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DAIRY/INQ/A/64

21st December, 1965.

THE DAIRY COMMISSION OF INQUIRY REPORT, 1965.

The Minister for Agriculture and Animal Hustandry presents his compliments and has the honour to forward herewith a copy of the Dairy Commission of Inquiry Report, 1965.

PERMANENT SECRETARY TO THE MINISTRY

REPORT OF THE DAIRY COMMISSION OF INQUIRY UNDER THE CHAIRMANSHIP OF THE HON, M. KIBAKI, M.P.

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APPRECIATION

- 1. The Commission expresses its appreciation to all persons and associations which submitted evidence, both written and oral.
- 2. It expresses particular appreciation of the detailed and voluminous work entailed in the data and memoranda submitted by the Kenya Co-operative Creameries. Limited and of the co-operation of the Managing Director, Mr. J.F. Byng-Hall, also the Chairman and Executive Officers of the Kenya Dairy Board; Mr. Heyer for his clear exposition in an Economic Survey of the Dairy Industry; the Regional Government Agents; Agricultural and Veterinary Officers and their staffs for their courteous receptions and assembly of evidence.
- 3. Above all, the Commission expresses its appreciation and thanks to those farmers and associations who attemded and gave such valuable evidence to the Commission.

Nairobi					
Date					

INTRODUCTION

There have been a number of reports published on the Dairy Industry in Kenya and its relation to the world industry. Reference to the bibliography appended will give an indication of the major study.

- 5. When dairying commenced in Kenya the problem was to rear stock and overcome the diseases to which they were subject. Indigenous stock were low producers and exotic stock very prone to disease. These difficulties were overcome, to a great extent by cross-breeding, upgrading, good husbandry and veterinary research.
- 6. The major problems of the Dairy Industry are the seasonal and annual rises and falls in production, due to availabilities of grass following the rains, and transport. Kenya has to face long transport hauls and milk is a perishable and bulky product. These factors limited the area from which milk could be drawn and often led to the market not being always fully supplied with milk, particularly in the dry season, and seasonal shortages of other dairy products.
- 7. In an attempt to rationalise supplies, farmers near the main market Nairobi grouped themselves together and built dairies to supply the wholemilk market, and formed the Kenya Dairy Co-operative Association and other Companies. Those who did not have access to a wholemilk market separated their milk and made butter on the farms.
- 8. Certain up-country producers formed themselves, on the Australian and New Zealand pattern, into district Co-operative Societies which established creameries for the manufacture of butter. This butter was not only sold on the local market but was of sufficiently good quality to be exported and thus enabled dairy surpluses to be sold overseas in the form of butter.
- 9. The demand for milk and dairy products internally grew on a regular basis, whereas the seasonal variations of supplies of milk and butterfat created the problem of what to do with the surplus in the flush season indeed, the seasonal fluctuation in the supply of both milk and butter was such that in the twenties milk was very much under-supplied for long periods, and even butter was in such short supply in 1928 that it realised a price of Shs. 4/- per pound under auction and later in the same year fell to 50 cents per pound when there was a surplus. Cold storage and the export of seasonal surpluses became essential and as prices realised on the export market were generally lower than the home market, competition developed as to who should supply the home market with a better return and who should be left with the lower return from export.
- In the 1930s exports of butter exceeded local sales and Government had to introduce a system of a levy on local sales, the proceeds of which levy were distributed among exporters in order to bring the export realisation nearer to the internal price. The local or district Co-operative Creameries had amalgamated by 1931 to form the Kenya Co-operative Creamery Limited, thereby eliminating the competition between themselves and sharing the high and low priced markets for butter equitably and, at the same time, effecting economies of operation. During the war it was possible to remove the levy, as local sales then exceeded exports, and moreover the majority of sales were channeled through the K.C.C.

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- 11. The next big step was to bring milk from up-country to Nairobi, where the population rapidly increased after 1945. Once again the problem was to ensure supplies during the dry season and to deal with surpluses. Producers near to the market considered that all their milk should be paid for at the higher price obtained for milk for human consumption. Up-country producers who made up the shortfall of milk to the Nairobi market in the dry season considered that their share of the high priced market should be in proportion to their deliveries in the dry period.
- 12. Ultimately, to meet this situation, a combination of producers from near Nairobi and from up-country worked out, first, a contract system, and then a quota system. These steps gave a degree of price stablisation to the producer and ensured regular supplies to the consumer. Except for a period during the 1939-1945 war, the organised marketing of wholemilk in Nairobi was operated by a producer organisation the Kenya Dairy Co-operative Association and a number of independent suppliers until taken over by the Kenya Co-operative Creameries Limited in 1948.
- Organised marketing in Kenya was established without the bitter price wars that have been associated with the development of the Dairy Industry in many other countries and as a result the rapid expansion of the Industry was made possible in fact, from 1954 to expansion of K.C.C. reveal that the total intake of milk received by them rose from 28,000,000 gallons annually to over 42,000,000 gallons.
- 14. The total recorded Kenya production stated by K.D.B. for 1964, including K.C.C. intake was 47,000,000 gallons.
- However, of this total of 47,000,000 gallons only 17,000,000 gallons are sold as milk for human consumption. (12,000,000 gallons by K.C.C.). Approximately 2,000,000 gallons are supplied as milk for manufacture into wholemilk products such as cheese and wholemilk powder and, 3,000,000 gallons separated for manufacture of skim milk products such as condensed milk and skim milk powders. The balance of 25,000,000 such as condensed milk and skim milk powders. The balance of 25,000,000 gallons is separated on the farms and supplied as cream for manufacture into butter and ghee.
- 16. In 1956 it became apparent that a collapse in world prices was endangering the voluntary system of marketing, and that if orderly marketing was to continue, statutory control would have to be introduced. Following an enquiry set up under the chairmanship of Mr. L.F. Troup the Kenya Dairy Board was constituted as a statutory body under the Dairy Industry Ordinance, 1958.
- 17. In the first years of operation of the Kenya Dairy Board no major changes were made in the control of the Industry. The export market recovered from the slump. Kenya Co-operative Creameries Limited were able to repay a Government guarantee of £80,000 to equalise payment for butterfat supplies and the voluntary rationalisation of the Industry under the old system was proving effective. The Kenya Dairy Board operated in close liaison with the Kenya Co-operative Creameries, appointing them as sole agents of the Board.
- The Kenya Dairy Board assumed control of the intake of liquid milk and continued to control such intake through a system of quotas in co-operation with Kenya Co-operative Creameries, who advised on market requirements. Kenya Co-operative Creameries continued to develop and serve the expanding markets, and developed their plant as demand grew. The necessary finance was obtained, in the main, from cesses deducted from producers and from bank loans. However, in the last few years there have been considerable changes in the location of milk supplies and changes of ownership of cattle and farms, mainly arising from the settlement schemes, 2nd the introduction and dispersement of exotic stock into new areas. These changes have created new problems in the marketing of milk, the processing of milk manufactures and the equitable sharing of the lower realisation from milk for manufacture and the lower priced export markets.

- Considerable-development has taken place, first in the manufacture of condensed milk to replace locally the large quantities at present imported into East Africa, and secondly, a project, with the assistance of UNICEF, to manufacture spray dried milk powder in this country. Both these projects will require a considerable quantity of liquid milk for manufacture but at a realisation considerably below that of wholemilk for liquid consumption.
- The Dairy Industry plans to double production over the next five years; some of this expansion will offset imports, although a of exports, with the resultant great amount will be in the form benefit in both cases to Kenya's balance of payments.
- There has been the additional problem in the last few years 21. of the decline in the National Herd. Ways and means must be found to increase the National Herd if the desired expansion of the Industry is to take place.
- To these ends this Commission was set up under the chairmanship of the Hon. Mwai Kibaki, M.P. The main task of the Commission was to enquire into the equity of the price structure as conditions exist today, bearing in mind that all producers are entitled to both a share in the high priced markets whilst contributing to the lower returns of export markets and the expansion of the Industry, not only to the benefit of individual farmers but to the prosperity of the nation.
- With this background, the Dairy Commission of Inquiry was appointed under authority of Gazette Notice No. 2137 in the Kenya Gazette No. 31 dated 7th July, 1964, with the following Terms of Reference:-

TERMS OF REFERENCE

Having regard to the Government's plans for the expansion of the dairy industry, to inquire into the organization of the industry and to report on the actions necessary --

- (a) to increase the national dairy herd to the maximum economic potential;
- (b) to ensure that the produce of the national herd is delivered to the processing factories in an efficient manner;
- (c) to ensure that sufficient processing facilities are available for the increased production and that internal and export markets will be available to absorb the total production;
- (d) to ensure that an equitable price structure is established taking into account the interests of all dairy farmers;
- (e) to provide adequate systems of control and service for the industry bearing in mind the present roles of the Kenya Dairy Board and the Kenya Co-operative Creameries but not being bound to accept these roles for the future.
- (f) to foster increased co-operation with Tanganyika and Uganda in view of the possibility of a future federation of East African countries; and
- (g) to make the industry operate to the greatest possible advantage of the Kenya Nation.

