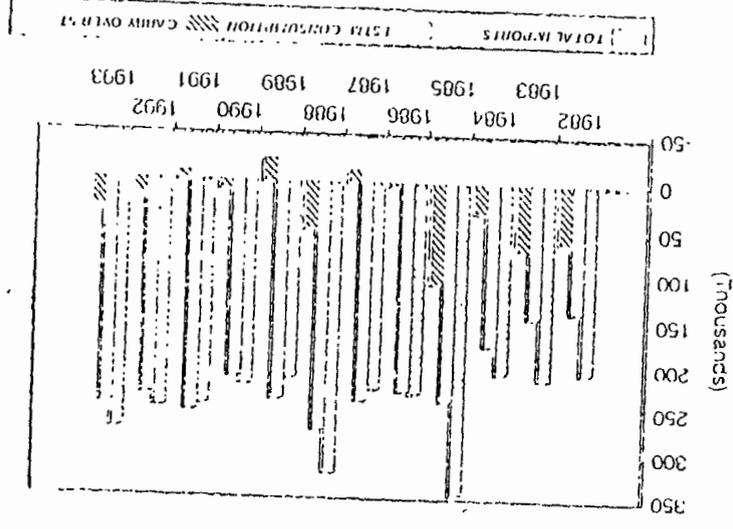


Figure 2
FERTILIZER IMPORTS, CONSUMPTION & CARRY OVER STOCKS, 1982-1993, MT.

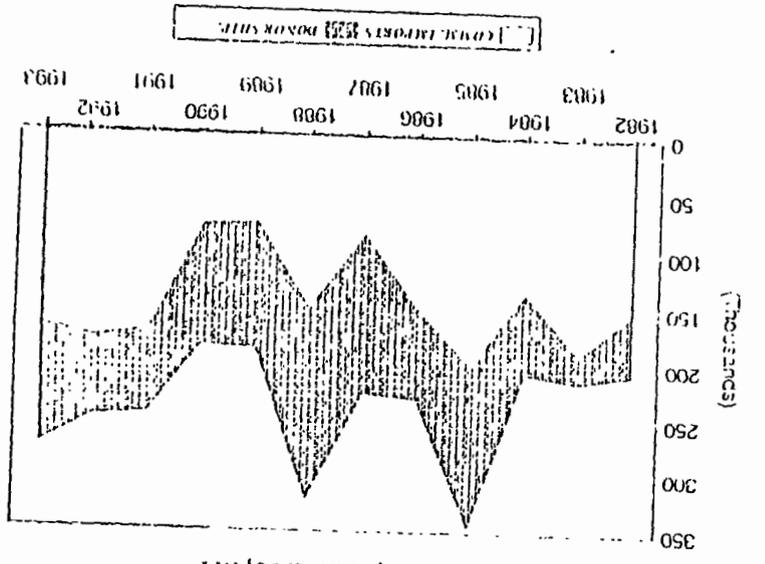


Figure 3
COMMERCIAL IMPORTS & DONOR SHIPMENTS, 1982-1993, MT.

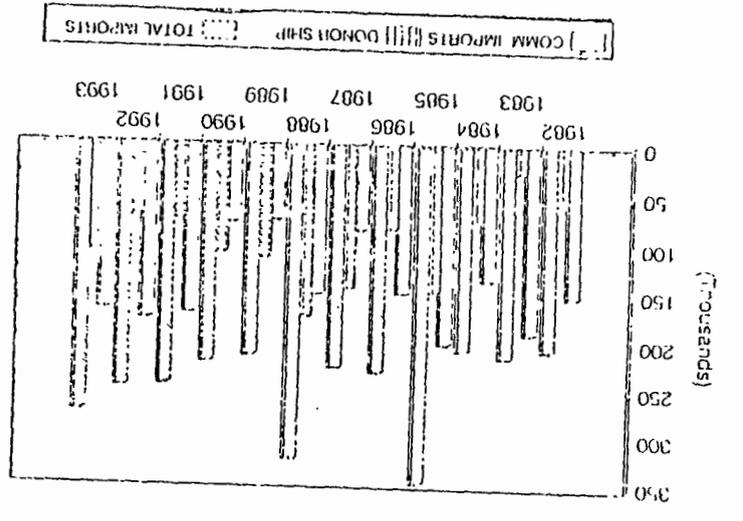


Figure 1
COMMERCIAL IMPORTS AND DONOR SHIPMENTS, 1982-1993, MT.

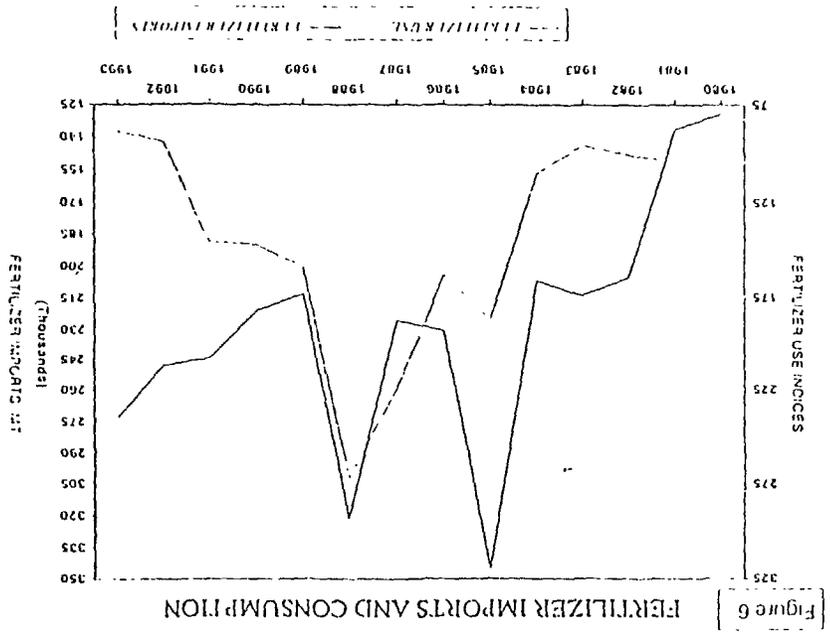


Figure 6: Fertilizer Imports and Consumption

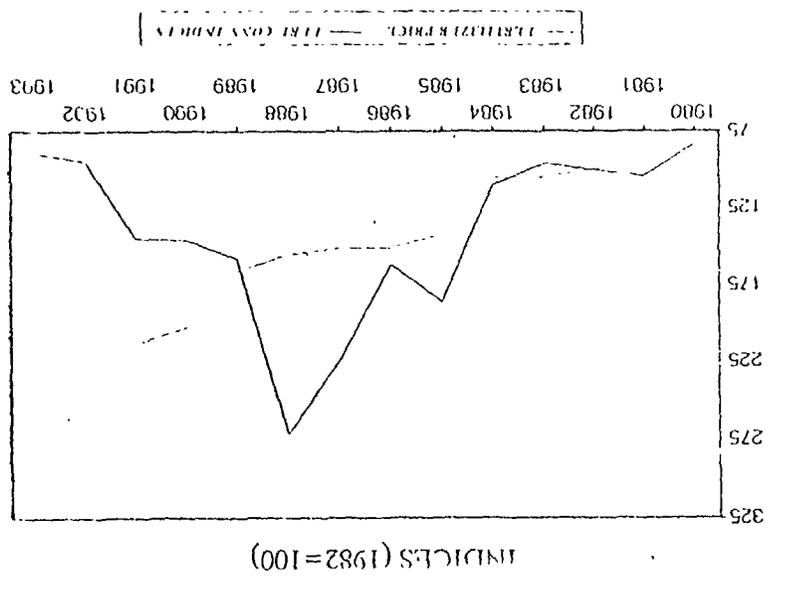


Figure 7: Estimated Fertilizer Consumption & Real Coffee Prices (1982=Base Year)

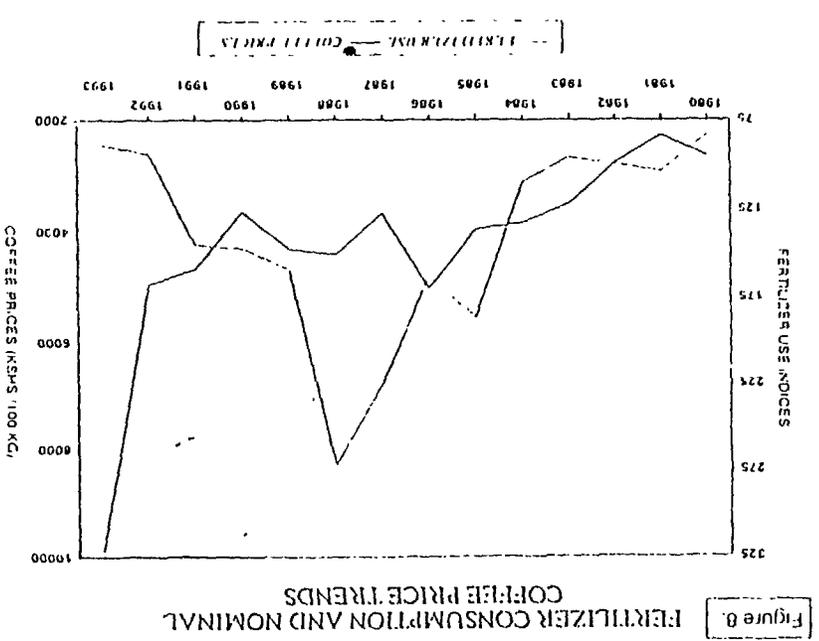
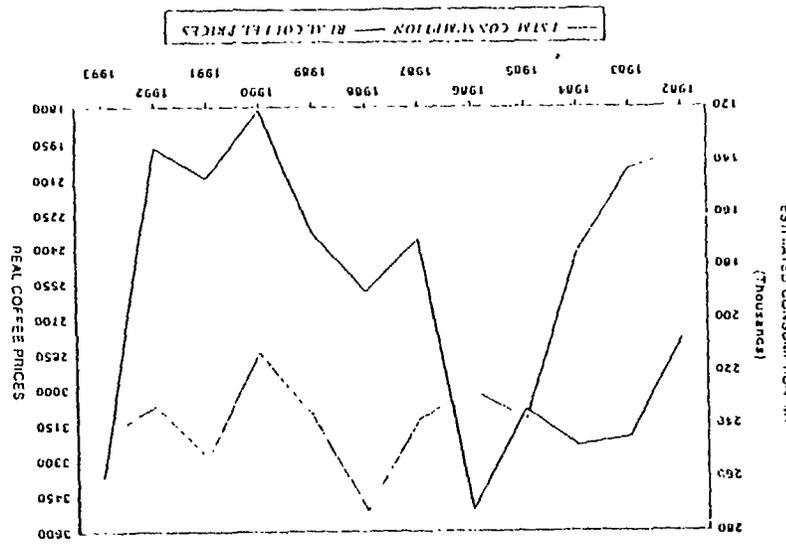


