بسم الله الرحمن الرحيم

شبكة المعلومات الجامعية

التوثيق الالكتروني والميكروفيلم

شبكة المعلومات الجامعية

جامعة عين شمس

التوثيق الالكتروني والميكروفيلم

قسم

نقسم بالله العظيم أن المادة التي تم توثيقها وتسجيلها
علي هذه الأفلام قد أعدت دون أية تغيرات

يجب أن

تحفظ هذه الأفلام بعيدا عن الغبار

في درجة حرارة من ١٥-٢٥ منوية ورطوبة نسبية من ٢٠-٤٠%

To be Kept away from Dust in Dry Cool place of 15-25- c and relative humidity 20-40%

بعض الوثائـــــق الاصليـــة تالفـــة

بالرسالة صفحات
لم ترد بالاصل

Alexandria University
Faculty of Agric. (Saba-Bacha)
Soil and Agric. Chemistry Dept.,

A COMPARISON OF SOME FERTIGATION SYSTEMS FOR SOME VEGETABLE CROPS PRODUCTION IN THE NORTH WESTERN COAST OF EGYPT

A THESIS

Presented to the Graduate School
Faculty of Agriculture
(Saba-Bacha)
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In Partial Fulfillment of the Requirements
For the Degree of

MASTER OF AGRICULTURAL SCIENCE

IN

(SOIL AND WATER)

BY

HANY MOHAMED SHAWKY EL-SAYED EL-BELTAGY

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INTRODUCTION

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At the new reclaimed areas in Egypt, there is a critical balance between water resources and water consumption, thus water saving is becoming a decisive factor for agriculture expansion. So, irrigation should be manipulated to maximize crop production per unit of applied water (water-use efficiency). In such areas, demands for irrigation scheduling and determining the crop water requirements impose the need to water management.

Irrigation and fertilization play an important role in food production for the expanding population. The control of soil nutrients and water content in root zone depth provides both enough water and nutrients as aim of the water and nutrients management. A continuous improvement in water and nutrients application methods with efficient use, is essential to keep high food production in balance with the increasing demand.

Fertigation (application of fertilizer nutrients with irrigation water) as an appropriate technique for efficient use of water and fertilizer is being practiced in greenhouse crops and also in newly reclaimed soils with drip irrigation.

The clay Jar or pitcher irrigation technique was used over two thousand years ago in China, after that, it was used in many areas (such as India, Brazil, Japan and ancient Egypt), but it was a simple system. This system is considered a method of subsurface irrigation.