MEMBERS OF COMMISSION

The Hon. Mwai Kibaki (Chairman) The Hon. Fitzval Remedios de Souza The Hon. Taita arap Towett Peter Derek Marrian Josephat Mburu Wanyoike Harold Duckett White Robert Arthur May (Secretary) - color of any officer and off

TERMS OF REFERENCE:

- (a) To increase National herd to the maximum economic potential t siddling
- Ample evidence was received to show that the national dairy herd had in fact declined over the last few years and although indications were given that steps were now being taken to halt this decrease, it was considered by the Commission that more urgent steps were immediately necessary. Supplies of butter fat in the current year are below the previous year, and the Industry has been compelled to short supply existing markets.
 - If the plan to double the output of the industry 26. in five years is to be accomplished, then additional supplies must be made available to the Creameries.
 - The Change-over from the large farm holdings to 27. small-holders has posed many problems on the rearing of calves and followers, and it has been difficult to provide adequate extension services over widely scattered areas to smallholders. It was felt that the smallholder who is fully stocked can best remain in dairying if he can buy replacements at a fair price: in other words operate on the basis of a flying herd. The in other words operate on the basis of a flying herd. policy of the Settlement Schemes was criticised frequently because of their refusal to guarantee to purchase dairy stock from many farms due to be sold to the Central Land Board. This policy it was stated caused the unnecessary slaughter of dairy cattle and young dairy stock, and the dispersal of long established breeding herds and widespread movement of cattle.
- It was considered that, although in certain areas 28. there was over stocking or over-concentration of cattle in relation to grass and water availability, on a country-wide basis there was shortage of cattle for the production of milk and cream to meet potential markets. The Commission were of the opinion that although they had not sufficient knowledge to state the number of cattle required, say, in 5 years' time, nor the numbers likely to be produced from the Agricultural Development Corporation Farms, there would be no danger of over-supply. Precise details are being established by a special survey undertaken by F.A.O. However, the Commission was strongly in favour of farms being established on a nation wide basis for the breeding and raising of heifer calves so as to be able to supply in-calf heifers to dairy farmers. Such farms, however, should be considered as experimental until it had been proved or disproved whether calves can be raised successfully in such a manner.
 - It was considered that the development of such projects should be under the auspices of the Ministry of Agriculture and be managed and operated by the Agricultural Development Corporation now in formation. It was considered as a matter of urgency that A.D.C. farms be established to purchase heres offered, and manage them as complete heres during a transitionary period. There is a great demand for grade and exotic stock with high yields; and small farmers were at present unable to buy sufficient numbers when loans were made available for the purchase of dairy cows or heifers. It is suggested that a project be prepared and external support obtained for the finance required.

- 30. The Commission is of the opinion that calf rearing should be encouraged on both large and small scale farms and that individual farmers have a part to play in the building of a National Dairy Herd. They must be able to feel, however, that they will have an assured market at a fair price and that stock thefts will be brought effectively under control.
- 31. The Commission also received evidence from Co-operative Societies who feel that on a Co-operative basis they can establish calf rearing farms to supplement replacements for their members' herds and rear the calves of their members on a mutual basis. In our opinion this type of self-help should be fully supported and Government extension services used to provide help and advice.
- 32. We received evidence in favour of the compulsory licensing of bulls. In the opinion of the Commission, bull licensing should be encouraged but on a district basis after the majority of cattle owners in a district have opted for this type of control. In the event of a district opting for Bull licensing we consider that the District should have the benefit of a special subsidy from Government to enable A.I. Services to be provided at a greatly reduced figure.
 - of good quality exotic milk cattle in certain areas was greatly hampered by the movement of cattle for slaughter by small butchers which considerably increased the risk of disease. Veterinary control over all stock movements must be maintained and perhaps it might be possible at a later date to have all cattle slaughtered at killing centres so that butchers may buy carcasses instead of cattle on the hoof.
 - 34. We received statements of opinion that large numbers of indigenous cattle were uneconomic. We consider that most of such animals would become economic if their numbers were related to the available grass and water. In many cases it is not a case of improving the cattle but rather one of reducing cattle numbers to the capacity of the land.
 - 35. At the Coast we received evidence of land ercsion being caused by numerous cattle using a limited number of water sources, and over-grazing within these restricted areas.
 - 36. A number of the boreholes previously available for water have fallen into disuse through lack of maintenance in the Coastal hinterland. The system of communal grazing applies, and although the County Councils concerned are responsible for maintenance, it would appear that the population prefer to follow the water available and resist levies for the restoration and maintenance of the old boreholes.
 - 37. A particular problem exists in these districts but the problem also exists in other areas and will prove difficult to solve until there is a change from communal ownership of land.
 - 38. A further complication in some areas is the continuance of the custom of numbers of cattle representing wealth, irrespective of quality, sex, or productive ability and the raising of all such stock causes grazing problems.

- 39. The Commission recommends that to increase the national dairy herd to the maximum economic potential there should be -
 - (i) Calf rearing Schemes under:
 - (a) Government through the proposed Agricultural Development Corporation;
 - (b) Individual farms;
- (c) Co-operatives.
 - (ii) Cheaper Artificial Insemination through Government Subsidy to Districts that opt for Bull Licensing.
 - (iii) More effective action against stock theft.
 - (iv) Breeding half bred heifers by using Sahiwal and exotic dairy bulls on surplus boran heifers.
- (v) Purchase of entire herds by the Settlement
 Board or Agricultural Development Corporation
 at a fair assessment of value on take-over of
 farms by the Central Land Board.
 - (vi) Purchase of young stock by Agricultural Development Corporation Farms for raising, and selling as in-calf heifers.
 - (vii) Control of overstocking in certain areas. .
 - (viii) Land Consolidation and the issue of Titles.
 - (b) To ensure that the produce of the National Herd is delivered to the Processing Factories in an efficient manner
 - 40. Generally the Commission was satisfied that the produce of the national herd was being delivered to processing factories in an efficient manner, although in some instances with the changing conditions there were temporary disruptions in the established services and evidence was given that surplus milk which could only be used for the manufacture of butter was being sent to some factories. This milk (Pool III milk) was separated at the factory and could only be paid for at butter fat prices (-/9) cents per gallon), but had cost the producer ten times the transport costs to the factory that it would have cost had it been sent in as cream.
 - 41. On the other hand mention must be made of the rural collection system which has been developed in the widely scattered areas surrounding the Mariakani factory, where using local buses and taxis, whose basic pay-load is met by passengers and other commodities, the collection costs of milk in small quantities at the road side was made possible at very reasonable costs to the scheme.
 - 42. In principle, the costs of transporting milk and cream to factories are for the account of the farmer producers. Contracts have been organised by the processing factories to co-ordinate and to ensure economic loads for each haulage contractor; but the success of such transport is dependent upon the co-operation of the farmer producers and a full load being available for the contractor. In the transitional period when milk supplies have switched from one area to

another, the re-organisation of the contractor runs has not always kept pace, but these are difficulties which can be overcome with organisation provided that the new farmer and the Settlement Board appreciate the economics of co-operating with organized transport.

- The Commission was very impressed with the transport 43. facilities available in the Uasin Gishu and Trans Nzoia as operated by Murrell & Co. These transperters appear to have made a specialised study of transpertation in the dairy industry and particularly in regard to milk reaching a processing factory at a scheduled time in good condition irrespective of what transport difficulties have to be svercome. It was stated in evidence that some of their transport runs to collect milk and cream covered a circuit of 85 miles, but the efficiency was such that they were able to deliver milk to the processing factory for under cents -/13 a gallon and no charge was made for additional cream when room was available on the larries. The difficulties that will arise in ensuring that the preduce of the national herd is delivered to the processing factories in an efficient manner and at a reasonable cost will be felt increasingly with the extension of cream collection to more remote areas and has already been experienced in the development of the rural cream collection schemes. In general the rural cream collection schemes are greatly hampered by roads which become impassable in the wet weather, long hauls and small sub-economic These difficulties not only reduce the effective pay loads. payout but are having a very serious effect on quality. The pressure in the Kakamega area, Kericho district and other areas for a processing plant is to overcome the difficulties of the individual transporting milk long distances to processing factories. Cream for butterfat is less perishable than milk and having been separated from the skim milk is less in both volume and weight se can be transported much farther at a lower cost. In fact 10 gallens of milk transported as cream costs approximately the same as one gallon of milk.
 - 44. The Commission was surprised to find that milk was being transported as far as thirty miles on bicycles to the Kisumu plant, and feel that there should be some transport system organised by a local co-operative in the rural area from which this milk was collected.

At my 4 June

45. Recommendations

- (1) The Commission was of the opinion that produce is being delivered in an efficient manner to the existing processing factories but expansion of dairying into new areas and extensions into outlying districts will necessitate the development of collection centres, the organization of transport and improvement of road facilities.
- of milk and cream to the processing factories should be for the account of the individual producer or his own co-operative. This narrows the differential in prices paid to the producer for milk and butter-fat and induces the maximum milk production in areas within reasonable transport distance of processing factories, thus minimizing the costs of transport.
- (3) The Commission considers that once produce has been accepted by a processing factory that onward transport or internal transport between factories should be pooled and be a charge to the Industry as a whole.