Figure 8: Fertilizer Consumption and Nominal Coffee Price Trends



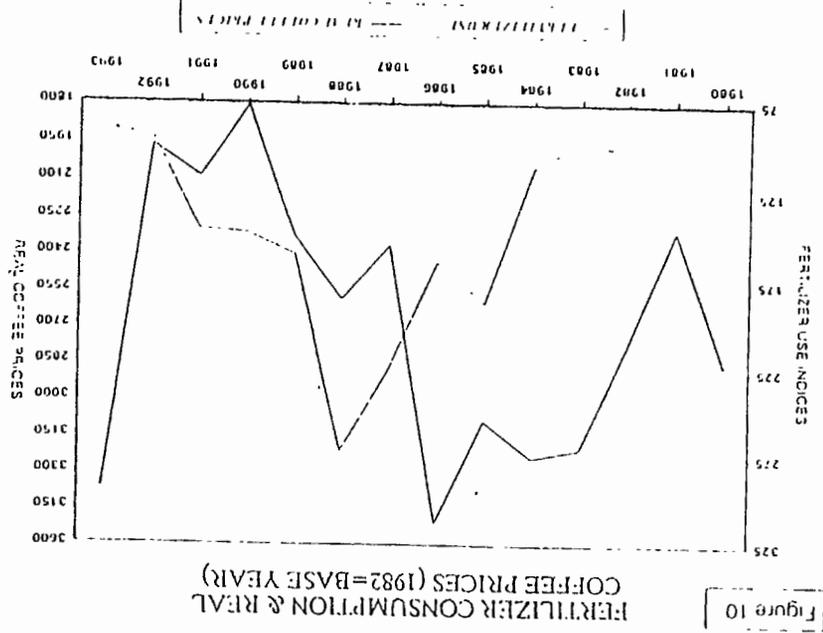
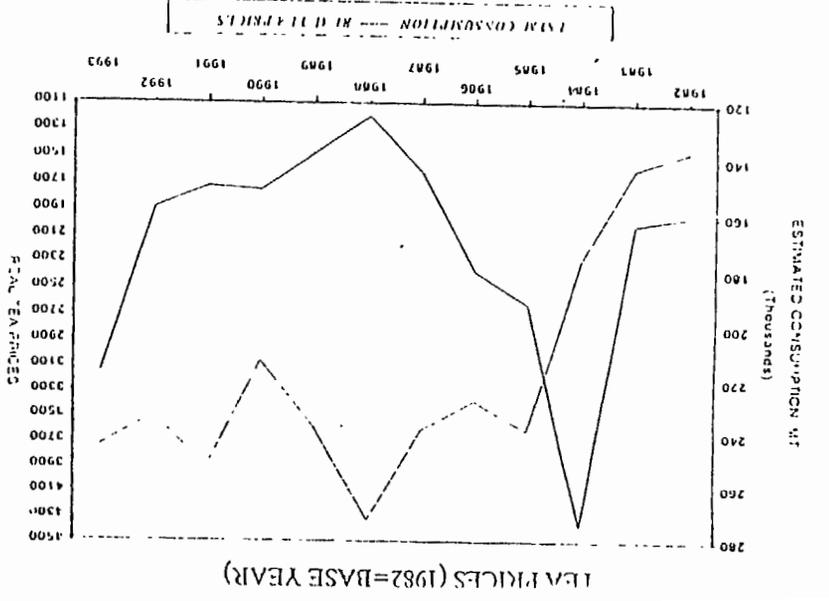


Figure 10



TEA PRICES (1982=BASE YEAR)

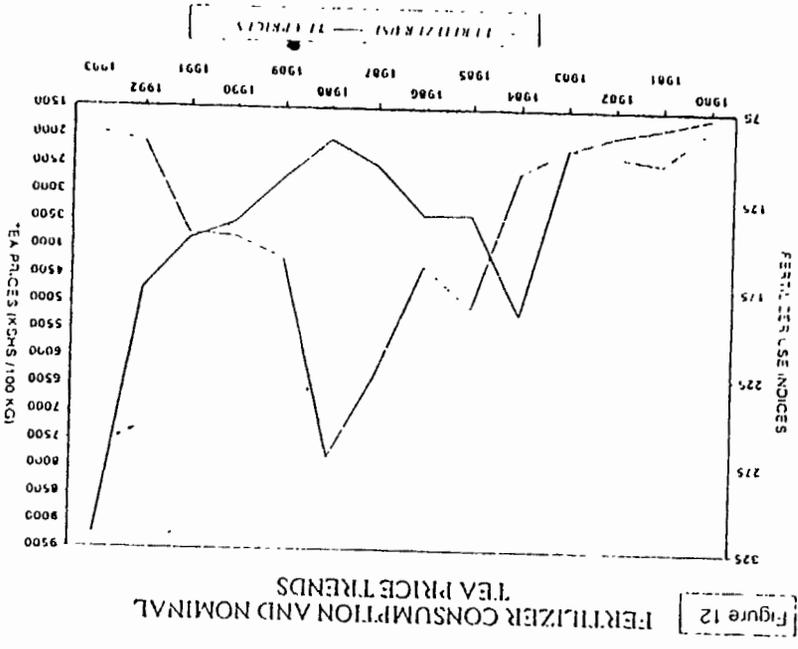
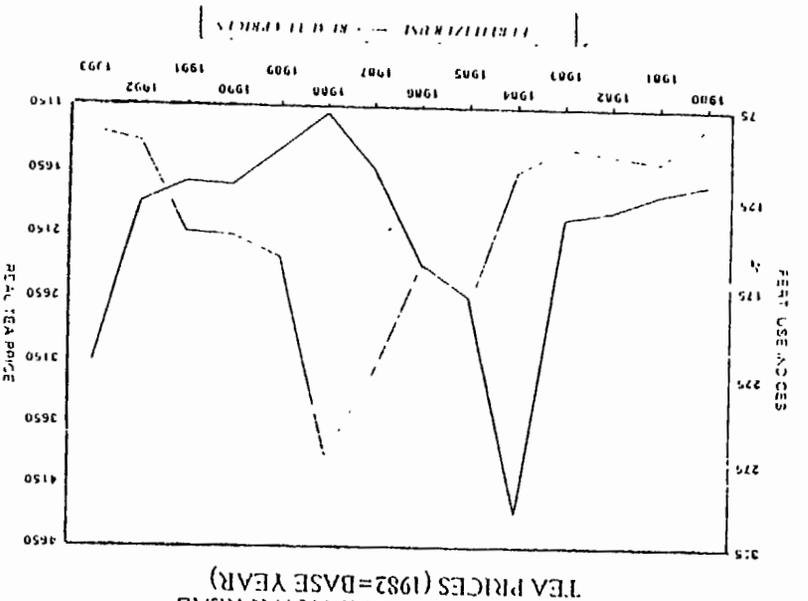


Figure 12



TEA PRICES (1982=BASE YEAR)

