

**\***\*\*\*\*\*\*\*\*\*\*

## A TECHNICAL REPORT

ON

STUDENTS' INDUSTRIAL WORK EXPERIENCE SCHEME (SIWES)

#### **CONDUCTED AT:**

## MHSS ATOLAGBE GOBIR FARM INDUSTRIES

KARUMA SECONDARY SCHOOL AREA, ILORIN, KWARA STATE

## **COMPILED BY:**

# ABDULRASAQ MUHAMMED ADESHINA

ND/23/AGT/PT/0026

**SUBMITTED TO:** 

DEPARTMENT OF AGRICULTURAL TECHNOLOGY, INSTITUTE OF APPLIED SCIENCE (I.A.S), KWARA STATE POLYTECHNIC, ILORIN.

IN PARTIAL FULFILLMENT OF THE REQUIREMENT FOR THE AWARD OF NATIONAL DIPLOMA IN AGRICULTURAL TECHNOLGY.

SEPTEMBER – DECEMBER 2024

## **DEDICATION**

This report is dedicated to Almighty God, the Most Gracious, and the Most Merciful, whom alone deserves all the praises for sparing my life, giving me energy and seeing me through the period of the training.

#### **ACKNOWLEDGEMENT**

All thanks and praises unto the Almighty, The Lord of the Glorious throne and of Mighty Grasp who out of abundant mercies granted me uncommon grace to complete my SIWES successfully.

My special thanks also go to the Head of Department and the entire staff of Agricultural Technology Department, Institute of Applied Science (I.A.S), Kwara State Polytechnic for sharing wealth of experience with me in my course of study.

I also appreciate my parents **MR. & MRS. ABDULRASAQ**, for their full support and total care.

Furthermore, thanks to my able and diligent coordinator for his support towards the successful completion of the training.

## **REPORT OVERVIEW**

This report is basically an account of the knowledge and experience gained during the Students' Industrial Work Experience Scheme (S.I.W.E.S) program, held at MHSS ATOLAGBE GOBIR FARM INDUSTRIES, at *Karuma Secondary School Area, Ilorin, Kwara State* which lasted for a period of 4 months. Students' Industrial Work Experience Scheme (S.I.W.E.S) is a program designed for students in the higher institutions of learning to acquire practical experience in their various fields of study. In the course of this report, I shall focus on the basic activities carried out which are of relevance to my field.

#### **TABLE OF CONTENTS**

#### TITLE PAGE

DEDICATION

ACKNOWLEDGEMENT

REPORT OVERVIEW

#### **CHAPTER ONE**

- 1.1 Introduction
- 1.2 General Background of SIWES
- 1.3 Objectives of SIWES

## **CHAPTER TWO**

- 2.1 Location and brief history of the establishment
- 2.2 Various departments/Unit and their Functions
- 2.3 Organizational structure of the establishment

## **CHAPTER THREE**

Activities Carried Out During The Training

#### **CHAPTER FOUR**

Continuation Of Activities Carried Out During The Industrial Attachment

**CHAPTER FIVE**: Summary, Recommendations And Conclusion

- 5.1 Summary
- 5.2 Challenges Faced
- 5.3 Recommendations for improvement
- 5.4 Conclusion

#### **CHAPTER ONE**

#### 1.1 SIWES INTRODUCTION

The Students' Industrial Work Experience Scheme (SIWES) is an accepted skill training program which forms part of the approved minimum academic standard in various programs for all Institutions in Nigeria.

It is an effort to bridge the gap in between theory and practical of Engineering and Technology, Science, Agriculture, Management and other professional educational program in the Nigeria Institutions.

## 1.2 GENERAL BACKGROUND OF SIWES

**SIWES** was established by Industrial Training Fund (I.T.F) in 1973 to solve the problem of lack of adequate practical skills. SIWES is funded by Federal Government of Nigeria and operated by I.T.F, the coordinating Agencies; Nigeria Universities Commission (N.U.C), National Council for Colleges of Education (N.C.C.E), National Board for Technical Education (N.B.T.E).

The beneficiaries of SIWES include; Undergraduate students of Agric Technology, Engineering, Environmental Sciences, Education, Medical Sciences, Pure and Applied Science. The duration for the program varies, thus: 4 months for Polytechnics & Education and 6 months for Universities.