- (4) The Commission recommends that milk delivered to a main market depot such as Nairobi should be paid for at a higher price because the Industry has been saved the cost of handling and transporting the milk from outlying areas.
- (5) The Commission recommends that small scale producers in rural areas should have organised transport and collection centres within local cooperatives so that the individual producer does not have long distances to transport small quantities.
 - (c) To ensure that sufficient processing facilities are available for the increased production and that internal and export markets will be available to absorb the total production
 - The Commission was satisfied from the evidence submitted on existing plants and proposed extensions that there would be sufficient processing facilities available for the increased production envisaged in the Development Plan. Further, the evidence supported that the internal and the export markets will be available to absorb the total production. The Commission was not able to comment on the long term suitability of the siting of the present processing facilities in view of the changing pattern, but appreciate that they are reasonably spread throughout the present milk and cream producing areas. Evidence was received from certain areas that they would like to have collection points and processing factories within their areas to overcome the high costs of transport which the producers had to bear. It was appreciated that an extension of processing facilities required an economic throughput to justify the costs of operation of such a plant. The Commission was very impressed with the processing facilities and distribution arrangements at Kisumu under the very capable managership of Mr. Opanga, but here the facilities were justified by being situated on the door-step of a sizeable market, namely, the township of Kisumu.
 - 47. The Commission wishes to stress the high degree of technical knowledge required to operate the Dairy Industry. This is particularly relevant when products from milk are to be manufactured and long experience and specialist knowledge is of the greatest importance if these complicated processes are to be successfully carried out.
 - The Chairman of K.C.C. supported by the Managing Director, expressed the difficulties that were being experienced in retaining highly skilled personnel within the Creameries.
 - 49. The Commission agreed that it was essential to retain such key personnel within the industry, and supported the actions being taken to this end.
 - 50. The Commission considered that in siting a processing plant the following factors had to be taken into consideration:-
 - (a) Availability of supplies and nearness to markets,
 - (b) Rail-head,

- (c) Water supply and effluent disposal,
- (d) A large enough capacity to be economical.
- For example, the Kakamega district considered that they had a great potential for the development of the dairy industry but experienced considerable difficulty with transport and lack of a central processing and collecting plant. If, however, a market similar to that at Kisumu existed nearby sufficient to justify a processing plant, consideration would be given to a collection centre but as stressed in evidence submitted to the Commission the world tendency in the dairy industry is to build larger economic units so that costs of production can be kept to a minimum. It would be against such economic units that Kenya had to compete with manufactured products. It was apparent, however, from the Commission's visits up-country that there was a considerable demand to supply milk, whatever difficulties had to be overcome in transportation. It is doubtful whether this demand would remain after the difficulties and cost inherent in producing and selling milk in reasonable condition far from markets became apparent. It was continuously stressed throughout that there was limitation to the quantity of milk which could be absorbed as the markets for whole milk consumption amounted to only 40,000 gallons per day out of 140,000 gallons per day overall production.
- 52. Evidence was submitted to the Commission that the manufacture of milk products as opposed to cream products was so competitive outside the East African markets that it was difficult for Kenya to compete and that expansion in the export markets must be in butter and manufactures from cream at this stage.
- 53. In conclusion the Commission was of the opinion that sufficient processing plants were established or planned to handle the expansion of the industry and that markets were available to absorb the planned expansion of production with an economic return to the country and producers.

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(d) To ensure that an equitable price structure is established taking into account the interests of all Dairy Farners

(i) Utilisation of Milk and Cream and the Net Realisation

- In establishing a price structure equitable to the interests of all dairy farmers evidence was received that the main complication was the varying realisations from what is basically the same product, milk. The intake of milk is required in two forms; liquid milk for human consumption and for processing into milk products, and milk separated on the farm into cream for processing into dairy products (butter and ghee).
- Milk for human consumption commands the highest return. Next follows milk for manufacture which converts all the milk into a manufactured product. The lowest return is from cream for butterfat. Cream however leaves the skim milk on the farm, which skim milk may or may not have a value to the farmer, according to the uses to which it may be put. Most is used for feeding or given to the farm labour.
- With cream there is a further complication as there is a differential in realisation from butter sold on the home market and that experted.
- are in the form of butter or ghee, the export return from these products has a considerable bearing on the overall return the industry can pay to farmers for their products. Evidence was received that there was considerable pressure from farmers to compete for the higher price return from liquid milk for human consumption, although this market is necessarily restricted to the requirements for home consumption and the markets are concentrated around the major towns. Evidence was also received that the milk required to supply the wholemilk markets is required on a regular daily basis, irrespective of the seasons of the year, whereas manufacturing processes can be regulated to cope with seasonal variations in supply, although such variations are not ideal for the most economic production costs.

(ii) Farming Economies and Planning

- 58. Expressed simply the commission was informed that dairy farming can be divided into two classes:-
- (1) Farms which maintain a regular cutput of milk by continually having an equivalent number of cows in milk. This is managed by staggering the birth of calves to coincide with other cows going dry or buying in replacement cows ready to give milk when others in the herd have completed their lactation. This incurs the additional expense of purchasing and growing cattle foods, providing ample water supplies, etc., which are necessary to keep cows up to a high standard of condition if they are going to produce their maximum milk, particularly throughout the dry season when natural grazing is short.

- a flush of milk following the rainy season. Here the farmer makes the maximum use of the cheaper form of feed, natural grazing. Cows calve down naturally following the rainy season when there is ample cheap milk to rear them, and ample grazing for the mature stock. With this method of farming there are considerable variations in milk production at various times of the year, reaching a peak following the rainy season and dwindling to very low production prior to the next rainy season. In periods of drought the production of milk could dwindle to nothing.
- A further factor having considerable bearing on a dairy farmer's economy is the breed of cattle he favours, as some breeds give a very high milk yield per cow but not necessarily as high a butterfat content per gallon as other breeds and conversely.
- 60. Evidence was submitted that these are farming problems the individual considers when deciding whether he wishes to farm for milk or butterfat and it was stated to the Commission that these factors have considerable bearing on costs of production.
- 61. There are other factors when dairy farming is conducted within mixed farming, as for instance the hidden value of land fertilisation; as milk production becomes a part of a larger operation into which it must be dovetailed with the maximum economic effect.
- wish to supply the wholemilk market, and consider that the problems of selling milk and developing markets are the concern of the marketing organisation, some farmers demanding a return from milk varying from 3/= upwards per gallon. Other evidence was received of farmers basing their economy on butterfat, by selecting high yielding butterfat cows, feeding on natural grazing and seasonal calving. Cream for butterfat is purchased on the weight of butterfat within the cream at a rate per lb. of butterfat, whereas milk is purchased at a rate per gallon, irrespective of its butterfat content provided the butterfat and total solids not fat comply with certain minimum requirements.

(iii) Price Structure Related to Selling Prices

- 63. The illustrations set out in (i) and (ii) show that there are great variation in price at which the end products are sold and also in the costs of production of milk or cream.
- 64. Consumer organisations sometime argue that the export of butter and ghee is uneconomic and inflates the internal price and that the country would be better off if the industry contracted until it only supplied the local market.
- 65. The Commission cannot agree with this view for Kenya cannot afford to lose £1,000,000 worth of exports, nor can expansion be halted without grave danger to the whole agricultural economy. Further, if it were not for exports keeping the throughput high, thus helping to absorb overheads, the price of local butter would have to be raised. Moreover, without a surplus for export it would be impossible to ensure supplies for the local market in both good seasons and bad.
- 66..... In other dairy producing countries it is a commor

practice for the local market to absorb the overheads of the industry as these overheads must be incurred whether or not there was an export market. If this principle was accepted, then export markets would not be burdened with overheads of the industry and could stand on the margins obtained for the raw materials and processing costs, any surplus being applied as a contribution to the overheads of the industry.

67. The Commission received evidence that the price structure was not strictly tied to sales realisations, and adjusting the payout to butterfat suppliers in relation to the lower selling prices of export butter had cost as much as -/30 cents per gallon from milk. In this manner, it was stated, the industry tried to equalise the price structure to the farmer, so that the benefit of the high priced market was not paid to one class only, but shared on an equitable basis.

tiv) Selling Prices

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- 68. On the sales side, evidence was given that the prices charged to consumers were reasonable on the home market, and on the export side fluctuated according to world prices.
- 69. Evidence was received that it was not possible to import produce from other countries which could be sold on the East African market at prices below those charged by the Kenya Dairy industry.
- 70. However, care must be taken to ensure that the price of local products does not rise to a point where products from abroad can enter East Africa at competitive prices. This particularly applies to Kenya's markets in Uganda and Tanzania.
 - 71. Evidence was also received that world competition was so keen that any expansion outside East Africa into sales of manufactured milk products such as milk powders, cheese, or condensed milk, would be extremely difficult and that at this stage the industry mainly looked to butterfat for expansion in the export markets. The Commission accepts this view for the moment but urges the future Authority to keep under constant review the external market for manufactured milk products and develop them when the time is opportune.

(v) Regulation of the intake of milk and cream

72. It was stated to the Commission that the milk quota system was evolved with very arduous restrictions to ensure that there was a daily supply of milk on a daily basis for human consumption. Such a system leaves the farmer/producer freedom of choice as to which methods of farming he adopts and which markets he wishes to supply within the limits of the restricted wholemilk market. Wholemilk for human consumption is required on a daily basis throughout the year and realises the highest price. However, the producer is involved in considerable extra costs to maintain the guaranteed daily quantity throughout the year, both in extra capital and running costs for cooling plant, cans and transportation and also in additional feeding expenses during the dry weather in order to maintain production. Inevitably, therefore, wholemilk for human consumption must command a higher price than milk for manufacture or cream for butterfat. Much evidence, however, suggested that the differences in price for milk were not acceptable, and prices paid for butterfat were too low.

- 73. The industry considered that the price variations and arduous restrictions on quotas regulated the intake of milk within the proportions that could be handled and sold as milk.
- 74. Certain producers suggested there should be uniform price for all milk and that milk production should be allocated on a basis giving all farmers an opportunity to supply milk without having to purchase quotas.