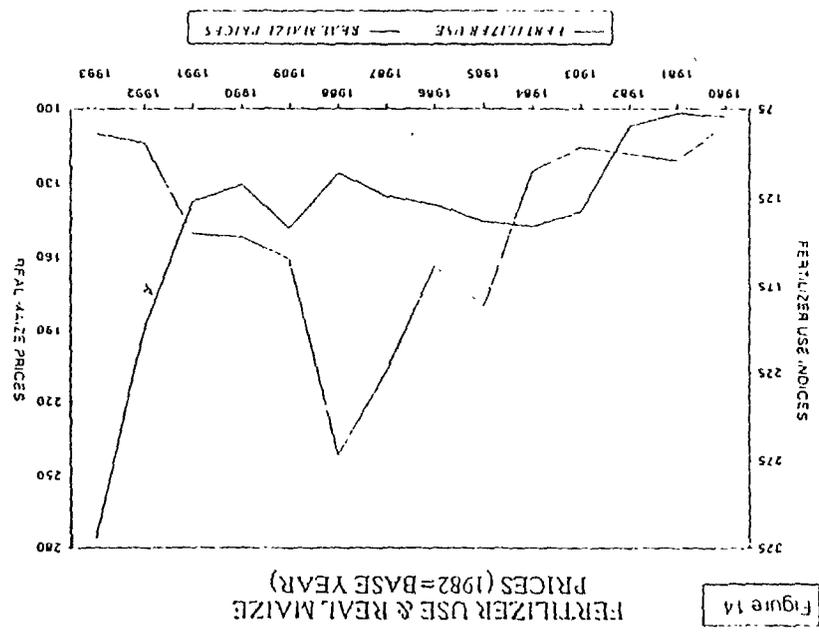


Figure 14

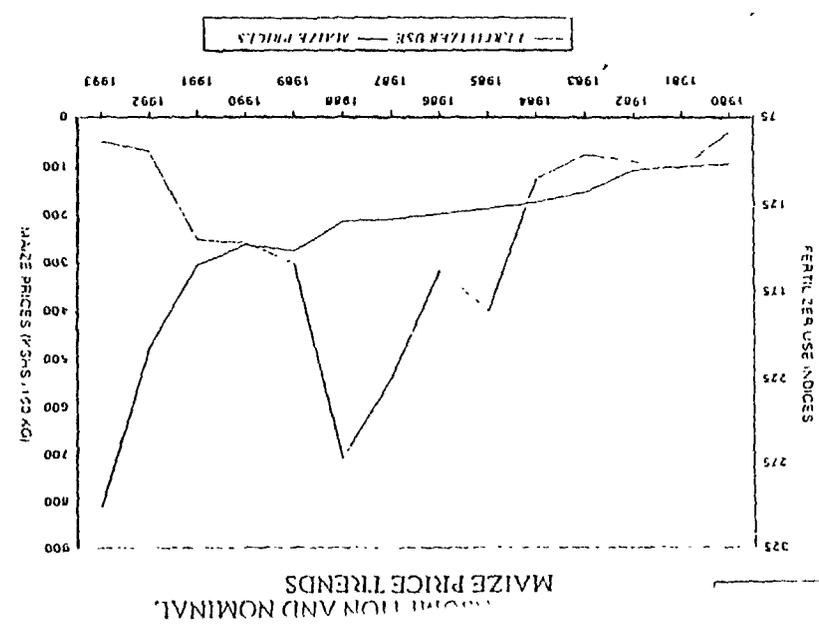


Figure 15

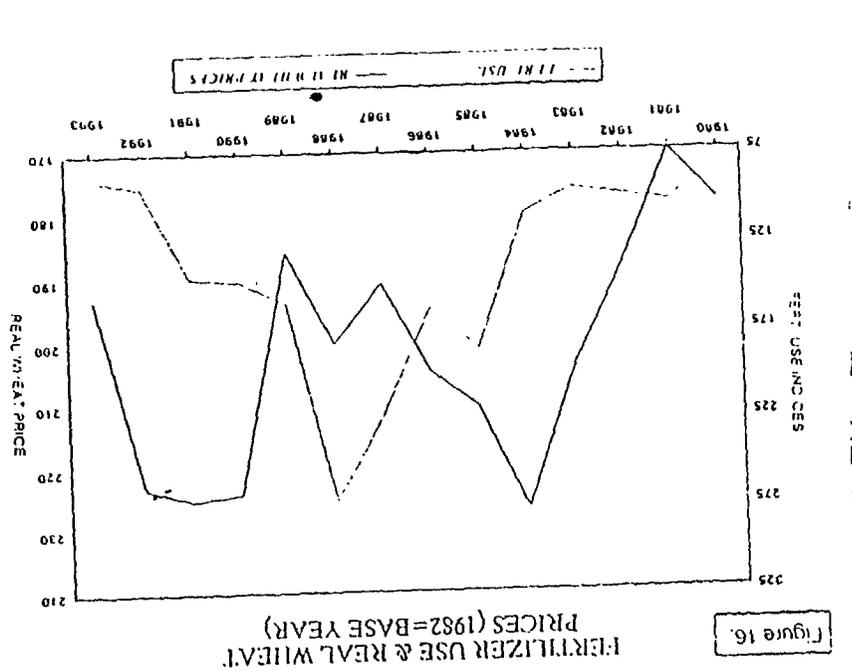


Figure 16

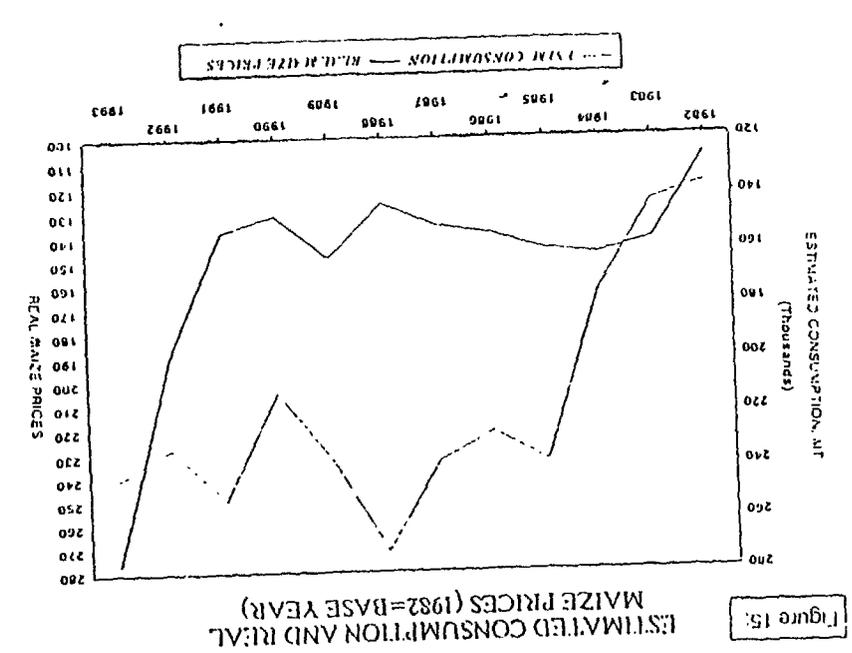


Figure 15

Figure 17 FERTILIZER CONSUMPTION AND NOMINAL WHEAT PRICE TRENDS

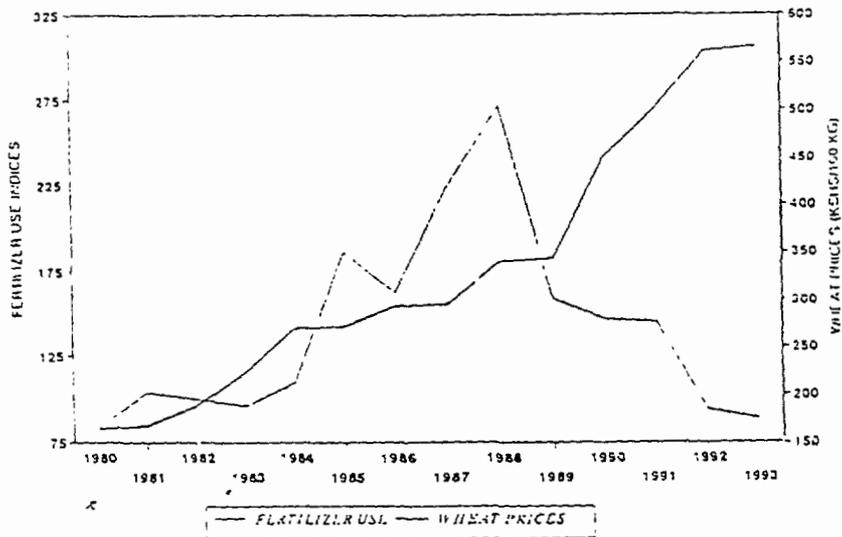
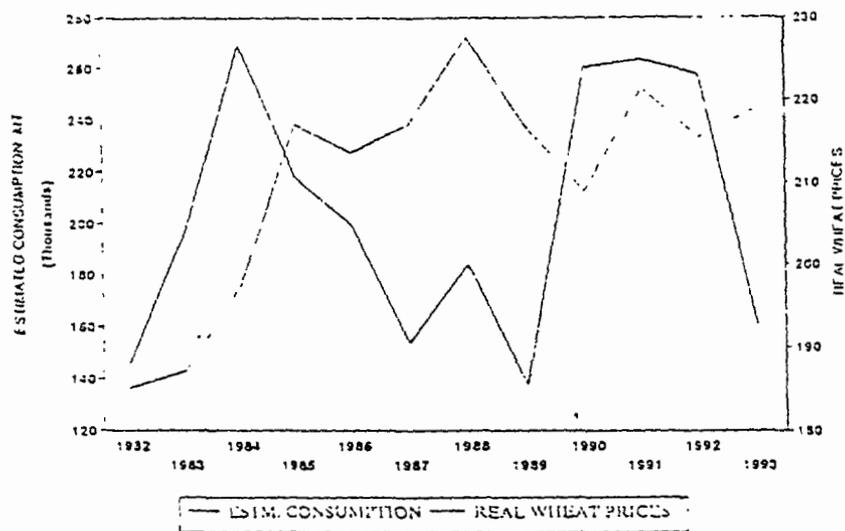


Figure 18 ESTIMATED FERTILIZER CONSUMPTION & REAL WHEAT PRICES



Chapter 9

EPOCHS IN FERTILIZER MARKETINGRemoval of Direct Subsidies and
Introduction of Maximum Retail Prices

Nutrient based fertilizer subsidies, recommended by the Mackenzie commission set up to explore constraints to smallholder fertilizer use, were introduced during 1963/64 and removed ten years later in 1974. The subsidies, paid against presentation of invoices and custom entry documents, collected by the by the recognised importers through the then Kenya Fertilizer Association and deducted from prices paid by farmers, were found to be of limited benefit to smallholders, the intended beneficiaries of such subsidies.

Upto early the 1970's, the largest fertilizer importer unilaterally determined prices and other importers agreed to this market leader's price list presented to the GoK for approval. A commissions set up in 1970 to explore constraints facing the sector recommended anti collusion legislation, and required importers to submit separate price proposals for approval. The commission also made specific recommendations regarding a cost plus basis for establishing fertilizer prices. Rapid escalations in international fertilizer prices following the 1974/75 oil crisis made it difficult for meaningful submission of fertilizer prices proposals making a case for eventually subjecting fertilizer pricing to the general price control order in 1976. Thereafter, the price controller was required to establish maximum retail prices (MRPs) for major trading centres in the country. The MRPs were meant to provide sufficient distribution margins and at the same time shield farmers against undue private sector exploitation.

The development of an appropriate methodology for establishment and correct pitching of MRPs was a major problem. The official MRPs were panterritorial, discouraging fertilizer distribution in farming areas further away from the scheduled trading centres. The C&F basis often occasioned unacceptable results, such as generating different MRPs for same fertilizer products from different ports of origin purchases under different terms but discharged within the same week. This initial pricing system was also a disincentive for minimisation of fertilizer sourcing, procurement and shipping costs, and encouraged general importer impropriety⁶⁸. Most often, inadequate supplies turned the MRP prices into effective prices rather than ceilings, with limited incentive for development of discounts necessary for the

⁶⁸ The system made possible for importers to collude with overseas suppliers to overstate fertilizer costs since these would be recovered through the cost plus pricing procedure, and use fertilizer payments to obtain foreign exchange needed for other purpose other than fertilizer importation. This was propelled by the rigidly controlled foreign exchange market.

development of the retail end of the market. Other problems related to inclusion of adequate wholesale and retail margins, and timely announcement of the price revisions in line with importers forward plans.

Attempts were later made to address some of these problems by using Benchmark (C&F) International Price as a basis for for establishing the MRPs, making price revisions seasonal, and improving the timeliness of the announcement of such revisions⁶⁹. Inclusion of fertilizers in the general price control order increased GoK's involvement in the sector, removed an important commercial function from the private sector, does not appear to have protected farmers from private sector exploitation, and discouraged the establishment of a meaningful distribution network. Problems related to management of fertilizer pricing system and negative impact on fertilizer marketing shifted the focus of the market reform dialogue towards gradual removal of price ceiling and led to the fertilizer price decontrol in January 1990.

GoK's Request for Donor Assistance

Foreign exchange problems triggered by the 1973/74 oil crisis, dissatisfaction and distrust for the oligopolistic market structure consisting of a small group of large importers, limited capacity of the private sector to import and distribute fertilizer at reasonable prices and utter failure of attempts at local fertilizer production during the second half of the 1970s made it imperative for the GoK to seek out fertilizer related donor assistance. Although the first shipment of aid fertilizer arrived in 1974, the GoK began to aggressively seek out donor assistance in during the late 1970s with the result that large donor funded shipments began in 1977 becoming more regular after 1979/80. The contribution of aid fertilizer subsequently increased from 27% during 1982/83 to more than 60% during 1987/88. Over the years, a total of 11 donors supplied Kenya with fertilizer, the number of such donors varying from year to year. The earlier fertilizer donors included the Netherlands, Norway and Japan who supplied Kenya with fertilizer during 1979/80. These donors reached a maximum during 1985/86 when 8 countries supplied aid fertilizer to Kenya. By 1992/93 the number of donors had gradually declined to only two - Japan and the European Economic Community.