#### 1.3 OBJECTIVES OF SIWES

- ➤ To provide an avenue for students in Institution to acquire industrial skills and experience during their course of study.
- To prepare students for the work situation likely to face after graduation.
- > To enable student to defend his/herself in anywhere he/she found itself.

#### **CHAPTER TWO**

#### 2.1 BRIEF HISTORY & LOCATION OF THE ORGANIZATION

MHSS ATOLAGBE GOBIR FARM INDUSTRIES located at *Karuma Secondary School Area, Ilorin, Kwara State* is an Agricultural and other Agrorelated services industry. The organization specialize mainly on Poultry, poultry management, farming equipment, crop production and general agricultural services. The founder recognized the potential for Agricultural growth in the state and established the business with the aim of providing quality services to the community. Over time, MHSS ATOLAGBE GOBIR FARM INDUSTRY has become a household name in Ilorin, synonymous with reliability and customer satisfaction.

MHSS ATOLAGBE GOBIR FARM INDUSTRIES continues to chase her vision by continual training and empowering Youth and Kids with Agriculture & farming skills, maintenance solutions, and becoming the best Agricultural professional dreams employer.

#### 2.2 VISION AND MISSION OF THE ORGANIZATION

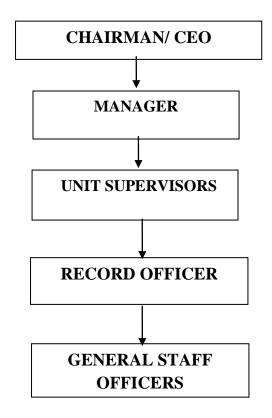
#### Vision

- ❖ To become one of the leading Agricultural firm
- ❖ To continually provide excellent value and innovative farming services to meet the expectation of our clients and beyond.
- ❖ To be a first-thought Agricultural firm in the minds of our esteemed clients through provision of exceptional and professional services while prioritizing the use of modern and sophisticated technologies.

## **Mission**

- ❖ To provide the highest level of service in the farming industry while offering superior professionalism to every contract we handle.
- ❖ To innovate, develop, renovate and adopt state-of-the-art technology in methods and materials to enhance productivity.
- ❖ To mitigate all the environmental impacts arising from our industrial activities and comply with the applicable environmental norms.

## 2.3 ORGANISATIONAL STRUCTURE



#### **CHAPTER THREE**

#### 3.1 ACTIVITIES CARRIED OUT DURING THE TRAINING

I had Orientation and meeting with staff; observing activities being carried out. At my place of attachment, I was assigned to various sections where I observed, practised and assisted in some farming duties. Among other things, I was exposed to the rudiments and practice of poultry and its maintenance, as well as vaccination.

#### **❖ INTRODUCTION TO POULTRY PRODUCTION.**

Poultry production in a simple term means rearing of domesticated birds, like ducks, broilers, pullets, quails, turkeys etc. and its production for human consumption. Since poultry meat is very nutritious and supplies the required protein and the birds very easy to manage, many people see it as a worthwhile business to venture into.

Also, there is high demand for animal source of protein in human diet and since this could be easily derived from poultry meat and its products e.g. eggs, there will be no loss of energy in seeking for knowledge on its rearing and management even if it is at small scale.

#### PREPARATION FOR THE ARRIVAL OF CHICKS

It starts two weeks to the arrival of chicks. The brooder house should be thoroughly swept, washed with hot solution of disinfectant, usually done under pressure from high pressure washing machine. The house is then allowed to dry, close up and fumigated.

2 days to the arrival of chicks, litter materials are spread on the floor to a height of about 5cm and other appliances are placed at their proper position. The hover is switch on to pre-heat the house.

2 hours to the arrival of chicks, feed and water are served / supplied in their respective container.

On arrival, the chicks are unboxed and examined for weak and dead ones.



## **ROUTINE OPERATION**

- Routine operations are carried out throughout the period; first in the morning, all dead chicks are removed.
- Supply of fresh feed up to one-third to half of the feeding trough.
- Drinkers are washed and supplied with fresh clean water.
- Turning of the litter is done 2-3 times in a week.