(vi) Quota System and Control

- It was stated in evidence that when quotas were originally introduced they were available for all dairy farmers to supply, provided they were prepared to demonstrate that they could supply good quality milk in the dry season. To do this they supplied milk to qualify for a quota from 1st January to 30th April each year. New producers earning a quota had to supply milk for this period at less than butterfat prices (90 cents per gallon) and having proved their capacity to supply what was then called an "earned quota" they were allocated a proportion of that "earned quota" in relation to market requirements which quantity they could supply at Pool I prices. In good seasons it was stated milk offered was greatly in excess of sales and thus quotas had to be rationed proportionally to as low as 60% of the proven ability to supply. If a farmer's deliveries of wholemilk fell below his quota for fourteen out of thirty consecutive days, he was penalised by a permanent reduction in his quota without compensation. The earning of quota also gave an entitlement to supply manufacturing milk at Pool II prices which quantities varied again in relation to manufacturing requirements, but there was no obligation to supply manufacturing milk.
- 76. In this manner, supplies to the limited high price wholemilk market were restricted by agreement to the requirements of the market and yet supplies to that market were guaranteed on a daily basis.
- 77. Milk intake to Eldoret, Nakuru, Naivasha, Nairobi, was regulated to the marketing and processing requirements of each factory by the system of quotas.
- 78. It was contended by the industry that the high cost of earning quotas (supplying milk at less than butterfat price), and the expensive feeding in every dry season in order to maintain a quota (because only a proportion of supplies were allocated as a quota), made the supplying of a quota both arduous and expensive to the farmer, for which he expected a higher return for his efforts, and it was considered that it cost well in excess of £10 per gallon to enter this market.
- 79. However, with the changing population of farmers and greater quantities of milk being produced nearer to the main Nairobi market it became apparent to the Kenya Dairy Board that quotas could only be extended in relation to market expansion. Quotas already issued were restricted to the percentage of milk then being supplied. A waiting list was maintained by the Kenya Dairy Board of these requiring quotas, and provided the market expanded, new or additional quotas were allocated to those who either had no quotas, or whose proportion of wholemilk deliveries to total production was below average for the area. This system, it

was stated, was evolved to meet the situation of many of the new farmers and co-operatives whose economic position was such that if they were required to "earn" a quota by delivering malk at butterfat prices for a period, would be in serious danger of total collapse. It was reported that the 'pegging' of quotas, the disparity between the payout for butterfat and quota milk, combined with the fact that new quotas could only be issued against an expansion in milk sales created a "good will" value for those in possession of quotas.

- It was stated that at first, when quotas were freely transferable, this value usually exceeded £10 per gallon. Later, the Kenya Dairy Board controlled transfers and fixed the price at £10 per gallon to be paid to the vendor, provided, a purchaser approved by the Kenya Dairy Board could be found.
- 81. It was stated that the Joint Quota Committee authorised transfers of existing quotas as 'negotiable'... and the issue of any new quotas was free but restricted to the quantity the market could absorb with increased sales. Further as a matter of policy, the Joint Quota Committee appointed by the Kenya Dairy Board to control the issue and transfer of quotas would not allow quotas to be held by any farmer or group of farmers, in excess of the overall average of quotas held in the area in relation to total production of a farm.
- The Commission were informed that at present, quota milk supplies represent about 67% of the milk supplied as milk.

(vii) Increased Manufacture of Milk Products and Extension into Contract

- Gradually, as a greater variety of milk products was manufactured to meet the requirements of East African markets of such items as condensed and powdered milk it was reported that much greater quantities of milk were required for the manufacture of these commodities and that a contract system for milk (in addition to quotas) was developed in an attempt to meet this situation. Contracts were issued to applicants who demonstrated that they could supply milk. . It was stated that there had not so far been a very great pressure to obtain contracts; in fact, there is often insufficient contract milk available to meet processing requirements. Contracts are restricted to a percentage of the total production of a farmer i.e. milk and cream. To decide this percentage consideration is given to the overall quantity which can be utilised as milk in a particular area.
 - 84. The price reported for contract milk is between that paid for Pool I and Pool II milk. Contracts it was stated allow for 25% drop in quantities supplied without penalty and are adjusted downwards in the event of failure to supply the minimum quantity. It was further stated that suppliers of contract milk are given priority when issuing new quotas.

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(viii) Payout Structure K.C.C.

85. The following was submitted as being the current payout structure operated by K.C.C.

(a) Butterfat and Milk for Separation

- 86. Butterfat is paid for by making a basic payment on the 20th of the month following delivery, of Shs. 2/50 per 1b. first grade, Shs. 2/40 per 1b. second grade and Shs. 1/90 per 1b. third grade. The trading results are reviewed quarterly and a quarterly pool payment is made. This has ranged from 15 cents per 1b. to 45 cents per 1b. At the end of the financial year an additional annual pool payment is made which has varied from 1% to 2\frac{3}{4}\% of total payout according to results. K.C.C. has averaged over Shs. 2/80 for the last four years, the payout last year, including final pool payments, being Shs. 2/91\frac{1}{2} for first grade.
- 87. Butterfat is paid for at the same rate throughout the country and for accounting convenience, railage only is paid on butterfat sent in by rail, but producers are responsible for the cost of delivering both cream and milk by road to processing factories, with the exception of special arrangements in the Sotik area for cream delivered to Molo factory.
- 88. Milk supplied for separation surplus to wholemilk sales and milk required for manufacture, is paid for at 90 cents per gallon, which is a butterfat equivalent, but means heavier transport costs to the producer. This is milk not really required as milk at the processing factory.

(b) Wholemilk for Human Consumption

- 89. Payout for wholemilk for human consumption (Pool I) varies from place to place but is kept at a level rate so far as is possible.
- 90. Nairobi payout is Shs. 2/65 per gallon delivered to creamery paid on the 20th of the month following delivery. At the end of the financial year a pool payment isomade on the same basis as for butterfat. Last year this was 2\frac{3}{4}\% so Nairobi producers received Shs. 2/72 per gallon in all. Payout at Nakuru and Naivasha for Pool I is Shs. 2/30 per gallon, plus annual payment. The difference between Nakuru/Naivasha payout and Nairobi payout of 35 cents a gallon (Shs. 2/30 to Shs. 2/65) is roughly the cost of bringing milk down to Nairobi from up-country and therefore represents the geographical advantage enjoyed by these who supply Nairobi creamery direct.
- 91. Eldoret suppliers in theory get Shs. 2/30 per gallon for Pool I but they have to supply a fixed quantity of Pool II milk valued at Shs. 1/50 for manufacture to supply a contract, so they get a blended payout of Shs. 2/03 per gallon, being two thirds Pool I and one third Pool II. There are other minor variations in places like Thika, etc.

(c) Milk for Manufacture

92. This is paid for at Shs. 1/50 per gallon, delivered Eldoret, Nakuru and Naivasha, Shs. 1/77 per gallon delivered Nairobi, plus the annual pool payment in all cases. Manufacturing contract milk is paid for at Shs. 1/75 per gallon delivered Eldoret, Nakuru and Naivasha, and Shs. 2/05 per gallon delivered Nairobi. Milk for manufacture which to a large extent can be delivered in flush periods, realises a lower

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figure in comparison with whole milk for human consumption because of the lower net realisation from milk manufactured into cheese, powdered milk, condensed milk, etc.

(ix) <u>Variation of Price Structure</u>

- 93. Evidence was given that the quota system in the past had been equitable. Under the quota system, a choice had been given to the farmer as to whether he wishes to earn his way into arduous and stringent regulations governing the supply of milk under quota regulations, or whether he wishes to develop his farm economically on butterfat supplies with or without the seasonal production of his flush milk being sold for manufacture. This offered flexibility to adjust farming to the seasons of the year and to particular and locational requirements but this system was considered more applicable to large scale farming. However, the Commission received considerable criticism on the price structure, both oral and written and particularly in respect of the quota system which, in general would appear to be not acceptable to many of the new dairy farmers entering the industry. It was stated that the quota system precluded a new farmer from having a share of the high price wholemilk market and the payment for quotas restricted the market to a privileged class. The new farmers contended that formerly producers had not had to pay for quotas as was called for today and that even when payment for a quota was spread over one year, that the deduction of 60 cents per gallon was too great a burden. It was generally expressed in evidence that new farmers had heavy loan commitments and required to be able to sell produce at top prices to meet these commitments and it was found that there was no margin to make further payments to ebtain quotas.
- 94. Members of the Commission stressed that the wholemilk market as such was limited to what the public would consume.
 - 95. It was stated in a memorandum in evidence -

"Unless there is control, the local market will be flooded by pirating milk, the quality and purity of the product will disappear, the price will fall below the economic minimum for the producer, the steady producer will go out of business, the co-operative market will be lost. Such milk as is then sold locally may be deplorable for the health of the nation."

- 96. It was considered by the Commission from evidence submitted that one of the greatest difficulties the Kenya Dairy Board or any statutory dairy body faces was the black marketing of milk and this quotation sums up the position of what happens when milk marketing gets out of control
- 97. As already stated criticism was received of the disparity between the price paid for quota milk and that charged to the retailer. It was pointed out, however, that this difference not only arose from the costs of processing, packaging and distribution, but also contained an element of subsidy to boost the extremely low payout for butterfat and equate the lower returns obtained on the export markets. From published statistics the margin in Kenya compares favourably with that in the U.K., Australia or U.S.A.

