bb **EGERTON  UNIVERSITY**

proposal document

for

Title: cereals board farmers portal

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# ABSTRACT

The project research was done in the backdrop of the current scandal that has rocked the NCPB due to delays in payment of farmers. The NCPB has found itself being taken advantage of by 3rd parties who have connived with a few staff members in order to take advantage of the process of grain delivery and payments thus stealing funds meant for farmers the problem being that there is hardly any vetting and thus anyone can claim to deliver grains to the ncpb the records kept are also poor with the forms given after grain delivery lacking necessary security features thus easily replicated. Therefore a system is need to solve the problem of farmer verification and vetting to ease the process of payment approval as well as to securely store the farmer records to enable ease of auditing

.Therefore The Cereals Board Farmers portal is a system that once implemented will ease the process of farmer’s registration and records storage. It will help in verification of the farmers details thus helping the farmers get paid quicker.

Easy verification will also help to deter third party traders who take advantage of the current system and thus ensure the money set aside to pay farmers end up in the farmer’s pockets

By registering farmers into local SACCOS the process of verification can be localized and therefore make it easier for the government to track the farmers easily and during audit find those who aren’t genuine

# CHAPTER 1

## INTRODUCTION

The **national cereals and produce board** was established in 1979 by the government by merging the Maize and Produce Control Board and the Wheat Board of Kenya in order to streamline the management marketing and handling of all grains in Kenya . The NCPB act of 1985 commercialized the body giving it legal monopoly to purchase store market and generally manage all grains in the country. The NCPB is facing its biggest challenge yet in its near 40 year history with claims of massive corruption and payment delays leaving farmers frustrated seeking for alternatives to maize growing . While genuine farmers were crying over non-payment 152 suspects were being lined up for questioning over receiving money meant for hard working farmers. Those targeted in this investigations are accused of having connived with NCPB officials to infiltrate the process as there is hardly any vetting conducted and taken advantage of the poor records system in place . They are said to have swindled 2 billion ksh using fictitious figures of bags they said to have delivered to the silos. While an internal audit showed that managers and staff at the depot silos ignored a guideline that states that they shouldn’t receive grains from farmers who don’t appear in the register. In addition to that the managers were faulted for failing to ensure that farmers were vetted before delivery time arrived . The audit also found fault in the forms used by the board once maize is delivered noting that they can easily be replicated as they lacked security features . Therefore in the midst of all this a system that provides all the necessary checks and balances and streamlines the process of vetting and payments was need in order to make it harder for those who want to take advantage of hardworking farmers to do so and provide the necessary paper trail if they try . Thus Cereals Board Farmers portal is a computerized system which will store the records of maize farmers around the country who sell their maize to NCPB . It will improve efficiency in the verification of farmers reduce the documents which the farmers have to present when delivering the grains and help track the payments made to the farmers.

## .

## OVERVIEW AND LITERATURE REVIEW

Kenya is an agricultural economy a large portion of the Kenyan population depend on farming not only as a means of food (subsistence) but also as a means of livelihood (commercial ). Maize and other Cereals form the staple food of this country and therefore play a crucial role in achieving food security. Therefore the National Cereals and produce board was formed with a mandate of

* keeping a strategic grain reserve on behalf of the government to aid in food security
* Commercial roles (grain trading) which is its core business
* Famine relief - . The board facilitates the procurement, storage, maintenance and distribution of famine relief food to deficit areas, under the National Famine Relief Program.

Whilst the board has been commissioned to perform all these roles it has encountered problems when it comes to fulfilling their core business which is buying grains from farmers and paying them on time. The industry has been infiltrated by several third parties who are difficult to track and who have ended up taking money meant for genuine hard working farmers and this has led to disenfranchisement of those farmers , some even resulting to converting their crops to animal feed . An audit showed that one trader sold around 212000 bags of maize to the board it found there to have been a total 18 such traders who were paid shs 2 billion in a period of 3 months money meant for the farmers.

The government has tried to address this problem by introducing new measures for registration of farmers where they will be required to produce their farm title deeds in order to be verified.

Therefore there are massive problems at the board that need to be streamlined in order to help regular hard working farmers get their just dues.

## PROBLEM STATEMENT

The project research was done in the backdrop of the current scandal that has rocked the NCPB due to delays in payment of farmers. The NCPB has found itself being taken advantage of by 3rd parties who have connived with a few staff members in order to take advantage of the process of grain delivery and payments thus stealing funds meant for farmers the problem being that there is hardly any vetting and thus anyone can claim to deliver grains to the ncpb the records kept are also poor with the forms given after grain delivery lacking necessary security features thus easily replicated. Therefore a system is need to solve the problem of farmer verification and vetting to ease the process of payment approval as well as to securely store the farmer records to enable ease of auditing

## JUSTIFICATION

Due to the fact that 3rd parties have been able to take advantage of the lack of vetting poor records keeping and lack of secure forms provided in the grain delivery process , the need for computerization becomes imperative.