GoK's decision to solicit for fertilizer related donor assistance released foreign exchange for other purposes and gradually elevated the role of aid in Kenyas fertilizer market as the GoK pursued a policy of maximizing external resources. Such assistance was largely as aid in-kind, so that its presence marginalised commercial imports considered only after donor commitments and carryover stocks had been taken into account, made necessary delicate coordination of donor and commercial

⁶⁹ There was limited capacity for application of the BIP, and the tendency base it on the three lowest C&F quotations was considered not fully representative and therefore inappropriate.

imports through the import plan, and caused further complications in the pricing system. The presence of aid fertilizer meant an increased number of stake holders in the sector to include the farmers, the private sector, GoK, the donors and business interests from donor countries. GoK's and donor's roles in the fertilizer markets increased significantly, initially at the expense of the private sector and reform negotiations in the latter half of the 1980's were tailored towards bringing private interests back to the sector, reducing GoK's direct role, and ensuring that the introduction of aid fertilizer into the market showed full regard to the requirements of private sector development.

Donor assistance increased fertilizer supply and improved farmers access to fertilizer products and improved Kenya's balance of payments position. But in addition and perhaps more fundamentally, aid fertilizer created unique opportunities for the GoK and fertilizer donors to better appreciate problems exitant in the sector through technical assistance and policy and evaluative studies, concretising the foundation for reform negotiations. These negotiations, spelt out as conditionalities and covenants, became regular features of major fertilizer aid agreements during the 1980s. The conditionalities and coventants helped get the fertilizer market back on track, and uniquely accounts for the observed evolution of fertilizer procurement and distribution in Kenya. This is despite the fact that the donor community did not always act in concert.

KFA/KGGCU's Sole Agency Agreement with GoK

Following the prospect for large shipment of donor funded fertilizer in an environment of increased distrust for the private sector, the GoK was happy to have had nominated the KFA, later taken over by KGGCU, to solely distribute all government fertilizer. The main considerations in this nomination were that KFA/KGGCU had the largest network of stockists and the largest market share. GoK also needed to ensure full payment of counterpart funds. KFA which had the samplence of a cooperative run as a private company, was considered more likely to identify with and be more supportive of farmers' aspirations than any other organisation. Previous frustrations encountered in getting the inexperienced KNFC to distribute government fertilizer strengthened KFA's candidacy for such nomination.

This agency agreement further increased KFA/KGGCU's market share but precipitated tension between GoK and KFA, GoK accusing KFA of mismanagement and deliberate delays in generating and submitting fertilizer related counterpart funds. The KFA in turn wanted more direct involvement in the ordering of donor funded fertilizer imports to avoid ordering of unpopular types, ensure timeliness of arrivals and reduct storage costs. The agreement led to conflict of interest, because KFA, also importing commercially, preferred to sell its stocks first before turning to aid stocks supplied by government for sale on consignment basis. The agreement did not therefore achieve faster movement

of fertilizer down the distribution channels as anticipated as there were no incentives for KFA to minimize storage costs arising from high stock levels since such costs were underwritten by the government. However, the agreement increased KFA's effective margins and overall advantage over other distributors⁷⁰. There is no evidence that the agreement which thrived on aid fertilizer was of benefit to any other stakeholder other than KFA.

Take over of KFA by KGGCU

The 1970 Havelock report had recommended restructuring of the KFA to make it a national cooperative serving different parts of the country. Dissatisfaction with KFA's performance as the sole agent for distribution of government fertilizer encouraged GoK to support the formation, in July 1984, of another cooperative with full monopoly in grain marketing and distribution of agricultural inputs⁷¹. Following the formation of KGGCU, the Ministry of Cooperatives dismissed KFA's directors and the KGGCU took over KFA's assets and operations in December 1984. The sole agency agreement was then passed on to the new organisation.

The impending take over of KFA by KGGCU caused turmoil in the market, since the KFA could not order its share of commercial imports due to uncertainty regarding its future, and at the same time the KGGCU did not have the requisite experience to immediately play KFA's import function. Although donors and their commercial importers moved in to make for the shortfall so that national supplies were adequate, there were farmgate fertilizer shortages during the 1985 long rains because of delayed shipments and takeover stalemate right down the KFA distribution network. The 1985 long rains were the first rains following the 1984 protracted drought. KFA's exit and KGGCU's debut had therefore shocked the fertilizer sector at a critical time when the country was recovering from drought.

The agency agreement set the stage for the eventual replacement of the KFA by the KGGCU. The implementation of the agreement exposed KFA to the scrutiny of the government and opened the door for government dissatisfaction and accusations that eventually made the case for the replacement of KFA. The take over predisposed the new organisation to financial woes, because the new directors were taking over a wealthy organisation whose

⁷⁰. GoK sold aid fertilizer to KFA on consignment basis so that the latter only paid for quantities sold. For the rest, it charged GoK storage until all government stocks were eventually sold. In other words, KFA obtained interest free, risk free loans from the government to the tune of the total value of aid fertilizer held in its stores.

⁷¹. Many Kenyans felt that KFA had exploited its rather strong market position to make unacceptably huge profits at the expense of the farmer, a feeling given credence by the fact that some of KFA's directors were evidently very wealthy. KFA's may also have come to be associated with very rich independently minded individuals about whom the political leadership was uncomfortable. See also Bates R E (1989) *Beyond the Miracle of the Market: The Political Economy of Agrarian Reform in Kenya*. Cambridge, Cambridge University Press.

future seemed guaranteed since KFA enjoyed obvious government and therefore donor support all of which would be transferred to the new organisation. The new management may therefore not have appreciated the rather demanding management requirements of the organisations they were taking over. The take over made it difficult for the recovery of huge loans owed to its predecessor, most of them with the directors that were replaced.

GoK's Cancellation of Agency Agreement with KGGCU

By the time KGGCU took over KFA, there was already considerable donor pressure for GoK to cancel the agreement as some donors preferred to have their fertilizer distributed through the private sector. The GoK itself was already dissatisfied with the implementation of the agreement, and there was mutual appreciation of risks involved in continued reliance on a single agent for distribution of gradually increasing shipments of donor funded government fertilizer. The agreement was therefore cancelled in 1985.

Upon this cancellation, two different systems were used to transfer aid fertilizer, quantity bids being invited from the private sector who enjoyed a 15% margin off the Mombasa MRP payable within 90 days by cash through bank guarantee. KGGCU continued to lift government fertilizer on consignment basis and enjoyed a 10% margin off the Mombasa MRPs. There was also growing evidence of the need to shift from aid in kind to balance of payments support to promote more meaningful private sector participation and minimise distortions caused by donor fertilizer. The cancellation increased private sector participation in the distribution of aid fertilizer, and gave the KGGCU an opportunity to face the challenge of operating in a relatively competitive environment and test its future sustainability.

Formation of the Kenya National Fertilizer Association

In 1986, the Kenya National Fertilizer Association (KNFA) was established following negotiations between some segment of the donor community and the GoK⁷². The association was meant to promote policy related dialogue between the private sector and GoK, and strengthen capacity for improving service to farmers within the private sector. The association was also expected to facilitate exploitation of scale economies in research, production of common promotion material, and promotion of private sector discipline. The association has participated in the allocation of aid fertilizer to the private sector and raised

⁷². This was the second time that the private sector formed a business association, although the earlier one did not address policy, but was established for the express purpose of collecting fertilizer subsidies and preparing price proposals for consideration by the GoK through the Fertilizer Advisory Committee.

issues of concern to other stake holders in the sector .

Fertilizer Price Decontrol

By a GoK pronouncement through Legal Notice Number 421 released in December 1989, controls on fertilizer prices were lifted effect from January 1990.

The eventual fertilizer price decontrol was part of GoK's long term goal for the sector. This was in appreciation of the complications associated with setting meaningful price ceilings, partly due to nonavailability of adequate data on a timely basis, and problems of building into the pricing formular considerations for realistic wholesale and retail margins to promote as wide distribution as possible. The establishment of MRPs under the general price control order also perpetuated GoK's involvement in the sector, and created opportunities for reverse transfer pricing to circumvent problems of accessing adequate foreign exchange resources.

Price decontrol was also a major plank of the donor initiated policy discussions. The IFDC report preceding the FPMRP recommended price decontrol by the 5th year of the program, and one of the coventants for FPMRP required GoK to have, not later than February 28th 1990, completed a study on the potential for fertilizer decontrol, with the GoK reaffirming its commitment to eventual elimination of price controls, among other things. The World Bank, through the ASAO I&II, also insisted that the GoK undertook to decontrol fertilizer prices in the long term. The Netherlands withdrew from the fertilizer sector in 1989 due to what it saw as lack of GoK's reluctance to develop clear fertilizer policies⁷⁴. KNFA had, since its inception in 1986, written to GoK recommending phased decontrol, and had 4 months prior the decontrol, written recommending price decontrol at the retail level, in line with the MoA's thinking at the time. The MoA on its part had planned a phased fertilizer price decontrol, including an initial decontrol at the firm level as stipulated is the Sessional Paper No 1 of 1986. The ministry's draft policy paper on fertilizer pricing and marketing released in 1987 recommended decontrol of the prices of some minor fertilizer types such as trace elements and others used for flower and tobacco growing and as feedstock for liquid fertilizer formulations.

Still, the timing of the fertilizer price decontrol has been the subject of considerable speculation, as majority of the

⁷³. In March, 1994 for example, the association raised concern about the way the GoK/CEC fertilizer was priced and pointed out potential loopholes in the tendering procedures which inadvertently allowed several companies owned by one or group of the same individuals to tender to maximize total allocation.

⁷⁴. The Netherlands involvement is currently restricted to cofinancing World Bank initiated programs, some of which are within the agricultural sector. The actual price decontrol came shortly after the Netherlands withdrew from direct involvement in the fertilizer sector.

planners and technicians in the MoA and MoF seem to have been completely unaware that this decision was under active consideration. The decision was therefore restricted to only a few individuals, and it would seem that in decontrolling fertilizer prices at the time it did, the GoK timed the announcement of a widely acceptable policy reform to make possible for KGGCU to dispose of its heavy fertilizer stocks of government fertilizer accumulated through a variety of donor programs, and perhaps afford KGGCU an opportunity to assert its role as a market leader in the sector⁷⁵. GoK may also have wanted to exonerate itself from fertilizer price increases. Farmers had been alarmed by the very high MRPs published in November 1989. These MRPs had been estimated using BIP on the insistence of the donors and there was fear that this represented a new shift in pricing philosophy that implied a shift to higher price thresholds.

The fertilizer price decontrol was expected to expand retailing in rural Kenya and therefore promote fertilizer availability and application.

