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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 %



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BOTANICAL STUDIES ON SOME DATE PALM GENOTYPES

BY

Wael Mohamed Hassan Mohamed

B.Sc., Fac. of Agriculture, Suez Canal University, 1994 M.Sc. Agricultural Botany, Suez Canal University, 2000

Thesis

Submitted in Partial Fulfillment of the Requirements for the Degree of

In
Agricultural Science
(Agricultural Botany)

Suez Canal University
Faculty of Agriculture
Agricultural Botany Department
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DOCTOR OF PHILOSOPHY In Agricultural Science (Agricultural Botany)

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Abstract

This work was on date palm during 2003 and 2004 seasons. The studied date palm trees were eight female cultivars (Amhat, Barhi, Bint Aisha, Zaghloul, Hayany, Amry, Kuboshy and Samany) and one seedling male genotype. The comparative data obtained were:

- I- Morphological characteristics: of leaves, leaflet, spines and fruits in details.
- II- Anatomical characteristics: for Leaflet and Fruit anatomy in transverse sections and recorded variance between date palm genotypes under investigation.
- III- Chemical characteristics: for leaflets and fruits such as sugar, total phenols and TSS.
- IV-DNA fingerprint by random amplified polymorphic DNA (RAPD)

RAPD profiles of female plants of studied date palm genotypes exhibited similar banding patterns especially with primers OPK4 and OPK5 which suggests homology among these cultivars. The results of molecular analysis also showed distinct variation in the profiles within the female plants of studied date palm and male genotypes especially with primers OPK1, OPK3 and OPK7. These results agree with the obtained morphological data.

Key words: *Phoenix dactylifera* – morphology – anatomy – chemical characteristics -RAPD

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Contents

Subject	Page
Acknowledgment	
Introduction	1
Review of literature	4
I- Morphological description	7
A- Vegetative organs	7
1- Trunk	7
2- Leaf Characteristics	8
a- Leaf length and area	9
b- Length of spine zone	9
c- Rachis	9
d- Characteristics of leaflets	10
e- Spine characteristics	11
B- Reproductive organs	11
1-Stalk characteristics	- 11
2- Fruit characteristics	12
a- Fruit colour	13
b- Fruit weight	14
c- Fruit dimensions	14
II- Anatomical characteristics	15
A- Leaflet anatomy	15
B- Fruit anatomy	17
III- Chemical characteristics	17
A-In leaflets	17
B-In fruits	18
IV-DNA fingerprint by random amplified polymorphic DNA (RAPD)	19
Materials and methods	21
I- Morphological studies	21
II- Anatomical characteristics	22
III Chemical characteristics	22
IV- Random Amplified polymorphic DNA (RAPD)	25
Results & discussion	30
I- Morphological description	30
A- Vegetative organs	30
1- Trunk	30
2- Leaf	35
a- Leaf length and area	35
b- Length of spine zone	40
c- Rachis base	40
d- Leaflets	45
e- Spines	51
B- Reproductive organs	54
1-Stalk	55
2- Fruit	60

a- Fruit colour	60
b- Fruit weight & firmness	67
c- Fruit dimensions	68
II- Anatomical characteristics	71
A- Leaflet anatomy	71
B- Fruit anatomy	78
III- Chemical characteristics	85
A- Leaflets	85
1- Reducing sugars	85
2- Total phenois	85
B- Fruits	88
1- Moisture content	88
2-Reducing sugars	88
3- Total phenols	88
4- Titratable acidity	89
5- Total soluble solids	89
6- TSS/Acidity ratio	89
IV-DNA fingerprint by random amplified	90
polymorphic DNA (RAPD)	
Summary	101
Conclusion	108
Literature Cited	109
Arabic summary	

List of Tables

Title	Page
Table (1): Morphological characteristics of trunk of the studied date palm genotypes	31
Table (2): Morphological characteristics of leaves of the studied date palm genotypes	31
Table (3): Leaflets morphological characteristics of the studied date palm genotypes	46
Table (4): Morphological characteristics of spines of the studied date palm genotypes	52
Table (5): Morphological characteristics of the studied date palm genotype's stalks	56
Table (6): Fruit physical characteristics of the studied date palm cultivars	61
Table (7): Fruit dimension and volume (cm ³) of the studied date palm cultivars	69
Table (8): Anatomical characters of leaflets of the studied date palm genotypes	72
Table (9): Anatomical characters of fruits of the studied date palm cultivars	79
Table (10): Chemical characteristics of leaves and fruit of the studied date palm genotypes	86
Table (11): RAPD-PCR amplification products of DNA extracted from leaves of date palm cultivars using five random primers	91
Table (12): Distribution and size of polymorphic bands from date palm cultivars using five random primers	95

List of Figures

Title	Page
Figure (1): Standard curve of total phenols	26
Figure (2): Standard curve of reducing sugars	27
Figure (3):- Showing trees of the studied date palm genotypes	32-34
Figure (4): Leaf length (cm) of the studied date palm genotypes	36
Figure (5): Leaf area (m2) of the studied date palm genotypes	36
Figure (6):- Showing leaves of the studied date palm genotypes	37-39
Figure (7):- Showing spines zone of the studied date palm genotypes:	41-43
Figure (8): Average width and thickness of rachis base of the studied date palm genotypes	44
Figure (9):- Showing leaflet zone of the studied date palm genotypes	47-49
Figure (10): Morphorogical characteristics of leaflets of the studied date palm genotypes	50
Figure (11): Morphorogical characteristics of spines of the studied date palm genotypes	53
Figure (12):- Showing stalks of the studied date palm genotypes	57-59
Figure (13): Fruit colour characteristics of the studied date palm cultivars	62
Figure (14):- Showing fruit of the studied date palm genotypes	63-66
Figure (15): Fruit Length and diameter (cm) of the studied date palm cultivars	70
Figure (16): Fruit volume (cm3) of the studied date palm cultivars	70
Figure (17):- Transverse sections of leaflet of the studied genotypes 50 x	73-75
- 1-1-1-1-1-1-1-1-1-1-1-1-1-1-1-1-1-1-1	

Figure (18): Light microscope micrographs of cross sections of the pericarp of studied date palm cultivars fruits (16 X)	80-83
Figure (19): Leaflets reducing sugars and total phenols content of the studied date palm genotypes	87
Figure (20): Fruit reducing sugars and total phenols content of date palm cultivars	87
Figure(21): Agarose gel electrophoresis of RAPD fragments generated by primers OPK1 (A), OPK3 (B) of different date palm female cultivars	92
Figure(22): Agarose gel electrophoresis of RAPD fragments generated by primers OPK4 (A), OPK5 (B) of different date palm female cultivars	93
Figure(23): Agarose gel electrophoresis of RAPD fragments generated by primers OPK7 of different date palm female cultivars	94
Figure (24): Dendrogram resulted from UPGMA clustering analysis based on the similarity polymorphism of DNA of the studied date palm genotypes isolates by PCR-based RAPD with 5 primers using agarose gel electrophoresis	98-100

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