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- Confusion existed in the minds of some new farmers 98. as to the varying prices paid for Pools I, II and III and contract milk, as they stated they were able to see their milk delivered to a processing plant and marketed as wholemilk, yet they received different prices for milk sold at the top price. Some were under the impression that the prices paid for the different pools related to the grade of milk but generally they failed to appreciate, as was stated by K.C.C. that the processing factories balanced the intake of milk and related pool prices to the final realisation for milk as to whether it was sold as milk or manufactured. The situation as reperted to the Commission was that the overall Pool I deliveries approximately equal the sales for human consumption. In order to save transport on milk, Pool II milk delivered to Nairobi in some cases will be sold for human consumption, whilst other milk purchased at Pool I prices up-country will be held back and manufactured. Overall, the quantities paid for at Pool I and Pool II prices are approximately equal to the sales of milk for human consumption and milk for manufacture respectively.
 - 99. It has been stated earlier in this report that quotas in their present form are not acceptable to many producers and that the earning and issuing of contracts would provide a more acceptable method of allocating the wholemilk market.
 - 100. It was noted that the present price structure did not appear acceptable nor comprehensible to the majority of new farmers.
 - 101. The Commission therefore considered a uniform price for wholemilk as such, and a separate price for butterfat (whether supplied as cream or milk for separation).
 - 102. The Commission felt that the lower rate per gallon inherent in a one price system (although a similar gross payment overall) could have the immediate effect of reducing the quantities supplied as milk and jeopardise supplies of milk required for human consumption, particularly in the dry season. Accordingly a transitional period would be necessary to ensure that milk was supplied in sufficient quantities in periods of shert supply to assure supplies to the wholemilk market for human consumption.
 - 103. If the industry was to be rationalised on an equitable basis to all dairy farmers, the price established for milk would have to be able to augment the lower returns obtained for butterfat on the expert markets.
 - However, farmers who have built up their properties on a milk quota economy will require time to adjust from quotas to a flexible contract system at a lower rate per gallon. Hardship would be experienced by those who had earned or paid for quotas, particularly those who had recently purchased quotas and organised their farms accordingly. To those continuing to farm, however, the real value of a quota lies in the higher price they receive for a fixed quantity of their milk.
- 105. The Commission received evidence that by immediately restricting any further issue of quotas, and by allocating to

producers on contract any milk required for the expansion of the wholemilk market, there would be a narrowing of the gap between contract prices and quota prices. However, the Commission considered that to accelerate the levelling of prices the Authority controlling the industry may have to increase the contract price by subventions from the quota price. The dangers of any sudden and radical change in the price structure have already been indicated and before any changes are made the new Authority (referred to under terms of reference(e)) must be satisfied that such changes will not endanger milk supplies or create lack of confidence in the industry, bearing in mind the overall plan of expansion in the industry.

- 106. To induce and assure supplies of milk for human consumption in the transitional period it was considered that quotas must continue until the Authority was satisfied that quotas could be abandoned.
- 107. However, it was considered that all producers or groups of producers mu be given an opportunity each year to earn a contract based on their dry weather ability to deliver milk of acceptable quality. In the event of more milk being offered under this system than can be absorbed for human consumption and manufacture in each processing factory area contracts shall be scaled pro rata to the quantity earned.
- 108. Quota holders who fail to meet their quota chligations by supplying their own milk, or in the case of Co-operatives that of their members, should forfeit their quotas without compensation.
- 109. When the Authority considers the time is opportune to convert existing quotas into contracts and, the milk supply, precessing plants and markets are sufficient to justify the change, quota holders should be given contracts in place of quotas on the basis that for the first year after conversion of contracts a 75 gallons quota becomes a 100 gallon contract to cover the previous entitlement to supply manufacturing milk. Quotas will then cease and all milk will be supplied on contracts to be issued each year.
- 110. The Commission realises that the cash value of a quota will be progressively reduced and the ultimate value will be the right to a contract following the abolition of the quota system. However, the Commission considers that if in the opinion of the Authority it is in the interests of the industry to extinguish a quota the Authority should have the necessary powers to purchase these quotas.
- 111. The Commission considered that quotas whilst in operation should be restricted to the ownership of the land and the continuance of milk supplies against that quota, but in the event of a farmer transferring his cattle to new land purchased by him consideration should be given to the transfer of the quota.
- 112. The Commission further considered that even under a contract system at a uniform price some financial incentive to dry weather production would be beneficial. It considered a gazetted seasonal price differential but rejected this in

favour of a monthly calculation of a uniform price for all milk. It was appreciated by the Commission that during the dry weather the supply of milk for manufacture will fall and there will be a higher proportion of the milk supplies in that period sold as milk for human consumption. By establishing a formula to calculate the monthly uniform price for milk which was related to the proportions of milk for human consumption and milk for manufacture to the total monthly supplies of milk, such formula should produce a higher rate per gallon in the more difficult dry seasons when milk is in short supply. This should provide a financial incentive to dry weather production when cattle grazing is restricted and feeding has to be supplemented by purchased cattle feed.

- 113. Referring to the relationship between the price paid for milk and that paid for butterfat (which term includes milk accepted for separation), the Commission were of the opinion that the price differential should be regulated to a great extent by the differential in transport costs. Transport costs from the farm to processing factories were for account of the producer. This should tend to encourage the ideal which the Commission endorses that milk should be produced as near as possible to the markets requiring milk and processing factories manufacturing the milk into milk products. Milk transported as milk because of the liquid bulk, costs ten times the equivalent cost of cream per gallon of milk.
- 114. There was some evidence to show that butterfat production at present was not very prefitable to many farmers and some consideration should be given to reducing the differential between butterfat and milk payeut. However, the Commission considered that one of the advantages of the present arrangements was that the farmer had discretion as to whether he would adopt a milk or butterfat economy.
- 115. As a final consideration in regard to transport costs on milk, the Commission considered that where transport costs to a market are saved to the industry by the geographical location of the producers, these savings should be passed on to the producer in the price paid for his product, e.g. a higher price paid for delivery to the Nairobi market by the producer, and not transported by the Industry from up-country.
- 116. The Commission considers it essential that transport of milk and dairy produce continues to be erganised to processing factories on the most economical basis and that the cost of transport to processing factories is for account of the producer.
- 117. The Commission is of the opinion that the transport of milk to principal markets should be organised at collection centres outside the towns and transport restricted to vehicles licenced for that purpose in order to avoid illegal transportation of milk and black marketing.

(x) Recommendations

- 118. The Commission came to the conclusion that the existing Queta system was not acceptable and makes the following recommendations.
 - (1) That a Contract system be implemented at a uniform price for all milk as soon as possible.

- (2) That the Contract system should be implemented when in the opinion of the Authority recommended under terms of reference (e) there are milk supplies sufficiently in excess to ensure the wholemilk market, particularly in the dry season, and plant is available to handle the increased throughput of milk at the peak periods.
 - (3) That no further quotas be issued and any expansion in the wholemilk market shall be allocated to producers on contract prices.
- (4) That when the Authority decides to convert all Quotas to a contract system the current holders of Quotas will be offered contracts on the basis of a formula which will include their present entitlement to supply manufacturing milk e.g. a 75 gallon quota will be exchanged for 100 gallons contract, but no other form of compensation will be payable when quotas are abolished.
- (5) That during the transitional period quotas will only be transferable in the event of change of ownership of land and provided that that land continues to be utilised for milk production and milk is supplied against the quota.
 - (6) That whenever a farm ceases to produce milk against a quota the quota will lapse.
 - (7) That quotas shall cease to be negotiable but when in the opinion of the Authority it is in the interests of the Industry to purchase and extinguish a Quota it may do so.
 - (8) That the new Authority shall review the price structure to bring Quota prices in line with Contract prices and thus shorten the transitional period, but always bearing in mind the need to induce and maintain supplies of milk during the dry weather.
 - (9) That the uniform price for milk be calculated on a monthly basis and that this system can be applied to the current contract milk without delay.
 - (10) That where transport costs are saved to the Industry, these should be passed on to producers in the price paid for their produce.
- .(11) That the new Authority review the price paid for butterfat with a view to reducing the differential in prices paid for milk, taking into account differential in transport and handling costs.
 - (12) That transport costs to the processing plants continue to be for account of the producer.
- (13) That transport of milk to principal markets be organised at collection centres outside the towns and be transported only by vehicles licensed for that purpose.
 - (14) That the illegal transportation and illegal selling of milk and milk products be an offence cognisable to the Police.

- (e) To provide adequate system of control and service for the industry bearing in mind the present role of the Kenya Dairy Board and the Kenya Co-operative Creameries but not being bound to accept this role for the future
- Representatives of the Kenya Dairy Board and the Kenya Co-operative Creameries Limited gave evidence on the separate functions of these Organisations and agreed that certain of their activities necessarily overlapped. They agreed that if their role could be combined, there would be an element of saving to the industry, but above all there would be greater co-ordination of policy. At present the Board was responsible for the Statutory control of the Industry and the Creameries for the efficient operation of technical processes and marketing for the greater part of the industry and often the policies on the intake and control of milk and cream had to be correlated.
- overheads of two bodies within the industry had the effect of reducing the final payout for milk and butterfat. Moreover, there was also a widespread feeling among new farmers that the Kenya Co-operative Creameries was dominated by European control. The growth of marketing is referred to in the Introduction, and in the early stages of development large farms which required organised marketing and processing facilities were owned by Europeans. It was pointed out, however, that in the Kenya Co-operative Creameries Memorandum and Articles of Association there never had been any racial clauses whatsoever, and no restriction on membership apart from the ability to supply a certain amount of produce.
- 121. It was further noted that when land ownership and consolidation took place and African farmers were allowed into the previous Scheduled Areas, Kenya Co-operative Creameries welcomed the opportunity to assist the new owners in the processing and marketing of their produce. This was supported by evidence from farmers who appreciated the assistance given, and who stated they had been given considerable advice and assistance in getting their produce marketed in good condition.
- The Kenya Co-operative Creameries, it was noted, was a producer controlled co-operative registered under both the Companies Act and the Co-operative Societies Ordinance. The control of the Company was vested in a Board of Directors elected by the producer/members, and in accordance with co-operative principles, each member had only one vote. This vote became inoperative if the member resigned or failed to supply dairy produce to the Co-operative.