The fertilizer price decontrol came as a surprise to the private sector, farmers, donors and majority of the personnel in the relevant ministries. Following the decontrol, the KNFA hailed the decision, suggesting that the move would permit fertilizer retailing closer to the consumption points, promote competition within the private sector and therefore benefit the farming community. Studies to assess the impact of the decontrol showed that majority of the private sector, spoiled by years of administered prices, were apprehensive of their new pricing responsibilities.

After the announcement of price decontrol, the KGGCU, accounting for 30-45% of the fertilizer business lowered prices for all fertilizer products by an average of 18% in February 1990. Why this move? KGGCU was burdened by excessive fertilizer stocks accumulated over a two year period, which were moving rather slowly. The November 1989 price list developed using BIP to establish MRP showed a substantial increase from previous level, and there were real possibilities that subsequent fertilizer offtake would be marginal. Following price decontrol, therefore, KGGCU prepared its own price list giving discounts on all fertilizer products ranging from 3% for urea to 25% for DAP. KGGCU therefore used the price decontrol to offload excess fertilizer stocks and reassert itself in the market.

The price list released by KGGCU was applied to all buyers including small farmers, estates, retailers and other distributors, and there was no price differentiation reflecting true marketing realities in a decontrolled environment. In any case, KGGCU pricing resulted to prices below procurement cost for majority of participants in the sector, and there were doubts

⁷⁵. This never really happened, and the KGGCU appeared to have blown up this golden chance by charging prices lower than costs and therefore incurring huge losses. After disposing of existing stocks, the KGGCU almost went bust, and has since had problems participating in the market.

whether in fact the KGGCU itself covered the marketing costs of its commercial imports, and whether the pricing was a purely commercial decision. Further, KGGCU's pricing following decontrol occasioned heavy losses for Murang'a and Machakos cooperative unions⁷⁶. This was unfortunate considering the unions' role in ensuring availability of reasonably priced inputs to farmers. Nevertheless, the price decontrol opened the door for competitive pricing and promotion of distribution to the more remote parts of the country.

Table 6: KGGCU's RETAIL PRICES RELEASED IN JANUARY 1990
RELATIVE TO MAXIMUM RETAIL PRICES RELEASED BY GOK
DURING NOVEMBER 1989, SELECTED FERTILIZER PRODUCTS

FERTILIZER PRODUCT	OFFICIAL GOK PRICES (KSHS/MT)	KGGCU LIST PRICE (KSHS/MT)	DISCOUNT OF KGGCU PRICES FROM GOK PRICES(%)
CAN	4,797	3,848	20
UREA	5,353	5,188	3
DAP	8,357	6,280	25
20-10-10	6,662	5,166	22
25-5-5+5S	6,510	5,300	19
20-20-0	6,472	5,166	20
AVERAGE			18

Note: Prices are FOB Mombasa
Source: IFDC(1990) The Impact and Expected Consequences of the Fertilizer Price Decontrol in Kenya. Under Contract by the Agency for International Development.

⁷⁶ Estimates using information provided by Murang'a District Cooperative Union indicated that for 2000 mt of NPK 20-10-10 and 4000 mt of 20-20-0 imported by the union under a World Bank funded CIP arrangement, the union's cash cost excluding overheads and margins exceeded KGGCU's retail prices for both types by kshs 20 per mt. Machakos union had 3000 mt of these ex-World Bank fertilizer types and faced similar costs. Their experience was rather unfortunate as this arrangement was expected to serve as a test case and provide feedback in refining modalities for balance of payments approach to fertilizer aid.

Chapter 10

MAJOR ORIENTATIONS IN THE FERTILIZER SUBSECTOR

Preoccupation with Smallholders

The Kenyan farming community is smallholder dominated and smallholder production occupies centre stage in the country's agricultural policy dialogue. In 1985, there were 2 million smallholders, 75% of them with less than 5 acres under crops⁷⁷. Between them, these smallholders absorbed 90% of the country's farming population, accounted for 75-85% of total agricultural employment, 60% of marketed coffee, 35% of tea, 45% of maize and sugarcane, and all marketed rice, pyrethrum, cotton and pulses⁷⁸. The population of smallholders has since then increased significantly due to further subdivision of large group owned farms and family holdings.

Smallholder fertilizer application began early 1960, well after application on estates and large holdings, but grew rapidly following subdivision of formerly European owned estates, the introduction of improved seed varieties especially hybrid maize, and the granting of approval for smallholders to grow coffee and tea. Consequently, the national fertilizer application grew faster than 7.5% annually during 1963-71. There after, application initially stagnated and before beginning a downward trend following rapid fertilizer cost escalation precipitated by crude oil prices compounded by GoK's inability to retain explicit fertilizer subsidies. Planning documents openly acknowledge that the smallholder sector embodies the greatest potential for increasing fertilizer application since it was in this subsector where gapping differences between recommended and realised fertilizer application abound⁷⁹.

These smallholders are considered vulnerable with regard to fertilizer access. Majority of them traditionally produce low value foodcrops for which the value cost ratios related to fertilizer application are generally unattractive. The

⁷⁷. About three types of holdings are identifiable in Kenya, namely, the super smallholders with a maximum of 1 hectare under crop, mainly for subsistence; commercial smallholdings covering 1-10 hectare under crop, mainly cash crops with the more marginal strips of land dedicated to food production for own use; and the medium holdings large holdings and estates with more than 10 hectares under crops, mainly cash crops.

⁷⁸. World Bank (1985) Kenya: Agricultural Inputs Review Volumes II & III Working Papers. Report No. 5643-RE.

⁷⁹. Estimates suggest that while fertilizer applications largeholders and estates approximated recommendations in the 1980s, smallholders applied only a third of recommendation on coffee and tea, and between 5-60% on maize. See also Republic of Kenya (1986) Economic Management for Renewed Growth. Government Printer, Nairobi.

smallholders are also more costly to supply as they are widely spersed and apply only meagre quantities due to the low level nature of their operations. When national fertilizer quantities are inadequate, dealers choose to only supply the largeholders and estatest where there are distributional scale economies.

In recognition of the importance of smallholder production and observed inadquacy of this subsectors fertilizer application, the GoK commissioned working parties to explore constraints to smallholder fertilizer application and promotion of smallholder fertilizer use became a major GoK policy preoccupation since independence in 1963. This preoccupation accounts for the introduction of fertilizer subsidies during the early 1960s and fertilizer price controls in the middle of the 1970s to make fertilizer more affordable to the smallholder sector, greater preference by GoK for the cooperative movement in the distributing donor funded government fertilizer, and the granting of the sole agency agreement for sale of GoK fertilizer to the KFA with wider distribution network and superior ability to supply the widely dispersed smallholder sector.

GoK's concern over smallholder access to fertilizer overshadowed other important considerations for the fertilizer subsector such as development of the fertilizer market and sustained GoK's distrust for the private sector whose corporate objectives such as profit maximisation were considered an impediment to the private sector's ability to cater for the peculiar needs of the smallholder subsector. The preoccupation with the smallholders further precipitated conflict within the donor community, some of the donors chosing to support GoK's attempts to ensure access to adquate fertilizer supplies by the smallholders through the KFA with its wide distribution network and through other localised cooperative unions with more direct access to smallholder farmers. Other donors, led by the USAID, got convinced, following extensive studies to explore constraints to the development of the fetilizer sector, of the need to use their fertilizer programs to promote the development of the fertilizer market. The donors were therefore unable to develop a common objective for their individual fertilizer programs, and the strategies for meeting the short term objective of satisfying the fertilizer needs of the smallholders were often in conflict with those for promoting the development of the market⁸⁰. This compounded negotiation for the eventual liberalisation of the fertilizer market.

• Government policies in the post liberalisation period indicate continued GoK concern over smallholder access to

⁸⁰ . The development of the fertilizer market was not necessarily in conflict with efforts to address the fertilizer needs of the smallholders. Getting the private sector back to the fertilizer subsector, one of the strategies for promoting development of the fertilizer market was expected to, when combined with adquate margins to allow recovery of costs tied up in the smaller bags and in distributing to the more remote part of the country, make possible for greater smallholder access to fertilizer. However, GoK's preference to KFA/RGGCCU to ensure the likelihood of smallholder access to fertilizer products on better terms gave KFA/RGGCCU monopoly powers and went against the eventual development of the fertilizer development.

fertilizer products⁸¹, and the extent to which fertilizer liberalisation will be considered a success by GoK will critically depend on how the smallholders will have fared under liberalisation.

Sudden Changes in GoK's Fertilizer Strategies

The fertilizer subsector has suffered periodic shocks resulting from sudden shifts in GoK's strategies. These shifts were precipitated by different circumstances and considerations, but invariably changed the short term expectation of other stake holders and send the fertilizer subsector into immediate disarray. We discuss three examples of these shifts and their related shocks below.

During 1974/75, the GoK cancelled all fertilizer import licences thereby withdrawing the private firms' permission to import, and directly imported fertilizer for distribution to the farming community. The cancellation resulted from what GoK considered betrayal by the then fertilizer companies who kept fertilizer prices high to recoup previous trading losses at a time when the international fertilizer prices were falling. A high pricing structure was considered unjustifiable and was interpreted as unwillingness by the private sector firms to cooperate in confronting the difficult circumstances precipitated by the oil price escalations. These fertilizer import licences had just been introduced to conserve foreign exchange and regulate fertilizer products coming into the country, and their cancellation eroded the credibility of government fertilizer subsector strategies and administrative reforms.

The cancellation shifted public opinion against the private sector, actualised GoK's private sector distrust and complicated future private sector participation in the fertilizer market. It further made the case for GoK's direct involvement in fertilizer importation, further marginalising the role private firms in the fertilizer subsector. The KNFC, nominated by GoK to distribute government imported fertilizer, proved unable to cope with its new merchandising responsibilities having had limited marketing experience. This cancellation of import licences and direct fertilizer importation by GoK significantly reduced any prospects for future participation by private interests in the subsector, spirked off withdrawal of multinationals from the sector, revealed the ill-preparedness of the cooperative movement as a potential substitute for private sector, and threw the fertilizer market into disarray, jeopardising rather than ensuring farmers' access to fertilizer in the immediate future. Following frustrations with the KNFC and the Ken-Ren project, GoK begun encouraging private sector firms to apply for fertilizer import licences and aggressively sought out donor assistance to rebuild

⁸¹. The National Food Policy, prepared only this year, talks about strengthening measures for increasing fertilizer application especially among the smallholders.

capacity for fertilizer importation. By the time, the fertilizer market had been critically disrupted and was in dire need of reconstruction.

