
**COMPARISON OF THE EFFECTIVENESS OF CARICA PAPAYA (PAWPAW) AND
AZADRACHTA (NEEM TREE) AS PHYTO DRUGS IN THE MANAGEMENT OF
GASTRO INTESTINAL NEMATODES IN INDEGENEOUS POULTRY**

BY

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THE AWARD OF A BACHELOR IN ANIMAL PRODUCTION AND MANAGEMENT**

DECLARATION

I, Kitela Dan, declare to the best of my knowledge and believe that the work herein was done by me and has never been submitted to any university or institution for any award. I therefore, present it in partial fulfillment for the award of a Bachelor of Animal Production and Management at Busitema University Arapai Campus.

Sign..........

Date.....29/08/2019.....

KITELA DAN

This dissertation has been submitted for examination with approval from the university supervisor, (Dr. Etianga S. Patrick).



DEDICATION

I dedicate this work to my entire family more so to my beloved parents Mr. Magomu Charlese and Mrs. Magomu Margret for their financial support, educational advise and encouragement they gave to me. how I pray is that God continues to give them a gift of life so that they may also enjoy the fruits of my education.

I also with special honor thank my supervisor Dr. Etianga Patrick for his endurance and guidance he proffered to me during the research study, I pray God almighty blesses you abundantly.

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LIST OF ABBREVIATIONS

EPG	Egg Per Gram
etc	and many others
FAO	Food and Agricultural Organization
ie	that is to say
UBOS	Uganda Bureau of Statistics

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ABSTRACT

This study was conducted to determine the effectiveness of carica papaya and Azadirachta indica seed powder on the management of some of the common gastro intestinal nematodes in indigenous poultry birds. 20 birds of about 6-9 months showing signs and symptoms of worm infection were selected for this study. The birds had been vaccinated against Newcastle disease, infectious bronchitis and Gumboro. The study was conducted for one month that is from June to July 2019. During this time, birds according to their experimental groups ie A, B and C were housed in separate rooms. Birds in group A were fed on feeds mixed with carica papaya seed powder, those in group B were fed on feeds mixed with neem tree seed powder while those in group C acted as a control. Counting of worm eggs in chicken fecal matter shall be done to determine the level of infection at the different periods during the experimental study. Initially before introducing the feed mixed with carica papaya and neem tree powder, the number of worm eggs shall be determined microscopically with the help of a mac slide. After a period of about 2 -4 weeks, a final worm egg count shall be conducted to determine whether there is a reduction in number of eggs in the chicken fecal matter after the two treatments have been carried out.

CHAPTER ONE

1.0. INTRODUCTION

Worldwide over 50 billion poultry birds are reared every year for the purposes of food production in the form of meat and eggs (Physiology, Region, & Pantanal, 2010). Also over 19.60 billion is earned from poultry production worldwide (Palamara et al., 2014). In Africa the village poultry production systems are mainly based on scavenging indigenous chicken found in virtually all villages and households (Sector, n.d.). The village flocks are consist of unimproved local chickens, typically 5-20 birds per family (Sector, n.d.) The systems are characterised by a minimal or no income supply in terms of feed and medication with low productivity. More than 70% of the chicken products and about 20% of animal protein intake come from the villages in almost all African countries (Robinson, 2003). Therefore increasing rural poultry production would result in positive impact on household food security both in increased dietary intake and income generation (Awuni, Coleman, & Sedor 2006). This would help to improve the welfare of society.

Meat and eggs as poultry products are very vital in the nutrition and health of children, pregnant women, and immunologically weakened persons. For the vitality of animal proteins in nutrition, various governments of both developing and developed countries have been putting up programs to promote increased production of livestock products in order to meet the recommendation of 35g/input of animal protein per day established by the Food and Agricultural Organization. Poultry production is vital to the country's economy as a source of foreign exchange from the export of poultry products. It is also a source of employment to those who unemployed, landless, poor, divorced women and children therefore a source of income to them (Khokon, Sarker, & Rahman, 2014). Poultry rearing in Uganda is mainly based on free range (scavenging) indigenous chickens which are kept at subsistence level and are found in almost all households.

However the poultry industry is affected by internal parasites such as Nematodes (*Trichostrongylus* spp, *Heterakis* spp, *Ascaridia* spp *Syngamus* spp etc.) which may negatively affect poultry health and production performance thus leading to economic losses to the farmers making them run out the business. Internal parasite contamination is a serious problem in tropical counties in all systems of poultry production. Of all internal parasites Nematode are the

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