 Members subscribed to a qualification share of Shs. 100/= each. The Preference Share Capital carried no voting rights or representation unless the Company failed to pay the annual dividend.
- 123. The Commission noted that Kenya Co-operative Creameries had organised the Dairy Industry among its members on a voluntary and co-operative basis, the members providing finance in proportion to the produce supplied, and thus the members owned the extensive processing plants and developed the worldwide marketing organisation. Statutory control of the Industry, which has operated since 1958, was mainly directed to the intake of milk and cream from producers

PLANT CAPACITIES DAIRY

(a) KCC'S EXISTING FACILITIES FOR THE DAILY PROEPTION AND HARDLING OF LIQUID MILK NOVEMBER 1964

(all details in gallcas)

LLOOR I	NAIROBI NAIVASHA	
16,000	12,000	Unprocessed Milk from Producers
13,000	13,000	Milk Processed Milk transferred from other factories
16,000 18,000 67,000	25,000	TOTAL
12,000	22,000	For Sale as liquid milk
4,000 4,000	3,000*	For Manufacture
16,000 16,000	25,000	TOTAL

Note: This is the basic sit ation and can be altered in minor ways by permutation.

+ for transfer in bulk only

*could be

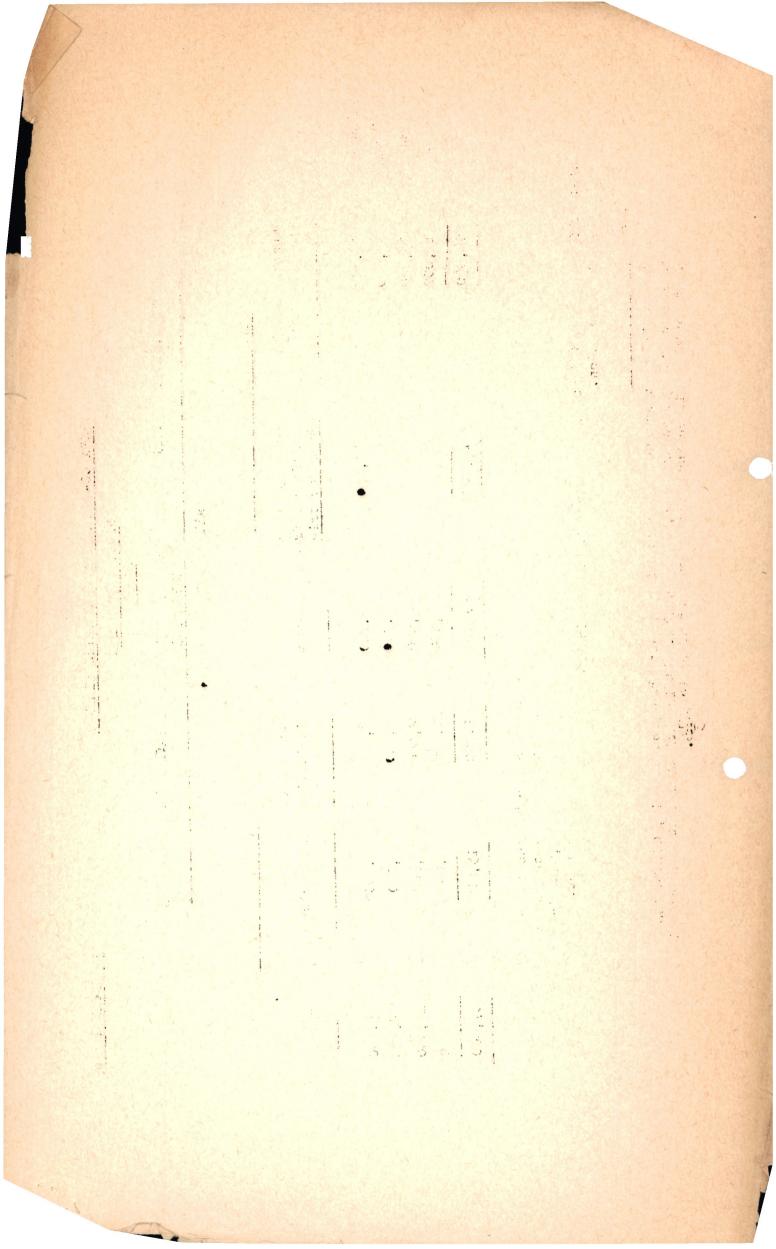
4,000 Siver the

increased to

market.

(6) BUTTER AND GLUE

The existing Butter and Thee manufacturing plant has processed 1,602,000 lbs of butter and ghee in one year, viz: 1962/63. It is estimated that the present plant could handle an increased throughput of up to 331%.



(Quota system), the regulation of the internal market and equalisation of returns from the export market.

- 124. The technical and marketing efficiency of the Kenya Co-operative Creameries was acknowledged and appreciated by the Commission and it was considered that this experience and knowledge must not be lost to the Industry, nor the present processing and marketing facilities disrupted, and the Commission was very perturbed to hear of the dangers of losing highly trained technical staff.
- 125. The Commission considered that in the interests of co-ordinating overall policy and control, improving efficiency, reduction in overheads and streamlining administration, the functions of the two organisations should be combined.
- 126. Consideration was given to establishing a National Co-operative by invoking section 37 of the Co-operative Societies Act and controlling all dairy produce under such an organisation. However, the Commission considered that it was not practicable nor desirable to vest in a Co-operative Society operating a monopoly full statutory powers of control.
- 127. The Commission, however, considered that an overall authority was necessary which must have statutory control of the Industry because of the diversity of returns from the produce, the organised marketing of such produce, and to control the natural pressure from producers to supply only the more lucrative markets.
- 128. It was considered that in the future many small scale farmers would require increasing guidance and extension services, which could not be provided by a national co-operative, nor the Kenya Dairy Board as constituted at present. Balance will have to be maintained between the large and small scale producer in the interests of the Industry as a whole. Whilst there was a strong feeling among farmers that producers should continue to control the industry, which they consider includes marketing and processing, it was considered by the Commission that the Government in future would have to become increasingly involved in the everall development as well as safeguarding the National and Consumer interests.
- 129. It was considered that the Authority responsible for processing must employ specialist field officers to ensure milk and cream quality. However, it must be stressed that the closest coordination should be maintained with Agricultural and other Government Officers who are generally advising and assisting in the field, and to coordinate common policies. The Commission considered there would be an advantage in the Authority being a semi-Government organisation under the Ministry of Agriculture and Animal Husbandry.
- 130. The financing of processing plants in a developing country and the organised marketing should not necessarily be the responsibility of the farmers, although it was noted that Kenya Co-operative Creameries had financed both, in the main from cess deductions from members produce.

131. Having the foregoing considerations in mind, the Commission considered that a National Organisation be constituted with powers to direct, control and manage the whole industry. The Commission therefore submit the following recommendations.

RECOMMENDATIONS

132.

- (1) That a Statutory National Corporation be constituted on similar lines to the milk marketing Boards in operation in the United Kingdom to be known as the "Kenya Dairy Commission".
- (2) That the Commission be vested with the powers of a legal entity to issue Loan or Bond stock in the name of the Commission, finance, borrow, develop, manage and otherwise operate the ffairs of a dairy industry, and have powers to make rules, levy cesses, and create reserves for the development of the industry, subject to the powers vested in the Minister under Recommendation (8).
- (3) That the Commission present its Annual Report and Statement of Accounts to the Minister for Agriculture, at the same time circulating to all producers. An annual conference of producers would be convened to discuss the Annual Report and Accounts and to call for any recommendations to be considered by the Board of the Commission or submitted to the Minister responsible.
- (4) That the Commission will have powers to licence or exempt from licence all or any milk and dairy products produced, manufactured or sold, and to control prices.
- (5) That the Commission will have powers with the consent of the Minister for Agriculture to take over or direct any dairy organisation in Kenya, and negotiate or have financial interests and/or manage any other dairy organisations.
- (6) That the Commission be managed by a Board of Commissioners or Directors, at least two thirds of the number having been elected by producers in such manner as the Minister for Agriculture recommends, and the remainder should be appointed by the Minister for Agriculture. Two appointments by the Minister should be persons of business experience with knowledge of and interest in the industry capable of ensuring good management. The Ministerial appointments would represent Government, Consumers and the National interest. Further the Board will have powers and it is recommended that they will invite managerial, technical and marketing personnel within the industry to be full time directors of the Board at a remuneration to be agreed upon by the Board. These technical appointments will be in addition to those recommended above and should be restricted to a maximum of three.
- (7) That the Chairman of the Board be appointed by the Minister for Agriculture.
- (8) That the Minister for Agriculture would have overriding powers and power to give direction to the Board.
- (9) That the Board will have powers to appoint sub-committees for specific purposes if they so wish, and to delegate such responsibility as the Board determine.

