



شبكة المعلومات الجامعية

بسم الله الرحمن الرحيم



شبكة المعلومات الجامعية  
@ ASUNET



# 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 مئوية 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 الوثائق الأصلية تالفة

# بالرسالة صفحات لم ترد بالاصل



# **The Phylogenetic Relations of Some Barley Species and Varieties**

By

  
**Taha Sayed Taha Hussein**

B.Sc. Agric. (Genetics), Ain Shams Univ., 1983

A thesis submitted in partial fulfillment  
of  
the requirements for the degree of

**Master of Science**

in  
Agriculture  
(Genetics)

Department of Genetics  
Faculty of Agriculture  
Ain Shams University  
1996



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## **Abstract**

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Phylogenetic relationships among four *Hordeum* species namely *H. vulgare*, *H. murinum*, *H. marnium* and *H. spontaneum* were studied by using total soluble protein, hordein protein and some isozymes electrophoretic patterns. The protein electrophoretic patterns was more reliable in barley varieties and species identification, while hordein electrophoretic pattern was more effective in barley varieties identification. Some isozymes such as Est, 6-Pgd, Adh, Idh and Acp were used in both barley varieties and species identification, whereas Per and Mdh were not effective for barley varieties and species identification.

**Key words:** Barley, Phylogenetic, Protein, Hordein, Isozymes



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