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### جامعة عين شمس

التوثيق الالكتروني والميكروفيلم



نقسم بللله 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 %



ثبكة المعلومات الجامعية





Information Netw. " Shams Children Sha شبكة المعلومات الجامعية @ ASUNET بالرسالة صفحات لم ترد بالأص

### EFFECT OF SOME SOIL CONDITIONERS ON FERTILITY AND PRODUCTIVITY OF SANDY SOIL

BY

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B.Sc. Agric (Soils) 1995

Faculty of Agriculture, Moshtohor

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Faculty of Agriculture, Moshtohor
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## EFFECT OF SOME SOIL CONDITIONERS ON FERTILITY AND PRODUCTIVITY OF SANDY SOIL.

#### Ву

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## APPROVAL SHEET EFFECT OF SOME SOIL CONDITIONERS ON FERTILITY AND PRODUCTIVITY OF SANDY

#### SOIL.

#### By

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#### ABSTRACT

Faten Abd El- Aziz Abas El-Kmar. Effect of some soil conditioners on fertility and productivity of sandy soil. Unpublished M. Sc. Faculty of Agriculture, Moshtohor, Zagazig Universty, Benha Branch.

This investigation was conducted to study the effect of some soil conditioners (compost, biocomposite and bentonite) on the fertility and productivity of sandy soil. A field experiment was conducted at Ismailia Agric. Res. Station, and the obtained results could be summarized as follows:

Addition of compost, as well as, biocomposite gradually increased the CEC values with increasing their application rate. High values of available N, P, Fe, Zn, Mn and Cu in soil were obtained with applying 8 ton biocomposite/fed., followed by 15 ton compost/fed.

- High values of available K were associated with applying 15 ton bentonite/fed followed by 8 ton biocomposite/fed.
- Low values of available N, P, Fe, Zn, Mn and Cu were recorded with all bentonite treatments.
- The lowest value of available K was obtained with applying 5 ton compost/fed.
- The highest concentrations of the studied macro and micronutrients were recorded either in peanut vegetative parts or seeds at a rate of 8 ton biocomposite/fed, followed by 15 ton compost/fed, while the lowest values were recorded with 5 ton bentonite /fed.

- The highest yields of peanut seeds and wheat grains were achieved with applying 8 ton biocomposite/fed followed by 15 ton compost/fed.
- The lowest yields of peanut seeds and wheat grains were obtained by applying 5 ton bentonite/fed.
- Seed yield of peanut increased progressively and recorded the highest increase percentage (227.7%) as compared with control with using 8 t biocomposite/fed. The corresponding increase percentage in wheat grain yield associated with the same conditioner treatment was 214.1%