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- (10) That the Kenya Dairy Commission take over and become the owner and manager of the processing plants at present operated by Kenya Co-operative Creameries Limited and the complete functions of marketing.
- (11) That the Kenya Dairy Commission register the name of Kenya Co-operative Creameries and the abbreviation K.C.C. as patented trade marks to maintain goodwill in trade locations where these have been established.
- (12) That the Commission issue loan or bond stocks carrying the same interest and redemption rights as the redeemable preference shares at present issued by Kenya Co-operative Creameries Limited to take over such redeemable shares and in the case of Preference, Ordinary and Deferred Shares having no redemption rights to issue Loan or Bond Stock in the name of the Commission at a reasonable valuation and similar rates of interest which will be redeemable at a fixed future date, say in not less than 10 years.
 - (13) That the mechanics of take-over by the Commission be by negotiation and reasonable compensation.
 - (14) That the bonds of the Commission be underwritten by the Kenya Government.
 - (15) That all contractual obligation and liabilities of Kenya Co-operative Creameries Limited be taken over by the Kenya Dairy Commission including staff contracts and Provident/Pension Commitments.
 - (16) That the Commission will automatically assume control in the subsidiary companies at present owned and operated by Kenya Co-operative Creameries and further the development in Uganda and Tanganyika at present being conducted by those companies.
 - (17) That the Commission will absorb the staff of the Kenya Dairy Board.
 - (18) That the Commission should take over and manage other dairy organisations within Kenya on suitable payment of compensation as and when the Commission considers it advisable.
 - (f) To foster increased co-operation with Tanzania and Uganda in view of future Federation with East African Countries
 - 133. The Commission noted the development and negotiations that had already been started between K.C.C. and the Governments of East African territories together with the formation of subsidiary companies to foster the development of trade in Uganda and Tanzania and the developments which were taking place in both Uganda and Tanzania under the legislation for the establishment of Dairy Industries. As stated under Term of Reference (e), the Commission recommended the take-over of the subsidiary companies at present operated by K.C.C. to further foster and develop the expansion of the dairy industry in the three territories to their mutual advantage. The Commission expressed their appreciation of the initial efforts by Kenya Co-operative Creameries and their subsidiaries.

- (g) To make the industry operate to the greatest possible advantage of the Kenya Nation
- 134. The Commission have at all times in their recommendations considered the greatest possible advantage to the Kenya Nation.
- 135. The Commission, therefore, are of the opinion that the industry be developed and expanded to its fullest extent within the potential markets both to save exchange on dairy products at present imported into the East African territories and earn foreign exchange on the export markets.
 - obtained for milk and dairy products and to ensure that all dairy farmers contribute equally to the development of the Nation, a very strict control of supplies of milk must be vested in the new authority. Offences in connection with the illegal sales of milk must be cognisable to the Police as well as to Dairy Inspectors.
 - 137. To expand the industry to its maximum potential within the shortest time every consideration must be given to the increase of the National herd and extension services to assist in good animal husbandry, and to the development of collection schemes for cream in the remote and outlying areas.
 - 138. Finally, the Commission is most concerned with the continuing state of stock thefts and urges the Government to take even stronger measures to protect the vital stock industry of Kenya.

DAIRY COMMISSION OF INQUIRY

SUMMARY OF WRITTEN EVIDENCE SUBMITTED

Kenya Dairy Board:

Chairman, F.

F.R. Stephen

Officers:

N.L.T. Garrett J. Tameno

Kenya Co-operative Creameries: Chairman

Managing Director

D.H.M. Dempster J.F. Byng Hall

Sales Manager

J.H. Gaster

Dalgety (East Africa) Limited .

Kiambu, Thika and Nairobi Dairy Marketing Co-operative Union Ltd.

Nairobi and District Dairymans Association.

Nyamu Farm.

Rongai Valley Farmers Association.

Waldai United Farmers Co. Ltd.

Department of Veterinary Services, Kisii (J.G. Wandera)

Nyeri Dairymen's Co-operative Union Ltd. and Mathira Dairymen's Co-operative Society Ltd.

Central Region Dairy Co-operative Producers.

P.K. Thande.

Agricultural Finance Corporation.

Director of Settlement.

P.J. Nicholas.

Mrs. E.K.F. Knowles.

Murrell & Co. Ltd.

Hon. Christopher Kiprotich, M.P.

Nyandarua Co-operative Societies.

Central Agricultural Board.

Kimilili Livestock Co-operative Society Ltd. and Elgon Nyanza Farmers Co-operative Union Ltd.

R.J. Clayton.

R.G.A. Nakuru - E.M. Mahihu.

Gusii County Council.

R,G.A. Kisii - A.C. Kangethe.

Municipal Council Kisumu.

Kano Dairy Farmers Co-op. Society.

Ag. R.V.O., Western Region - F.O. Sakwa.

D.A.O. Kakamega - A.I. Machayo.

County Agricultural Committee - Bungoma - A.N. Mwaniki.

Leandet Cream Co-operative Society Ltd.

Uasin Gishu District Ad Hoc Committee on Stock Policy

Ndalat Farmers Co-op. Society Ltd.

Glanjoro Farms Ltd. Senator Mbiyu Koinange. Embu Dairy Farmers. and the second second second second J.J.M. Nyagah, M.P. Mariakani Milk Scheme. R.A.O. and R.V.O., Coast. Mariakani Dairy & Farm Produce Co-operative Ltd. Livestock Research at Mtwapa. Kenya Milk Shops Dairy Supplies Association.

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ASSOCIATIONS & INDIVIDUALS APPEARING BEFORE THE COMMISSION

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J.F. Byng Hall - Managing Director, K.C.C.
F.R. Stephen - Chairman, K.D.B.
N.L.T. Garrett - Executive Officer, K.D.B.
J. Kamau - Chairman Kitiri Co-op. Society, N. Kinangop.
A.R. Melville - Director of Agriculture.
J.K. Gatuguta, M.P.
P.J. Nicholas - Member, K.D.B.
Representatives of the Kiambu and Nairobi Dairy Marketing Co-operative
  Union, including Jackson Kamau, (Chairman) T.M. Waiyaki (Vice
 Chairman) Eluid N. Githire (Secretary).
                                  E.M. Mahiu
R.G.A.)
                                        Were-Austin
         Rift Valley Region
R.A.O.
R.V.S.)
                                        Little
D.H.M. Dempster - Chairman, K.C.C.
Capt. Prettijohn - Chairman, Regional Agricultural Committee, Nakuru.
Mr. Ngumi and Representatives Nakuru Local Committee, K.C.C.
M/S Smith & Morrow - Rongai Valley Association.
Representatives Nyanduru Co-operative Union.
R.G.A., D.A.O., D.V.O. and 40 farmers (approx.) representing
  themselves and Co-operative Societies in the Kericho/Sotik area.
Clerk to the Gusii County Council (Sampson Nyamweya).
                                (S.N. Mwancha).
Vice Chairman
Dairy Farmer Members Gusii County Council.
Chairman, Secretary Gusii Dairy Committee.
Officer i/c Agricultural Research Station, Kisii.
Representatives of Dairy. Industry Kisii & District Totalling 47.
Councillor C.M. Patel - Chairman, Trade & General Purpose Committee -
                                                 Kisumu Municipality
         Y.H. Farjallah, Deputy Chairman, - do - . . . - do
         J.N. Osore
                                                          do
E. Knowles, Town Clerk
S. Horsley, Town Treasurer
C.O. Opanga - Manager, Kisumu Municipal Dairy.
W.O. Omamo - R.A.O.
            _ D.A.O.
Z. Owiro
            _ R.V.O., Western Region.
F. Sakwa
Representatives of Co-operatives Supplying Kisumu Municipal Dairy.
Representatives from Kakamega under the chairmanship of Hon. N. Masengeli,
                                                   M.P.
   and including P.N. Sifuma, Chairman of R.A.B.,
   R.G.A's Kakamega and Bungoma and dairy farmers totalling 23.
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William Kiptoo John Kuriam Jairo Sanwoy C. Maina

Representatives of local farmers, Eldoret district.

THE TRANSPORT OF A STATE OF THE STATE OF THE

Kiblegat M. Barnard - Chairman Eldoret Livestock Committee.

R.A.O.

Avetu

R.V.O.

D.A. Grafton - Eldoret Director K.C.C. & Chairman Uganda Creameries Ltd.

N. Martin - Agricultural Finance Corporation.

E.K. Koech, Chairman of Eldoret K.C.C. Local Committee and 9 members.

Mr. Latke - Murrell & Co. Transport Contractors.

Lucas K. Ngureti, President Central Region.

Daniel Owino - Ag. Civil Secretary Central Region.

James W. Maina - Ag. Asst. D. of A. - do -

12 Representatives of Central Region Co-operatives under the Chairmanship of T.M. Waiyaki.

M.H. Motiga - R.G.A., Embu.

S.N. Kanai - D.A.O., Embu.

N. Mbogori - Chairman, D.A.C., Meru.

Representatives of Embu Farmers.

Mr. Mulinda - Civil Secretary, Coast.

Mr. Stern - R.A.O., Coast.

Mr. Smith - R.V.O., Coast.

Hon. R.S. Matano, M.P., Coast.

R.D. Chater, General Manager, Mariakani Milk Scheme.

Guldawood Alibhai - Island Milk Producers.

Hon. R. Ngala, M.P. and Delegation from Mariakani Dairy & Farm Produce Co-operative Society (In Formation).