The take over of KFA by KGGCU during December 1984 was a further shock to the fertilizer market. KFA, assisted by the sole agency agreement for distribution of increasing volume of donor funded government fertilizer, accounted for the lions share of the market. Tension developed between the KFA and GoK regarding the way donor fertilizer was handled, the KFA raising concern about its meagre role in the ordering of donor funded fertilizer leading to untimely shipment and ordering of fertilizer products unpopular with farmers. The government in turn was concerned about KFA's inability to repay GoK promptly following sale of fertilizer and what it considered gross financial mismanagement of the association. Other considerations strengthened the case against KFA⁸².

The take over caused anxiety about the ability of the fertilizer market to perform in the immediate future, considering the dominant role KFA had played in market. There was also widespread suspicion that the take over was politically motivated, raising private sector's concern about the government's seriousness in addressing national fertilizer problems⁸³. In the period prior to the take over, KFA was unable to order its share of fertilizer imports because its future was uncertain. At the same time, the newly formed KGGCU did not have any merchandising experience and was therefore not able to immediately fill the gap left by KFA. The actual take over of KFA by an organisation that wielded open GoK support sent ripples down the fertilizer sector, making the few private sector firms still holding on to the sector uncertain about their future role. In the circumstance, fertilizer could not reach farmers in time at a time when the economy was recovering from the severe draught of 1984. In any case, this government supported take over further shocked the fertilizer subsector, forcing private sector stake holders to doubt the governments commitment to the development of the sector, and to put on hold any fertilizer related investment plans.

A recent addition to this catalogue of shocks precipitated by apparent shifts in GoK's fertilizer subsector strategies was sparked off by the fertilizer price decontrol announced during December 1989 to take effect in January 1990. Although eventual fertilizer price decontrol was part of the reform negotiations between the GoK and an important segment of the donor community

⁸². See also footnote number 70.

⁸³. In particular, there was suspicion that KFA was standing on the way of powerful private parties interested in dipping their hands into the huge resources that resulted from the association's corporate operations, and that there was therefore need for an organisation that was more manipulable. Recent press reports about the KGGCU's heavy losses through unrepaid credit held by powerful individuals seem to confirm these earlier suspicions.

led by the USAID with World Bank's backing, this was to be approached progressively and was to result from specific studies to ascertain its viability and optimise its timing. The government's fertilizer pricing and marketing policy released six months prior to the decontrol scuttled the price decontrol issue by proposing refinement of the mechanism for establishing and releasing the maximum retail prices for the scheduled centres⁸⁴, and the MoA was, at the time of the decontrol, developing modalities for decontrolling prices at the retail end of the market in line with previous government policies⁸⁵. The fertilizer price decontrol was therefore least expected and although it was a major component of future fertilizer reform agenda, its timing was a definite shift from expectations and heavily influenced by other extra- sectoral considerations⁸⁶.

The price decontrol and subsequent pricing behaviour by the KGGCU caused immediate uncertainty in the fertilizer market. For the first time in about 15 years, the responsibility for setting prices reverted to importers and distributors. Assessments of the impact of the price decontrols revealed that some of the firms were struggling under this new responsibility, having been shielded against sloppy pricing by the government administered prices. KGGCU's pricing behaviour following decontrol also raised concern about the credibility of the policy change, and majority of importers and distributors suspended investment plans while waiting to see how things would shape up in subsequent seasons.

The fertilizer price decontrol decision, ostensibly taken to help KGGCU further strengthen its role in the market and its financial base, worked against KGGCU which failed to make proper use of the golden opportunity, and partly accounts for KGGCU's subsequent inability to participate in the market, and denial of the farming community the services of the only organisation with the largest fertilizer distribution network. KGGCU's pricing behaviour following the price decontrol also inflicted heavy losses on the Muran'ga and Machakos farmers district cooperative unions which could no longer profitably sell their fertilizer imports. The unexpected price decontrol and subsequent events sent ripples across the fertilizer subsector, eroding the cooperative movements role in the sector. Subsequently, the private sector has been moving quickly to fill in the gap temporarily left by the KGGCU, and the dust raised by the timing of the price decontrol appears settled until the next shock resulting from the next GoK's sudden shift in its fertilizer sub-

⁸⁴. These included the application of a benchmark international c&f price, building in sufficient margins to encourage distribution outside the main centres, making frequent price reviews so that world price trends can be translated into farmgate prices, and monitoring retail prices outside the main centres to make possible for remedial if and when local shortages are detected.

⁸⁵. See for example Republic of Kenya(1986) Economic Management for Renewed Growth. Nairobi, Government Printer.

⁸⁶. See earlier material on possible factors that may have influenced the price decontrol decision, presented in chapter 8.

sector strategies.

Preference for Cooperative Organisations

Cooperatives were introduced in Kenya at the turn of this century to meet the inputs and crop marketing needs of the white settler farmers. They were also, at the time, considered important in regulating input and produce markets to secure and maintain the living standards of the settler community. By independence, majority of the main cooperatives had evolved into nation wide quasi-commercial organisations, operating as cooperative and public companies generally outside cooperative rules⁸⁷. The movement grew rapidly after independence.

Cooperatives have comparative advantage in the procurement of input supply due to the potential for pooling of input requirements of farmers saving them time and transport costs related to individual purchase from main trading centres. This is complimented where cooperatives also serve as channels for credit in-kind. This credit link permits the supply of inputs in areas out of reach for ordinary traders. Where cooperatives control produce marketing, opportunities for reducing default rates are higher⁸⁸. When cooperatives are able to develop apex bodies, this increases the possibilities for bulking of input orders allowing further exploitation of scale economies in input procurement⁸⁹.

These potential benefits form the basis for GoK's preference of the cooperative movement in the fertilizer subsector to increase the likelihood of achieving major sectoral objectives such as promoting fertilizer application and keeping fertilizer costs low. In a broader sense, GoK views cooperative movement as an instrument for mobilising mass participation in national development activities, and an important link in translating policies into rural development programs. Since the cooperatives are well distributed through much of the smallholder farming areas, they are often the only sources of input supplies within close proximity to the farming communities.

Resulting from these perceived advantages, the GoK, following dissatisfaction with the performance of private firms in mid-1970s, nominated the KNFC to distribute government fertilizer, gave the sole agency agreement of the KFA/KGGCU, and continues to look to the cooperative movement to regulate the fertilizer market. In pursuit of this, GoK's policy documents

⁸⁷. The main ones were the Kenya Farmers Association, the Kenya Cooperative Creameries, and the Kenya Planters Cooperative Union.

⁸⁸. This is because of this arrangement create unique opportunities for interlinking credit and produce markets, and for reducing information asymmetries that otherwise impede the development of credit markets.

⁸⁹. Much of the material in this section was influenced by Clift C 'Role of Cooperatives in Input Supply' in World Bank (1986) Kenya: Agricultural Input Review. East Africa Projects Office, Central Agricultural Division, the World Bank, pp 32-60.

invariably mention the role of cooperatives in the development of efficient and competitive fertilizer marketing arrangements⁹⁰. Reliance on the cooperative movement in realising fertilizer subsector goals has therefore been a major orientation of fertilizer marketing in Kenya, with GoK sustaining its courtship with the cooperative movement despite occasional disastrous performance of cooperative organisations⁹¹.

Low Fertilizer Cost Stance

For many years, GoK has been striving to keep fertilizer prices low to promote application and increase agricultural production⁹². This is because GoK sees the farming community as an important vehicle in Kenya's development process, given the dominance of agriculture in the economy. Past efforts to keep fertilizer prices low were translated into the introduction of explicit fertilizer subsidies withdrawn after 10 years because they were found not to benefit the smallholders, putting fertilizers under the general price control order so that all fertilizer subsequently sold in the country became subject to government administered price ceilings, allowing duty free fertilizer importation, and indirectly subsidising fertilizer cost by making it available to cooperative organisations such as KFA/KGGCU under preferential terms⁹³.

The desire to keep fertilizer prices low accounts for the GoK's preference for cooperative organisations better able to identify with farmer's concerns over private sector driven by the profit motive, made necessary for GoK to occasionally shift its strategies about the fertilizer subsector in an apparent attempt

⁹⁰. For example during the 1979-83 plan period, the GoK undertook to promote the development of competitive input and produce markets by encouraging competition between the private, public and cooperative sectors. In the 1986 Sessional Paper on Economic Management and Renewed Growth, GoK was to continue licensing established fertilizer importers and distributors including KGGCU, cooperatives with enough capacity and private firms with demonstrable competence in the field. The 1989-93 Development Plan further proposed improvement of channelling of fertilizer through the 'private' sector through greater reliance on cooperatives and indigenous entrepreneurs; while proposed strategies for keeping fertilizer prices low under the 1994 National Food Policy include encouraging cooperatives, farmer companies and farmer groups to import fertilizer for their members.

⁹¹. The GoK was first let down by the KNFC which had been nominated to distribute government fertilizer in the mid-1970. Attempts to rely on the KFA/KGGCU appear to have also met with frustration.

⁹². The farming community is also an important constituency whose opinion is considerably decisive. The political leadership would therefore have some incentive for deliberately minimizing the likelihood of the farming community's dissatisfaction with input costs. One way of such minimisation is maintaining some control over prices.

⁹³. It is however doubtful that the cost plus basis for establishing price ceilings generated prices lower than otherwise, as the pricing procedure permitted different fertilizer importers to declare their own procurement costs. Potential collusion with overseas suppliers generated c&f prices considerably greater than actual international prices. Possibilities for exploiting such collusion were especially high during times locally available government allocated foreign exchange was tight.

to protect farmers' interests as evidenced by the decision to get directly involved in fertilizer importation and distribution, lifting of fertilizer price controls following evidence that the revised pricing mechanism was generating higher than acceptable prices and timing such price decontrol to give the KGGCU an opportunity to lower prices.

This low fertilizer price stance therefore precipitated shocks that put fertilizer market into disarray. GoK's low fertilizer cost objective was also in conflict with attempts to widen fertilizer distribution to cover more remote parts of the country by building in higher retail margins in the fertilizer pricing structure, and was an impediment to creation of profitable opportunities necessary for attraction of private interests and eventual development of the fertilizer market. This stance also made GoK apprehensive about the private sector whose corporate objectives were considered irreconcilable with low fertilizer prices, and made the fertilizer market reform negotiations more complicated. This stance is unlikely to have been completely abandoned following the recent liberalisation of the fertilizer market.

Development and Liberalisation Fertilizer Marketing

At the turn of the 1980's, the fertilizer market was in utter disarray, most of private interests having altogether withdrawn from the subsector owing to diminished opportunities for profitable participation resulting from extensive government involvement and monopolistic tendencies by KFA supported by the sole agency agreement with GoK. Increased donor involvement with fertilizer aid in kind and technical assistance for carrying out sectoral studies opened up opportunities for increasing awareness about what needed to be done to sustainably improve fertilizer procurement and distribution. Policy dialogue between GoK and part of the donor community led by the USAID began to centre around the development of a fertilizer market with sufficient incentives for increased private sector participation. Some donor funded fertilizer supplies were distributed with this objective in mind⁹⁴. The initial objective of development of the fertilizer market was gradually modified to include full liberalisation of the market, including removal of GoK's direct role in the fertilizer procurement, distribution and pricing.