- Any extraneous materials such as litter in the feed or water are removed on daily basis.
- Record keeping of the flock.

## DISEASES AFFECTING POULTRY MANAGEMENT

- 1. **COCCIDIOSIS**: Outward signs of coccidiosis in chickens include droopiness and listlessness, loss of appetite, loss of yellow color in shanks, pale combs and wattles, ruffled, unthrifty feathers, huddling or acting chilled, blood or mucus in the feces, diarrhea, dehydration, and even death.
- 2. NEW CASTLE DISEASE: Newcastle disease only affects birds, particularly poultry, such as chickens. It can cause illness and death in large numbers of birds quickly. Infected birds may show signs of: loss of appetite, coughing, gasping, nasal discharge, watery eyes, bright green diarrhoea and nervous signs such as paralysis and convulsions
- **3. FOWL TYPHOID**: Infected chicks exhibit weakness, poor appetite, and stunted growth, and they may make shrill chirping and peeping sounds. In addition, their droppings are chalky white. Signs of this disease may not appear for the first five to ten days after infection.

## **\* VACCINATION**

Newcastle Lasota is a monovalent live virus vaccine for the immunization
of chickens against Newcastle disease. The Lasota vaccine, a live virus
vaccine against Newcastle disease, is recommended for healthy chickens
at one day of age (eye-drop method) or 14 days of age or older.

#### **HOW WE APPLIED**

We mix the vaccine with clean water enough for the chickens to drink within 2 hours. Before taking the vaccine, feed the chickens normally and stay thirsty for 2 - 4 hours to ensure that all the chickens are fully vaccinated. - The first vaccination, 5- 7 days of age.

- **Gumboro Vaccine:** Gumboro disease, or Infectious Bursal Disease (IBD), is a highly contagious disease in young chickens, and vaccination is the primary method of prevention. Vaccines can be live, attenuated (weakened) viruses, or inactivated (killed) virus vaccines.

## **Vaccination Strategies:**

## **Hatchery Vaccination:**

Vaccinating chicks at the hatchery can help ensure uniform and complete coverage of flocks, blocking the bursa and preventing field virus infections.

#### **Field Vaccination:**

Vaccination in the field (on farms) can be done via drinking water or by injection.

Mix Gumboro vaccine in drinking water, reconstitute the vaccine with sterile water, then add the mixture to clean, non-chlorinated water, ensuring the birds consume it within 1-2 hours.

#### Time of Vaccination

Two vaccinations with a 5-7 day interval between the first and second vaccination are often recommended.

#### CHAPTER FOUR

#### 4.1 FURTHER ACTIVITIES CARRIED OUT

4.0

Throughout my **SIWES** programme, I utilized a range of tools and equipment essential to the daily operations of Poultry management, and as a result I become more acquainted with their functions.

## POULTRY EQUIPMENT

Poultry equipments are materials used in the poultry to raise poultry birds. e.g. drinkers, feeders etc. The following equipment, instruments and utensils are necessary in the day to day operation of a poultry farm:

## USES AND MAINTENANCE OF THE EQUIPMENT USED

**1.** Wheel Barrow: This is the conventional load carrying equipment used mainly in carrying feed materials and other moderately heavy objects from one place to the other in poultry farm.

**Maintenance**: Wash the barrow immediately after each day work with mild solution of disinfectant and allow to dry, then keep in a dry cool place.

**2. Buckets:** This could be plastic or galvanize bucket used for carrying feed, water or poultry products.

**Maintenance**: Wash with mild solution of disinfectant and allow drying then keeping in a cool dry place.

**3.** Egg Tray: This is used to carry table eggs in poultry. It could be paper, plastic or disposable type.

**Maintenance**: If it is plastic type wash frequently with disinfectant to avoid it being a contaminant.

**4.** <u>Feeders:</u> Feeders are always in two categories i.e. chick feeder which is meant to be used for chicks between the day old through four to five weeks of age and on the other category we have hanging feeder, troughs etc. used for older birds.

**Maintenance**: Clean Feeder daily and turn out stale feed before serving another one.

**5. <u>Drinkers:</u>** We have chick's drinker for young birds, water trough for older birds and automated drinking system in large poultry farm where birds drink through the beak contact with nipples on the water line.

