بسم الله الرحمن الرحيم

شبكة المعلومـــــات الجامعية

التوثيق الالكتروني والميكروفيلم

شبكة المعلومات الجامعية

جامعة عين شمس

التوثيق الالكتروني والميكروفيلم

﴿ قـــسـم ﴾

نقسم بالله العظيم أن المادة التي تم توثيقها وتسجيلها
علي هذه الأفلام قد اعدت دون آية تغيرات

يجب أن

تحفظ هذه الأفلام بعيداً عن الغبار

في درجة حرارة من 15 – 20 مئوية ورطوبة نسبية من 20-40 %

To be kept away from dust in dry cool place of
15 – 25c and relative humidity 20-40 %

بعض الوثائق الأصلية تالفة

بالرسالة صفحات

لم ترد بالأصـــل

PHARMACOLOGICAL AND TOXICOLOGICAL STUDIES ON NIGELLA SATIVA

Thesis Presented

By

Hamed Mohamed Nassar

M.V.Sc., 1993 (Pharmacology), Alex. University

For The Degree of

Doctor Philosophy of Veterinary Medical Sciences

(Pharmacology)

Submitted to

Faculty of Veterinary Medicine

Alexandria University

1997

Under The Supervision Of

PROF. DR.
ABD EL-SALAM FAWZI EL-SAWI

Professor of Pharmacology
and Head of Deptartment of
Physiology, Pharmacology and
Biochemistry
Faculty of Veterinary Medicine
Alexandria University

PROF. DR.
MOHAMED MOHAMED EL-DAKHAKHNY

Professor of Pharmacology
Faculty of Medicine
Alexandria University

PROF. DR
ABD-EL-DAYEM ZAKARIA MOHAMED

Professor of Physiology
Faculty of Veterinary Medicine
Alexandria University

PROF. DR.
FAHEMA FAHMY KASSEM

Professor of Pharmacognosy
Faculty of Pharmacy
Alexandria University

APPROVAL SHEET

This is to approve that the dissertation presented by *Hamed Mohamed Nassar* to Faculty of Veterinary Medicine, Alexandria University entitled "Pharmacological studies on Nigella sativa in chickens" for the degree of Ph.D. "***Pharmacology***" has been approved by the examining committe:

THE EXAMINING COMMITTEE: Signature

Prof. Dr./ Moustafa Abdel Aziz Mohamed
Professor of Pharmacology
Faculty of Veterinary Medicine - Tanta University

Prof. Dr./ El-Sayed Ahmed Abdel Aziz Mohamed
Professor of Pharmacology
Head of Pharmacology, Forensic Medicine and Toxicology Department
Faculty of Veterinary Medicine - Zagazig University

Prof. Dr./ Abdel Salam Fawsi El-Sawi
Professor of Pharmacology
Head of Physiology, Pharmacology and Biochemistry
Faculty of Veterinary Medicine - Alexandria University (Supervisor)

Prof. Dr./ Mohamed Mohamed El-Dakhakhny
Professor of Pharmacology
Faculty of Medicine - Alexandria University (Supervisor)

Prof. Dr./ Abdel Dayem Zakaria Mohamed
Professor of Physiology
Faculty of Veterinary Medicine
Alexandria University (Supervisor)

ACKNOWLEDGEMENT

First of all, prayerful thanks are to our **Merciful GOD** who gives us every thing we have.

I would like to express my appreciation and gratitude to **Prof. Dr. Abd El-Salam El-Sawi,** Professor of Pharmacology, Faculty of Veterinary Medicine, Alexandria University for his supervision, helpful advice, continuous encouragement, guidance and criticism.

Deep appreciation is expressed to **Prof. Dr. Mohammed El-Dakhakhny,** Professor of Pharmacology, Faculty of Medicine, Alexandria University for his supervision, careful guidance and kind orientation throughout the research work.

My thanks are due to **Prof. Dr. Abd El-Dayem Zakaria,** Professor of Physiology, Faculty of Veterinary Medicine, Alexandria University for his extreme valuable advices, instructions, guidance, suggestions and encouragement throughout my investigation; under his supervision, this work has been completed.

My thanks also extend to **Prof. Dr. Fahema Kassem,** Professor of Pharmacognosy Faculty of Pharmacy, Alexandria University for her valuable help suggestions, comments and guidance throughout this study.

I would like to express my gratitude and best thanks to **Dr. Ibrahim M. El-Ashmawy,** Assistant Professor of Pharmacology, Faculty of Veterinary Medicine, Alexandria University for his assistance during this work.

I wish to express my thanks to **Dr. Abd El-Wahab Mandour,** Assistant Professor of Biochemistry, and **Dr. Mahdy A. Korshom,** Assistant Professor of Biochemistry, Faculty of Veterinary Medicine, Alexandria University for their help in the biochemical analysis.

Thanks are due to **Dr. Sameh Yousef,** Lecturer of Pathology, Faculty of Veterinary Medicine, Alexandria University for his help in the histopathological examination.

To

My Parents

and My Wife

TABLE OF CONTENTS

LIST OF TABLES