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PHYTOCHEMICAL AND BIOLOGICAL STUDIES ON SOME PLANT EXTRACTS

A Thesis Submitted By

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For
The Award of the Degree of Doctor
of Philosophy of Science
(Ph.D.) in Botanical Biocides

To
Department of Botany
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1999

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بسراله المالين الركوم





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Abstract

Name: Hala Fouad Abdel-Hamid

Title: "Phytochemical and Biological Studies on Some Plant Extracts"

Degree: Doctor of Philosophy (Ph.D.) in Botany. Faculty of Science, Ain Shams University (1999)

Ethanolic extracts of 49 plant species representing 25 families were biologically screened for molluscicidal, cercaricidal and miracidicidal activities. 23 Plant extracts gave 100% mortality to *Biomphalaria alexandrina* snails at a concentration of 1000 ppm. At 500 ppm concentration, 11 and 8 plant extracts showed 100% mortality to cercariae and miracidia of *Schistosoma mansoni*, respectively. A considerable number of the candidate plants when used as dry powders at the same mentioned concentrations, showed high toxicity to the tested organisms.

Screening of the biological activity of different successive extracts from promising plants indicated that the high potent fractions were isolated from the following plants: Ambrosia maritima, Cymbopogon schoenanthus, Thymus capitatus, Syzygium aromaticum, Acacia nilotica, Quassia amara, Ammi majus and Ammi visnaga.

Selection of the most promising candidates was depending on the results obtained from screening toxicity of

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