Development and Management of Rice Processing and Marketing Infrastructure

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KENYA
Rice cultivation was introduced in Kenya in 1907 from Asia.

It is currently the third most important cereal crop after maize and wheat.

It is grown mainly by small-scale farmers as a commercial and food crop.

About 90% of the rice grown in Kenya is from irrigation schemes established by Government while the remaining 5% is produced under rain-fed conditions.
National rice consumption stands at over 540,000 metric tones against a production of 149,000 metric tones of paddy.

The deficit is met through imports which costs the country over Ksh. 14.0 billion annually.

Great potential exists for development of this crop (Approx. 1.3 million ha for irrigated rice & 1.0m ha (Rain fed upland and rain fed lowland)
## Rice production statistics

### Production Figures for the Regions

<table>
<thead>
<tr>
<th>Year</th>
<th>Area (ha)</th>
<th>Production (tons)</th>
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<th>Production (tons)</th>
<th>Total Area (ha)</th>
<th>Total Production (tons)</th>
<th>Yield (tons/ha)</th>
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10/6/2016
KENYA NRDS PRIORITY AREAS

Kenya

- Production area
- Untapped potential Area
- Consumption area
- Research station
- Project sites
- Seed distribution facilities

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A CASE STUDY OF MWEA IRRIGATION SCHEME

- Mwea is the biggest rice producing scheme in Kenya
- It was established in 1953 by British Government.
- It was handed over to the Government of Kenya in 1963.
- The main scheme covers about 8000 hectares and supports over 6,000 farm families
- The Ministry of Agriculture ran the scheme until 1966 when it handed over the scheme to the National Irrigation Board (NIB).
MWEA IRRIGATION SCHEME
---ROLES OF NIB

- Development and maintenance of irrigation infrastructure.
- Provision of water
- Management of the scheme
- In collaboration with farmers
- Provide processing facilities for agricultural produce grown or produced in national irrigation schemes.
- Paddy collection, milling and Marketing
- Marketing was strictly by the government through NIB and the National Cereals and Produce Board (NCPB).
In addition, the NIB was mandated to:

- Impose a cess on all or any agricultural produce grown and processed in a national irrigation scheme to meet cost of services provided in the scheme.

- NCPB entry into the milling of the paddy was not until the year 2003/2004.

- No other miller was allowed until after 1998.
Strength

- Funds were available from the Government/Donor funds for purchase of processing and storage infrastructure
- Skilled manpower (In all areas of operations)
- In marketing there was Government protection

Weaknesses

- Delays of operations due to processes and bureaucracy
- Laxity of the personnel
- Farmers had little say over pricing and marketing of their paddy
The restrictive rules and regulations and the absence of the voice of the farmers within the management resulted to some of reasons for violent riots witnessed between 1996 and 2000
CHANGE OF MANAGEMENT

- After a heightening of confrontations between the NIB and the farmers, the latter took over the running of the scheme in 1998.
- Farmers demanded for a greater say on the way the scheme is managed.
- Farmers established Mwea Rice Growers’ Multipurpose Cooperative Society which took over the management of the scheme in 1998.
- NIB was left with the responsibility of development and maintenance of the infrastructure (e.g. Road, canals).
NIB - Development and maintenance of the infrastructure in the scheme – Roads, main canals and provision of water
Ministry of Agriculture – Provision of extension services
Ministry of Cooperatives– Establishment and capacity building of farmer organizations
Farmers formed management committees to run the scheme issues
  • Irrigation water users association- to manage water use, and conflicts within the blocks.
  • Block committees to manage ploughing schedules, maintenance of lesser canals, collection of paddy and other farmer demands
How rice processing and storage was developed and operated

After the takeover milling for the cooperative was done by

- 5 single parse milling machines and others leased from the private sector. (1999)
- By the year 2000 farmers cooperative bought more advanced mill and built stores through finances from:
  - Members contributions
  - Fees from services rendered (tractors and milling)
  - Proceeds from selling of rice - bags pledged by farmers.
The cooperative had to employ management and operation team:

- Engineers
- Mechanics
- Extension officers
- Clerks and accountants
- Marketing staff
Mwea Rice Growers’ Multipurpose Cooperative Society is one of the major marketing entities of rice. The cooperative mills, process, grade and package the rice and supply to major consumers including, supermarkets, hospitals, schools, traders and direct consumers.

Better prices offered by cooperative motivated farmers to produce more rice.

This led to emergence of private sector who manage more advanced mills.

Very many entrepreneurs have come up in rice marketing.
COOPERATIVE STORES

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COOPERATIVE MILLS AND CAPACITY
COOPERATIVE BUSINESS---

Strengths

- Cooperative members have a say in the control of the organization, kind of service provided.
- There is an assured volume of business. This in turn is favorable to efficient operation of the cooperative.
- Bargaining power- Due to collective action

Weaknesses

- Weak management. Lack of adequate skills and exposure.
- Sense of dishonesty
- Politics
- Inadequate capital to hire qualified and competent personnel
- Limited milling capacity and inadequate critical machinery
- Delays due to late approvals from management board
- Do not cover non members
PRIVATE SECTOR
Have employed skilled manpower
Timely operations
Provide storage of paddy for the traders (an assurance of paddy for milling)
Provide processing services to the traders at a fee
Offered Trading floor for the traders.
PRIVATE SECTOR: STORAGE
PRIVATE SECTOR: RICE TRADERS
PRIVATE SECTOR: BRANDED RICE DISPLAY AND SELLING POINT
PRIVATE SECTOR: MANAGEMENT AND OPERATION

STRENGTHS

- High efficiency of operations
- High skilled manpower
- Maintenance and repairs done promptly.
- Fast decision making and implementation
- High capacity milling machines leading to high turnover.

WEAKNESSES

- One man show
- Quality adulteration
- Stakeholders have no say
- Exploitation of the farmers
Farmers have much higher incomes—Prices paid to farmers have almost doubled

- Reduced cost of services provided by the cooperative
- Send their children to better schools and health facilities
- Improved housing.
- Farmers have opened up new land for rice on their own initiative (Out-growers) thus expanding the scheme.
- Overally, the socioeconomic status of the entire area has improved.
MOTIVATED FAMILIES WORKING IN THE FARMS
UPCOMING DEVELOPMENTS DUE TO RICE COMMERCE IN THE AREA
When farmers come together in one accord they build synergies which if positively utilized can bring about desired goals.

All players along the value chain have benefited from the industry.

A lot of commercial activities and investments have sprung up in the area as result of the private sector involvement.
Should not do

- Government can never make a good business entity.... So should not be in business

Should do

- Formulate and implement policies and regulations that support and encourage private sector involvement and promotion of commerce e.g. policies on financial, marketing, input and credit acquisition
Improvement of infrastructure - scheme Roads, Canals & Dams

The water not enough due to the increasing number of farmers growing rice - dam supplying the scheme need be expanded.

Efficient water use technologies - lining canals, WSRC

High yielding varieties

Better post harvest technologies

Variety specific agronomic packages

Develop and Organize market and marketing systems
Canal in the rice field
Thank you

Asante Sana,
Arigato gozaimasu