GoK had, under the 1979-83 development plan, undertaken to support and develop competitive markets by ensuring that its participation and legislations encouraged marketing arrangements permitting competition between different participants in agricultural input and produce markets. Under the 1984-88 plan period, GoK further undertook to put in place better management and administrative procedures to promote efficient resource use.

⁹⁴. Other GoK fertilizer sector concerns were in conflict with this broad market development objective, and made it difficult for the donor community to develop a common vision about the best application of their programs.

In addition, GoK undertook to allow retailers outside the main trading centres to set own prices to make fertilizer distribution in the remote parts of the country more profitable. During the 1989-93 plan period, GoK was to reenter the fertilizer marketing system more competitive to allow efficient fertilizer distribution and make provision for better profit margins.

Encouraged by the donor community, the GoK prepared a specific fertilizer pricing and marketing paper spelling constraints facing the fertilizer subsector and making proposals on how these constraints were to be addressed. As part of the policy proposals, the GoK undertook to liberalise fertilizer importation in the long term, limiting its role to monitoring for quantities and types imported. There after, a segment of the donor community led by the USAID employed its fertilizer programs to encourage GoK to pursue policy proposals stipulated in the subsector's policy paper. As it turned out, fertilizer price controls were lifted later during the same year in which the policy paper was released, and import allocations, import licensing, and foreign exchange allocations abolished during subsequent years. Liberalisation of the fertilizer market, initially identified by the donor community and adopted by GoK as one of the major long term goals for the subsector, was realised way ahead of plan.

The development and liberalisation of the fertilizer market which were major orientations of fertilizer policy dialogue during most of the 1980s, benefitted from donor funded in-depth studies that sought to inform donors and the GoK on the constraints to the development of the fertilizer market, and from assisting GoK to officially spell its understanding of the constraints and what needed to be done to improve fertilizer marketing. This process promoted pooling of understanding on the requisite policy measures, giving an opportunity for donors to thereafter tailor their fertilizer assistance to help GoK achieve its goals for the fertilizer subsector.

Chapter 11

SUMMARY AND RECOMMENDATIONSSummary

The government was, at the beginning of the 1980s, heavily involved in the fertilizer market and determined fertilizer types, quantities to be imported and prices to be paid by farmers. It was receiving aid fertilizer through bilateral donor programs which helped conserve scarce foreign resources and increased national fertilizer supplies. These programs were also of interest to the donors since they promoted commercial interests of donor countries. The KFA, which had a large network of distribution outlets and had been granted sole agency for distributing government fertilizer available through donor programs, had near complete monopoly of the market. Most private interests had backed off from the market concerned about diminished profitability resulting from enhanced government involvement. The market was drifting aimlessly.

Donor involvement in the market made possible for the donor community to better appreciate the needs of the sector and to engage the GoK in a sustained dialogue to address the developmental needs of the sector. As a result of these GoK-donor exchanges, the sole agency agreement between the KFA/KGGCU and the government was cancelled in 1985, and shortly afterwards, other private interests and cooperatives began to have access to donor funded government fertilizer, paving the way for the increased private sector participation in fertilizer trade. A year later, the GoK, with the encouragement of the donors, facilitated the formation of a trade association consisting of fertilizer importers and distributors. This association was meant to promote policy exchanges between private interests and GoK, and to increase capacity for giving improved service to farmers.

GoK's planning documents in the last 13 years dedicated space to discussions on the policy requirements of the fertilizer subsector. In the Sessional Paper Number 1 of 1986, there was, for the first time, a specific section dedicated to fertilizer policy. But it was in 1989 that the GoK, encouraged by a segment of the donor community led by the USAID, released a fertilizer pricing and marketing policy document spelling out its vision about the sector, the first policy document to exclusively propose ways for improving fertilizer pricing and marketing. In the subsequent years, a segment of the donor community expanded on GoK's policy statements and built them into specific requirements for future fertilizer programs. In January 1990, the GoK decontrolled fertilizer prices a head of schedule, opening the sector to competitive marketing. Two years later, the foreign exchange markets were liberalised and quantitative restrictions removed, thereby fully liberalising the fertilizer market.

Firms dealing with fertilizer now carry out all functions necessary for procuring different fertilizer products and making them available to farmers. There is free entry to and exit from the market, as well as competition at all levels of the sector. There are strategic interactions and posturing, and firms now rise or fall depending on level of efficiency and managerial foresight, rather than administrative support. The multinational companies are now showing active interest in the market, and although farmers are not sure whether producer prices will continue to match fertilizer prices, fertilizer is now widely available in the countryside.

The fertilizer market is now one in which competitive forces can fully influence market outcomes, quite different from what it was in 1980 when the main marketing functions were administratively determined by GoK. GoK and USAID's fertilizer policies were generally mutually enforcing, and the GoK received considerable encouragement from the donor community in the gradual process of establishing private sector participation and unleashing of market forces. USAID's fertilizer programs which consistently targeted the market development needs of the sector, were critical in the evolution of fertilizer market since 1980.

Other than the USAID-led market development and liberalisation negotiations, there were other important orientations that characterised the fertilizer subsector. Among these were GoK's preoccupation with smallholders, low fertilizer costs, and preference for cooperative organisations over private sector firms. The fertilizer subsector was also subjected to shocks resulting from sudden shifts in GoK's strategies for fertilizer procurement and distribution, including withdrawal of fertilizer import licences, takeover of KFA by KGGCU, and unexpected decontrol of fertilizer prices. These orientations were not always consistent with the broader vision about the subsector. The eventual full liberalisation of the fertilizer market is a unique achievement in an economy still characterised by extensive state interventions.

Recommendations

What lessons can we draw from the liberalisation of the fertilizer market on how negotiation for reform should be approached!

Thoroughly Research the Reform Object

Reform efforts must be informed by extensive and sustained investigation, through detailed studies, on the peculiarities of the object of reform. These studies should specifically seek to rationalise the reforms. Where there is external input, generous technical assistance should be expended in generating and publicising information on the reform object. The results from such studies should then be used to inform majority of stakeholders to begin to develop a consensus about the need for the reform.

Governing Authority Should Spell Out the Reforms Needs

The governing authority has to develop and spell out its vision about the reform requirements, and then be assisted by other stake holders to realise its vision. Such vision, translated into policies and programs, need to draw from the results of studies of the reform object, so that it can be part of a shared understanding on the reform needs. Once the vision has been firmly established, mobilisation of support from other stake holders and insistence on its pursuit become more probable.

Target Donor Assistance on Specific Reform Components.

Depending on initial condition and the potential for conflicts or complementarity, achievement of full reform can be difficult and time costly. Increasing the possibility for timely reforms results requires early identification of important reform components so that assistance can be targeted at the first opportunity, using judicious selection of carrots and sticks to direct the reform programs and dialogue to optimise cumulative reform benefits.

The following general recommendations are for further improvement and strengthening of the fertilizer marketing:

Develop Credit Lines for Stockists

The village stockists/retailers with more direct commercial contact with farmers, especially smallholders, continue to play a crucial role in the fertilizer distribution network. Unfortunately, fertilizer products are costly to procure and store, and majority of the stockist, required to pay for fertilizer supplies on cash basis, are unable to benefit from emerging quantity discounts due to limited ability to purchase full fertilizer requirements. Although there is an elaborate network of potential fertilizer stockists, this part of the market cannot on its own develop fast enough unless stockists are anables to buy their fertilizer requirements as and when they want. Counter part funds available from future donor fertilizer programs could be recycled to assist in designing fully commercialised credit schemes tailored to fertilizer stockists' credit needs. This could include provision for the initail development of a fertilizer stocking pilot program to determine stockists' fertilizer related credit needs before full popularisation. Sustainability of such a program will require deliberate avoidance of direct and indirect subsidies and securing of participation of larger distributors. On this account, the proposed credit scheme should be preceeded by a study to recommend modalities for maximising sustainability³⁵.

³⁵. This recommendation shows up in a number of fertilizer reports but has never been fully adopted for implementation.

Promote Further Market Contestability

Following price decontrols and liberalisation of foreign exchange markets, there is evidence of considerable entry and exit especially at the downstream end of the market. Upstream, however, there are opportunities for larger importers to earn economic rent by exploiting unique supplier arrangements, strategic alignments including falling back on powerful connections, and exploitation of preferential access to privileged information. Ability to derive economic rent occasions farmer exploitation and resource maldistribution as the resultant market distortions inhibit the ability of prices to reflect true relative scarcities. Such opportunities can be reduced by creating an environment of perpetual potential entry by new firms and exit by existing firms, creating incentives for commercial discipline by the latter and giving potential entry of new firms an opportunity to regulate the market. This requires further simplification of licensing procedures and minimization of other transactions costs such as may result from international fertilizer market information acquisition, publication of important local information such as stock levels and fertilizer demand forecasts, and sustained monitoring and dispersion of opportunities for potential market exclusiveness including collusive behaviour.

Make the KNFA More Sustainable by Changing its Management Format

Since its formation in 1986, the Kenya National Fertilizer Association has played an important role in strengthening private sector participation and drawing GoK's attention to areas of policy and administrative concern. Unfortunately, the reputation of the association has occasionally been called to question due to conflict of interest arising from the fact that members of the association's executive are fertilizer importers in their own right. To resolve this potentially damaging arrangement, an independent secretariat is required to administer the association's business without giving undue advantage to fertilizer firms connected with persons participating in the running of the association. Such a secretariat could be modelled after the Kenya Association of Manufacturers, but tailored to the peculiar requirements of fertilizer trade.

Target Donor Assistance to Develop 'Public Goods' Side of the Sector

Donor programs and policy exchanges have been instrumental in putting the fertilizer market on track. There are however peculiar aspects of fertilizer sector that are best handled extramarket. These include improvement of the regulatory environment including appropriate legislations, development of business support services, securing of strategic reserves, monitoring the impact of fertilizer use on soil quality and productivity, and development of alternatives to chemical fertilizers. Returns from donor programs could be increased by

assisting GoK in addressing these public goods aspects of the sector.

Empower the Fertilizer Inputs Branch

The Fertilizer Inputs Branch has in the past been the subject of considerable policy attention primarily in recognition of its potentially heavy responsibilities regarding monitoring and guiding the subsector, and advising GoK on matters touching on fertilizer. It therefore forms part of the nerve centre for the subsector. However, the branch's capacity to develop scopes of work and respond quickly to information requests by either GoK or the private sector is in dire need of further strengthening.