This will help in

* Keeping an easily retrievable record of verified farmers and thus reduce the time required to process and approve payments
* Reduction of the bulkiness of the files on record
* Reduction of the documents that farmers have to carry when presenting the grains which currently include a letter signed by the chief, ward administrator and an officer from the ministry of agriculture to just the national ID.
* Allow board personnel at the depots to process the farmers delivery without being overworked

Computerizing the registration and verification of farmers as well as their grains delivered should therefore cut the time between delivery and payment and allow farmers to be paid on time before the next planting season begins. It will also give the government a quick record that can be audited easily which will help catch and prosecute the 3rd parties that seek to take advantage of farmers and act as a deterrent to others. Lastly it should help the farmers by reducing the long lines and cutting the time wasted during delivery.

## OBJECTIVES:

The aim of this project is to help improve the efficiency through which farmers payments are approved. This will be through proper keeping of farmers records.

# CHAPTER 2

As explored in the previous chapter there are institutional problems in the NCPB that make them a soft target for a few well connected individuals with bad intentions. The biggest of this problems is a lack of vetting thus making it easier for non genuine 3rd parties to claim payments meant for farmers. Therefore there is a need of a new system that will help solve the problems of vetting ease the approval of vetting while also providing a means to enable auditing to be done to easily identify those who try to benefit off of the hard work of others. The proposed solutions to these are as follows

## PROPOSED SOLUTION

* A system that groups all farmers across the country into local SACCOS thus sub-dividing the farmers records and placing them under easily verifiable umbrellas.
* There will be reduction in the amount of resources spent since information will be stored in a database with reduced data Redundancy.
* Enable easier tracking of grains sold by farmers that are in the NCPB silos
* Reduce the amount of documents a farmer has to produce during delivery of grains from 3 to just 1
* Localize the grain delivery process which will reduce the amount of time farmers spend in lines.
* Limit access to data captured only to selected people to enhance data security.
* Reduction in bulkiness of files and record.

## METHODOLOGY

The model used in coming up with the cereals board farmers portal system is the spiral model.

1. Identification cumulative 2. Design

cost

Review business req

Detailed design

Code

Integration

Test

Implementation

Customer Feedback

Release

4.Evaluation and risk analysis 3. Construct/build

**Spiral model diagram**

## PROJECT SCOPE

The proposed system is supposed to cover the following areas:

1. Registration of farmers into the system and grouping them into various local SACCOS for ease verification.
2. Farmer & sacco records data entry and verification of the data entered
3. Authenticate Login Facilities for users and system administrators.
4. Accurate records of grains delivered by verified farmers SACCOS in the silos kept
5. Approval of payments to be given out to farmers after verification process

**RESOURCES**

The resources required to support this project include

* User(s)
* Administrators
* Network access
* Finances
* Hardware
* MY SQL for data storage

# CHAPTER 3

## PRELIMINARY RESULTS AND EVALUATION

Once the system is deployed the expected results would be the registration of new SACCOS to manage farmers, registration of farmers into the system through these SACCOS easing the verification and auditing process. Reduce time taken by farmers during delivery therefore cutting long lines. Reduce time taken to pay farmers due to a more efficient verification process this will also help in deterring and eventually eliminating 3rd party traders as they can easily be traced . Keep a detailed record of farmers and thus enabling studies to be conducted and allowing the board to see which areas produce low yield and what improvements can be done to help the farmers.

# CHAPTER 4

## CHALLENGES OBSTACLES AND RISKS

The issue of maize is a hot topic in Kenya at the moment and therefore the main risks in seeking to reform this sector is political. There are various groups in the cereals sector each representing different interests and thus seeking to streamline the sector can face major pushback from those who are benefiting from the current system as is. This risk can be mitigated by creating a system that seeks to incorporate all major legal stakeholders in the maize sector as much as possible.

Other challenges include:

1. Budget Risks:

* Cost overruns
* Wrong budget estimation
* An expansion in the scope of the project

1. Technical risks

• Continuous changing requirements.

• Product is complex to implement.

• Difficult project module implementation.

Schedule risks which can include wrong time estimations or an unexpected increase in project scopes this could lead to delays in delivery of the system and client frustration.

# CHAPTER 5

## SCHEDULE

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
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| Week | 1 | | | 2 | | 3 | 4 | 5 | 6 | | | | 7 | | | | 8 | | | 9 | | | | 10 | | 11 | | |
| Documentation | Project proposal | | | |  | |  |  |  | | | |  | | | |  | | |  | | | |  | |  | | |
|  | |  | | Software Requirement specification | | |  |  | | | |  | | | |  | | |  | | | |  | |  | | |
|  | |  | |  | |  | Software design description | | | | | | |  | |  | | |  | | | |  | |  | | |
|  | |  | |  | |  |  | | | | Test plan | | | | | |  | | |  | | |  | | |
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| Project implementation |  | |  | |  | |  |  | |  |  | | | | |  | | |  | | | |  | |  | | |
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## BUDGET

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| --- | --- |
| **RESOURCE** | **ESTIMATED COST(KSHS)** |
| Development team salary | **70000** |
| Questionnaire | **1200** |
| Network Connection | **5000** |
| Travel | **1200** |
| Testing | **1000** |
| Hardware resources | **60000** |
| **TOTAL** | **138400** |

# CHAPTER 6

## CONCLUSIONS AND FUTURE WORK

The cereal board farmers portal once implemented will help increase efficiency in how farmers records are kept. This will have several benefits chief among them being that the verification process for farmers will be streamlined which should prevent farmers getting taken advantage of and help their payments get processed quicker . The system can be modified in future to include other sectors as well for example tea coffee and livestock.

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