

127, 17 27, 17 (20) 77, 17 (20









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



Neuropsychiatric Aspects of Khat Chewing Essay Submitted For Partial Fulfillment of Master Degree

In Neuropsychiatry

By

Rashad Abdul Ghani Abdul Rab (M.B.C.H)

Supervisors

Prof. Adel Sadek

Prof. of Neuropsychiatry

Chairman of Neuropsychiatric Department Faculty of Medicine Ain Shams University

Prof. Mohamed Anwar El Etribi

Prof. of Neuropsychiatry

Head of Neurology &Intensive Care Unit Faculty of Medicine Ain Shams University

Dr. Gamal Said Abd El-Aziz

Assistant Professor of Anatomy Faculty of Medicine Ain Shams University

2000

B NO0.



Neuropsychiatric Aspects of Khat Chewing Essay Submitted For Partial Fulfillment of Master Degree

In Neuropsychiatry

By

Rashad Abdul Ghani Abdul Rab (M.B.C.H)

Supervisors

Prof. Adel Sadek

Prof. of Neuropsychiatry

Chairman of Neuropsychiatric Department Faculty of Medicine Ain Shams University

Prof. Mohamed Anwar El Etribi

Prof. of Neuropsychiatry

Head of Neurology &Intensive Care Unit Faculty of Medicine Ain Shams University

Dr. Gamal Said Abd El-Aziz

Assistant Professor of Anatomy Faculty of Medicine Ain Shams University

2000



وبسم الله الرحمن الرحيم،

وقالوا سبحانك لاعلم لنا إلاما علمتنا

إنكأنت العليم الحكيم،

صدي الله العظيم سورة البقرة آية (٣٢)



Acknowledgment

I would like to express my deep appreciation and gratitude to *Prof. Adel Sadek*, Prof. of Neuropsychiatry Chairman of Neuropsychiatry department, Faculty of Medicine-Ain Shams University for his gracious supervision, sincere assistance and continuous encouragement throughout this study.

I'm deeply affected by his noble, character, perfection, care and consideration.

I'm profoundly grateful to *Prof. Mohamed* Anwar El Etríbí

Prof. of Neuropsychiatry, Head of Neurology & Intensive Care Unit, Faculty of Medicine-Ain Shams University for his enthusiastic support and encouragement. His experience added much to my knowledge. His guidance, advice, fruitful suggestions helped me throughout the work. To him I owe much more than I can express.

I also wish to express my deep thanks and sincere gratitude Dr. Gamal Said Abd El-Aziz; Assistant Professor of Anatomy, Faculty of Medicine-Ain Shams University for his valuable suggestions and generous help for the fulfillment of this study.

Contents

List of figures	xvi
List of tables	
List of abbreviations	
1.Introduction	
Aim of the work	
2. Historical background	
3. Geographical dispersal	
4. Botanical aspects of Khat	
Description of the plant	
Local names	
5. Chemical aspects of Khat	
1-Phenylalkylamines and related compounds	
2- Sesquiterpene polyester alkaloids	
3-Volatile compounds (ethereal oil components)	
4-Flavonoids (glycosides)	
5-Sterols and Triterpenes	
6-Aminoacids	
7-Vitamines and minerals	
The content of khatamines related to plant tissues, age	
and origin	
6. Pharmacological aspects of Khat	
The pharmacokinetics of Khat	
The pharmacodynamics of Khat	
Pharmacological and clinical effects of Khat in human	
(i) Effects of Khat on alimentary system	
(ii) Effects of Khat on cardiovascular system	
(iii) Effects of Khat on respiratory system	
(iv) Effects of Khat on genitourinary system & sexual	
(17) Effects of Effact on genitournary system & Sexual	1 to 1

	potency	.40
	(v) Effects of Khat on metabolism & endocrine	and the same of
	systems	41
	(vi) Ocular effects	
	(vii) Effects of Khat on pregnancy and lactation	
	(ix) Khat and malnutrition	
	Effects of Khat in animals and isolated organs	
	The medical use of Khat	
7.	Epidemiological aspects of Khat use	
	The khat party (ceremony)	
8.	Social and economic aspects of Khat	
9.	Psychiatric aspects of Khat	
	Khat and the question of addiction	
	Polydrug abuse with particular reference to Khat	
	Psychological effects of Khat chewing	
	Khat chewing & neurotic disorders	
	Khat and psychotic disorders	
	Behavioral Studies of Cathinone in Monkeys and Rats	97
10.	Neurological aspects of Khat	100
	Neurochemistry & electrophysiology of Cathinone	100
	Amphetamine like effects of Khat on some	
1	neuroendocrine parameters in humans	.104
	Neonatal cerebral function after exposure to Khat	.107
	The effects of Khat on sexual behaviour	108
	Khat chewing and bladder neck chewing	112
	Effect of Khat extract on RNA of the neurons	113
	Acute effects of a Khat extract on the rat	
	electroencephalogram	.114
11.	. Control of Khat	
12.	. Conclusion	.124