Promote Greater GoK and Donor Consultation

The reform process for the fertilizer subsector would have been smoother with increased interaction between donors and GoK in developing a mutual vision and consensus about future developments in the subsector. Given the likelihood, however meagre and modified, for future donor participation in the subsector, there will be need to develop a mechanism for greater interaction and consultation between the parties concerned including the GoK, donors and the private sector to synchronise efforts and work towards a mutually understood common goal.

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Appendix A: BASIC FERTILIZER AND OTHER RELATED DATATable a.1: Fertilizer Imports, Carryover Stocks
and Consumption
(Metric Tonnes)

YEAR	COMMERC. IMPORT	DONOR SHIPMENTS	TOTAL IMPORTS	ESTIMATED CONSUMP.	CARRYOVER STOCKS
1993	166,000	107,000	273,000	244,173	28,827
1992	175,673	72,143	247,816	232,896	14,920
1992	169,965	74,100	244,065	252,087	(9,022)
1991	76,094	106,912	220,592	212,215	8,377
1989	74,000	111,519	212,638	237,000	(24,302)
1988	148,632	172,724	321,356	272,000	49,356
1987	82,950	142,315	225,265	238,000	(12,735)
1986	148,049	82,000	230,049	227,000	3,649
1985	199,552	145,589	345,141	138,118	107,023
1984	133,329	73,100	206,424	175,328	31,096
1983	188,160	25,148	213,308	142,785	70,523
1982	150,500	54,671	205,171	136,423	60,739

Source: Ministry of Agriculture, Livestock Development and Supplies, Nairobi.

Table a2: Fertilizer Consumption, Prices Trends and Producer Prices

YEAR	FERT. CONSUMP INDICES	FERT. PRICE INDICES	NOMINAL COFFEE PRICES	NOMINAL TEA PRICES	NOMINAL MAIZE PRICES	NOMINAL WHEAT PRICES	GDP DEFLATOR
1993	88.4	310.1	9886.0	9241.5	810.4	565.0	2.934
1992	93.9	233.6	4936.0	4750.0	474.7	560.3	2.513
1991	144.7	212.4	4654.0	3848.0	305.0	500.0	2.224
1990	146.6	202.3	3636.0	3521.0	261.7	450.0	2.010
1989	158.4	167.2	4312.0	2717.0	274.0	342.8	1.849
1988	271.7	155.7	4405.0	2037.0	214.0	340.6	1.703
1987	224.1	151.4	3662.0	2500.0	209.0	295.0	1.549
1986	162.4	151.4	5020.0	3382.0	198.0	293.0	1.431
1985	186.0	142.5	3972.0	3366.0	187.0	271.0	1.287
1984	109.9	105.0	3844.0	5184.0	175.0	269.0	1.187
1983	95.8	104.4	3488.0	2184.0	154.0	222.0	1.089
1982	100.0	100.0	2780.0	1941.0	107.0	188.0	1.000
1981	110.6	93.2	2258.0	1774.0	100.0	167.0	0.983
1980	76.50	80.7	2634.0	1591.0	95.0	164.0	0.921

Note: Nominal producer prices are in Kshs per 100 kg and are for the calendar year. They may differ therefore from those for crop year

Source: Republic of Kenya; Economic Survey, Nairobi, Government Printer, 1986, 1991, 1993 & 1994. issues.

Table 2a cont.

YEAR	REAL COFFEE PRICES	REAL TEA PRICES	REAL MAIZE PRICES	REAL WHEAT PRICES
1993	3369.5	3149.8	276.2	192.6
1992	1965.2	1890.2	188.9	222.9
1991	2092.6	1730.2	137.1	224.8
1990	1809.0	1751.7	130.2	223.9
1989	2332.1	1469.4	148.2	185.4
1988	2586.6	1196.1	125.8	200.0
1987	2364.1	1613.9	134.9	190.4
1986	3508.0	2363.4	138.4	204.8
1985	3086.2	2615.4	145.3	210.6
1984	3238.4	4367.3	147.4	226.6
1983	3202.9	2005.5	141.4	203.9
1982	2780.0	1941.0	107.0	188.0
1981	2297.1	1804.0	101.7	169.9
1980	2859.9	1727.5	103.1	178.1

Note: Real prices obtained by adjusting nominal prices using the GDP deflator.

Appendix B

PERSONS CONTACTED

Lawrence M Kimilu	Kenya National Trading Cooperation	Nairobi
Henry Ogola	Chemagro	Nairobi
Pienaar K Sogomo	KGGCU	Nakuru
Dick Kamau	FAGS	Nakuru
Benson M Gatheca	Benchem	Kitale
Prafui L Shah	Super Expo	Kitale
Najib Jiwa	Saboti Stores	Kitale
Masaki Koito	Japanese Embassy	Nairobi
Lee Ngugi	Mea Ltd	Nairobi
Valab Patel	Devji Meghji	Nairobi
Boris Tismiensky	Chemical Engineering Consultants	Nairobi
Ghajan Pathmanathan	World Bank	Nairobi
Amukoa	Fertilizer Inputs Branch, MOA	Nairobi
Elizabeth Kimenyi	Fertilizer Inputs Branch	Nairobi
John Karanja	Agr. Sector Management Program 2	Nairobi
Kigo	Murang'a Farmers District Coop. Union	Nairobi
Muiruri	Murang'a Farmers District Coop. Union	Nairobi
Jamal	Combined Warehouse Ltd	Mombasa
H.S Noormohamed	Combined Warehouse Ltd	Mombasa
David Soroko	USAID/Kenya	Nairobi

Appendix C

PURPOSE OF WORK

The purpose of this scope of work's implementation is to review, document and analyse USAID's involvement in Kenya's fertilizer subsector since 1980. This involvement will be assessed with respect to GoK, other donors, the private and public sector policies, institutions and activities. The impact of exogenous conditions on USAID involvement will also be assessed. As a result of this scope of work implementation, USAID will better understand Kenya's fertilizer subsector liberalisation process and the roles different actors played in that process.

STATEMENT OF WORK

The contractor shall:

1. Become familiar with and use USAID/Kenya/AGR's library of fertilizer documents. Identify and explore other sources of documentation such as the Ministry of Agriculture, Livestock Development and Marketing's libraries, donor libraries, research institutions and so on. Interview government academic, donor and private trade representatives as well as farmers and fertilizer consultants to enhance the evaluations knowledge base.
2. Briefly describe the history of Kenya's fertilizer market since independence. Although the overall evaluation will focus on the year 1980 to the present, this history will provide an interesting perspective. Describe the institutions involved, changes in the agricultural sector that affected these institutions, government policies, international fertilizer market trends, macroeconomic trends, etc.
3. Establish a time line identifying USAID/Kenya's fertilizer projects and programs since 1980. Describe the projects purpose, planned resources (fertilizer, commodity, technical assistance and training), delivered resources, conditionalities or covenants, project assistance dates, commodity disbursement dates, etc.
4. Establish a time line identifying major GoK planning documents from the period 1980 to the present. These documents could include Sessional Papers, Development Plans, Policy Papers, documents resulting from special studies, working groups or commissions; or other documents in which the government outlines fertilizer and agricultural sector policies and plans. Include in the time line statements and policies that dealt specifically with fertilizer. Pay specific attention to any decisions affecting institutions (public, private and parastatals) involved in fertilizer distribution. Decisions could include such things as foreign aid arrangements, restructuring the import licensing procedures or tariffs, price decontrol, the use of or elimination of subsidies, etc.

5. Establishing a time line identifying the major donor fertilizer policies and activities since 1980. Major donors would be the World Bank, European Economic Community, DANIDA, FINIDA, ODA, etc. Briefly describe the objective of each donor involvement and describe proffered resources (financial and in kind) and activity timing.

6. Establish a time line identifying the major decisions taken by each of the major 'players' reviewed under paragraphs 2-4 above. For example, when did a donor or donors first decide to distribute fertilizer through private traders (as opposed to parastatals)? When did the government make major decisions concerning fertilizer pricing? When did the donor first describe the need for fertilizer marketing and pricing deregulation? When did the government first describe its intent to deregulate pricing and marketing?

7. In relation to these three time lines, describe when private sector interests decided to form a fertilizer trade association. If a major farmers organisation or cooperative society has been active in fertilizer trade, identify major developments in their history, with ties to involvement in the fertilizer subsector during the 1980-93 period.

8. Establish a time line describing the amount of fertilizer imported and used annually during the 1980-93 period. Break the fertilizer out by type, whether provided by donor or imported commercially, whether provided by donors to parastatals or private sector, etc. Identify those years when there were significant increases or decreases in fertilizer imports or use and describe reasons behind those variations.

9. Compare the findings obtained in 2-8 above. In collaboration with the USAID/Kenya/AGR representatives identify 6 or so major orientations, stages or decisions in the subsector development. These could include the initial government decision to request donor assistance (either technical or commodity); decisions by donor, unilaterally or in unison, to focus developing the private sector role in fertilizer marketing; government decisions to market fertilizer via a parastatal or cooperative; price decontrol decisions; changes in government output policies that had a major effect on fertilizer, etc. The six or so major decision, stages or orientations will provide a basis for analyzing how decisions concerning the fertilizer subsector's structure evolved and were implemented.

10. Identify as common thread spanning the sequencing of these decisions. For example, as fertilizer marketing is not currently regulated it can be assumed that the most dominant objective of the different parties' involvement was market decontrol. If this assumption is correct, did the major orientations and decisions described above consistently lay the basis for effective decontrol? Why and why not? Were there significant deviations from this underlying objective? Why did these occur? What impact did they have?

11. Briefly describe the major stakeholders in each important decision or orientation. Describe their involvement in the fertilizer subsector and their interests in bringing about or supporting major decisions or orientations.

12. Analyze fertilizer price trends (both real and nominal) during the period under review. Analyze the price trends (again both real and nominal) of coffee, maize, wheat and important horticultural commodities during the same period. Draw general conclusions on the impact of output prices on fertilizer importation or use. Was it more or less important than other elements of market structure (aid provided fertilizer, parastatal involvement in input and output marketing, etc)?

13. Describe the activities of some fertilizer multinationals (Norskhydro, BASF, Transammonia, etc) in Kenya. When did they first enter Kenya's fertilizer market, set up distributor relationships, subsidiaries, etc?

14. Write a final summary section of the evaluation describing the most important stages in the evolution of Kenya's fertilizer sector. How did USAID programs contribute or detract from these stages. Other donors? Why was the contribution positive, or why was it negative? Finally, make six general recommendations on how donor involvement in the fertilizer subsector development can be effective.

The consultant shall travel to Nakuru, Kitale, Mombasa, Ruiru, and other sites as appropriate to accomplish the above scope of work.