Messrs. Pilbrow and Trench - Wilson Bros., Kilifi.

Representatives Kiberani Dairies.

Mr. Bunderson - Regional Range Officer, Coast.

Sir Wilfrid Havelock.

Dr. Rosenvaal, M.O.H.

Dr. Rantawa, M.O.H.

K. Husseini and Representatives Husseini Dairies & Island Producers Represented by Advocate Mr. Ghalia.

A.E. Dorman - Director, Veterinary Services.

A. Storrar - Director of Settlement.

S.S. Heyer - Senior Economist/Statistical Officer.

J. Tameno - Executive Officer, K.D.B.

Sir Donald MacGillivray - Chairman, E.A. Livestock Survey.

.Dr. K.V.L. Kesteven, Director of Animal Production & Health Division F.A.O.

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J.H. Gaster - Sales Manager, K.C.C.

BIBLIOGRAPHY REFERRED TO BY THE COMMISSION

- 1. Development Plan 1964-70 Government of Kenya.
- 2. Agricultural Census 1963 (large farm areas).
- 3. An Economic Survey of the Dairy Industry in Kenya 1963
 Economic & Statistics Division (Heyer).
- 4. Dairy Industry Inquiry 1956 (Troup).
- 5. Kenya Dairy Board Annual Reports.
- 6. Kenya Co-operative Creameries Ltd. Annual Reports.
- 7. Mariakani Milk Scheme Annual Accounts.
- 8. The Dairy Industry Ordinance 1958 * Seq. including Draft Bill.
- 9. Economic Case Studies of Farms Farm Economics Survey Unit.
- 10. New Zealand Dairy Production & Marketing Board Annual Report 1963.
- 11. The Dairy Industry of Kenya R.A. Pepperall 1950.
- 12. Cream Country M.F. Hill 1956.
- 13. Report on Tour to Australia & New Zealand By the Chairman, Vice Chairman and General Manager, K.C.C. 1954.
- 14. Annual Report Australian Dairy Produce Board 1963.
- 15. Report of the Fiscal Commission Government of Kenya 1963.
- 16. The Economic Development of Kenya International Bank for Reconstruction and Development (1962).
- 17. Review by the Commonwealth Economic Committee.
- 18. The Milk Marketing Industry Roadhouse & Henderson.

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National Assembly, Parliament Buildings, P.O. Box 1842, NAIROBI.

10th October, 1968.

REPORT OF THE SELECT COMMITTEE TO INQUIRE INTO ALLEGATIONS MADE BY THE HON. LUKE-OBOK, M.P. AS TO THE SOURCE OF HIS INFORMATION REGARDING THE REASONS FOR THE DETENTION OF MR. WASHINGTON OKUMU OF EAST AFRICAN RAILWAYS

Mr. Speaker,

1. On 25th September, 1968 the House passed the following Resolution:-

THAT, in view of the serious allegations made by the Hon. Luke-Obok in the House on 19th September, 1968 as to the reason why Mr. Okumu was detained and that the Hon. Luke-Obok had received this information from Mrs. Okumu, and in view of the fact that Mrs. Okumu has since denied giving this information to the Hon, Obok, this House resolves to appoint a Select Committee to investigate and to report to this House on the truth or otherwise of Hon. Obok's allegation regarding his sources of information; and that such a Select Committee shall for the purpose of such investigation have the same power to order attendance of witnesses to give evidence or to produce documents as are conferred by Section 9(1) of the National Assembly (Powers and Privileges) Act upon this House.

Subsequently the Sessional Committee nominated the following Members to serve on this Select Committee:-

The Hon. A.J. Pandya, M.P. (Chairman).

The Hon. T. Okelo-Odongo, M.P.

The Hon. M. Muliro, M.P.

The Hon. M. Ondiek-Chillo, M.P.

The Hon. S.K. Omweri, M.P.

The Hon. M. Jahazi, M.P.

The Hon. J.M. Shikuku, M.P.

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- 3. The Select Committee met on three occasions.
 - (i) On Thursday, 3rd October, 1968, and determined the procedure to be followed in the Committee.
 - (ii) On Wednesday, 9th October, 1968, when the Committee took evidence from witnesses on oath.
 - (iii) On Thursday, 10th October, 1968 to approve the Report.

The following witnesses appeared before the Committee:-

- (1) Hon. Luke-Obok, M.P.
- (ii) Mrs. R.A. Okumu who was represented by her lawyer Mr. Otieno.
- Both Mrs. Okumu and the Hon. Luke-Obok heard each others evidence and were given an opportunity to cross examine each other. Both of them had no witnesses to call.
- 6. The Committee noted that Mrs. Okumu admitted in evidence that she and Hon. Luke-Obok had met at her house and discussed the question of her husband's detention.

The Committee carefully examined and weighed the evidence given before it and unanimously found as fact, in spite of some conflict of evidence as to the exact words used, that the Hon. Luke-Obok's allegation as to the source and nature of information received was true in all material particulars.

7. EVIDENCE: With reference to Standing Order 157(3) the Committee does not consider it necessary or desirable, in a case of this kind, to include in its report, any note or record of the actual evidence received.

Signed:

Chairman

Date: 10 5 (2007, 1968.

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National Assembly, Parliament Buildings, P.O. Box 1842, NAIROBI.

MINUTES OF THE SELECT COMMITTEE TO INQUIRE INTO THE ALLEGATIONS MADE BY THE HON. LUKE OBOK ON THE DETENTION OF MR. WASHINGTON OKUMU HELD ON THURSDAY, LOTH OCTOBER, 1968, AT 9 A.M. AT PARLIAMENT BUILDINGS

PRESENT: - The following Members of the Committee were present:-

The Hon. A.J. Pandya, M.P. (Chairman).

The Hon. Okelo-Odongo, M.P.

The Hon. M. Muliro, M.P.

The Hon. Ondiek-Chillo, M.P.

The Hon. S.K. Omweri, M.P.

The Hon. J.M. Shikuku, M.P.

ABSENT WITH APOLOGIES: - The Hon. M. Jahazi, M.P.

IN ATTENDANCE: - L.J. Ngugi - Clerk of the National Assembly.

MINUTE 4: - The Minutes of the meeting held on 9th October, 1968 were confirmed and signed after a few amendments.

MINUTE 5: - The Committee approved the draft report with minor amendments.

ANY OTHER BUSINESS: - The Chairman thanked the Members of the Committee for their cooperation and adjourned the meeting.

Signed: A.J. Pandya (Chairman)

Date: ..10th October, 1968.

National Assembly, Parliament Buildings, P.O. Box 1842, NAIROBI.

MINUTES OF THE SELECT COMMITTEE TO INQUIRE INTO THE ALLEGATIONS MADE BY THE HON. LUKE OBOK ON THE DETENTION OF MR. WASHINGTON OKUMU HELD ON WEDNESDAY, 9TH OCTOBER, 1968, AT 10.00 A.M. AT PARLIAMENT BUILDINGS.

PRESENT: - The following Members of the Committee were present:-

The Hon. A.J. Pandya, M.P. (Chairman).

The Hon. T. Okelo-Odongo, M.P.

The Hon. M. Muliro, M.P.

The Hon. M. Ondiek-Chillo, M.P.

The Hon. S.K. Omweri, M.P.

The Hon. J.M. Shikuku, M.P.

ABSENT WITH APOLOGY: The Hon. M. Jahazi, M.P.

IN ATTENDANCE: - Mr. L.J. Ngugi - Clerk of the National Assembly.
Mr. R.V. Mugo - Clerk Assistant.

MINUTE 2: - The Committee heard evidence from the Hon. Luke-Obok, M.P. and Mrs. R.A. Okumu who was represented by her lawyer Mr. Otieno.

MINUTE 3: - After agreeing on its findings the Committee directed that the Chairman and the Clerk should produce a draft of these findings for presentation to the Committee.

DATE OF NEXT MEETING - The Committee decided to meet on Thursday, 10th October, 1968 at 9.00 a.m.

Signed: A.J. Pandya (Chairman)

Date: 10th October, 1968.

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Clerk's Chambers, National Assembly, Parliament Buildings, P.O. Box 1842, NAIROBI.

3rd October, 1968.

MINUTES OF THE SELECT COMMITTEE TO INQUIRE INTO THE ALLEGATIONS MADE BY HON. OBOK ON THE DETENTION OF MR. WASHINGTON OKUMU, HELD ON THURSDAY, 3RD OCTOBER, 1968, AT 10.30 A.M. AT PARLIAMENT BUILDINGS

PRESENT: - The following Members of the Committee were present:-

The Hon. A.J. Pandya, M.P. (Chairman).

The Hon. T. Okelo-Odongo, M.P.

The Hon. M. Muliro, M.P.

The Hon. M. Ondiek-Chillo, M.P.

The Hon. S.K. Omweri, M.P.

The Hon. M. Jahazi, M.P.

IN ATTENDANCE: - Mr. Humphrey Slade - Speaker of the National Assembly.

Mr. L.J. Ngugi - Clerk of the National Assembly.

MINUTE 1: - The Chairman explained the terms of reference of the Committee as set out in the Resolution passed by the House on 25th September, 1968.

(b) The Chairman explained the procedure to be followe by the Committee as set out in Section 9(1) of The National Assembly (Powers and Privileges Act.)

DATE FOR NEXT MEETING - Wednesday, 9th October, 1968.

Date: 10th October, 1968.

Signed: A.J. Pandya (Chairman)

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