**Maintenance:** Make sure your water line is free of any dirt that could block it and contaminate your water and or promote growth of algae.

6. <u>De-beaking Machine:</u> This machine is used to cut and cauterize outgrown beak of birds especially when vice, habits like cannibalism, egg pecking and feather pulling is noticed amongst your stock.

Maintenance: Wipe clean after use and keep in a dry cool place.

7. <u>Drug Store:</u> This is where drugs are stored.

Maintenance: Maintain proper sanitation of the store and the stored products.





IMAGES OF A FEEDER & DRINKER

#### **❖** OKRA PRODUCTION

In another engagement, I joined the farm officers to participate in the planting of Okra. To ensure a successful harvesting, we deployed all necessary attention to the plant ranging from wetting, clearing of bush, Irrigation and application of herbicides and fertilizers.

Okra is fruit, though it is eaten as a vegetable. Okra production involves preparing well-drained, fertile soil, applying fertilizer, ensuring adequate irrigation, planting seeds or seedlings, and managing weeds and pests, with harvesting occurring when pods reach the desired size and tenderness.

## **Planting**

The planting of Okra can be done either directly in the garden or first on the nursery site before transplanting. Okra survives well in fertile, well-drained soil preferably loamy. We sometimes soak the seeds overnight in tepid water to help speed up germination. Intra-row spacing (spacing in between plants on the same row) on the permanent field is about 1 -2 feet apart, while inter-row(spacing in between rows) is about 3-4feet apart

#### TYPES OF OKRA

- ✓ Alabama red
- ✓ Blondy
- ✓ Silver queen

#### HARVESTING OF OKRA

Okra matures quickly, especially when there is hot weather which the plant prefers. It takes about four days from the time of flowering to the time to pick okra. We harvest okra every other day to keep them producing as long as possible. Our harvesting occurs when the Okra when seed pods are 1 to 2 days old and 2 to 4 inches long.



#### **CHAPTER FIVE**

#### 5.1 SUMMARY

**5.0** 

The report stated the objective of SIWES which is to provide an avenue for students in institution of higher learning to acquire industrial skills and experience in their approved course of study and also prepare students for the industrial works situation which they are likely to meet after graduation.

The report also stated the description of the establishment of attachment and the work carried out during the attachment period. More so, it stated the problems encountered during the programme and also gave suggestion for improvement of the scheme.

## 5.2 CHALLENGES FACED

- **1.** <u>Cost of Transportation</u>: The cost of movement To and Fro everyday was a big challenged that I faced in the course of undergoing my SIWES training.
- **2.** <u>Time Constraint</u>: Meeting work deadlines and completing tasks within a stipulated timeframe posed a significant challenge. The fast-paced nature of industrial settings often demands quick turnarounds, leaving limited time for indepth analysis and thorough exploration.
- **3.** <u>Task Ambiguity</u>: Some projects lacked clear guidelines or had ambiguous objectives. This ambiguity made it challenging to devise a structured approach and necessitated creative problem-solving skills.

#### 5.3 RECOMMENDATION

As a result of difficulties experienced during the Four months SIWES program, I will like to recommend the following changes;

- ➤ The Industrial Training Fund should make monthly allowance available for students, so as to put end to financial difficulties that may arise as a result of transportation problems.
- ➤ The Institution must confirm that each student partake in the Industrial Training program, by making sure that they pay every student a visit before the end of the program.
- ➤ The Institution and Industrial Training Fund should help the student to get the place of attachment, so that the program will commence as planned.
- > Students on SIWES program should be posted or deployed to the Organizations, Department or Firms that are relevant to their Course of study, so that the sole aim of SIWES can be achieved.

#### 5.4 CONCLUSION

A solid experience has so far been gained from the Students' Industrial Work Experience Scheme (SIWES), which has exposed me to the practical aspect of some Poultry Production and management as well as planting of Okra.

In poultry production, I have been exposed to rearing of layers, Incubation processes in Poultry, Vaccination, various poultry equipment, uses and maintenance of the equipment.

Conclusively, the programme allowed me to apply theoretical knowledge in a practical setting, gaining insights into farm work and general field practice. I also learned the importance of teamwork, effective communication, and adaptability in a fast-paced environment.