

بسم الله الرحمن الرحيم



HOSSAM MAGHRABY



شبكة المعلومات الجامعية

التوثيق الالكتروني والميكرو فيلم



HOSSAM MAGHRABY

جامعة عين شمس

التوثيق الإلكتروني والميكروفيلم

قسم

نقسم بالله العظيم أن المادة التي تم توثيقها وتسجيلها
على هذه الأقراص المدمجة قد أعدت دون أية تغيرات



يجب أن

تحفظ هذه الأقراص المدمجة بعيدا عن الغبار

HOSSAM MAGHRABY



بعض الوثائق الأصلية تالفة



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بالرسالة صفحات

لم ترد بالأصل



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B12205

MAGNETIC RESONANCE ANGIOGRAPHY OF THE HEAD and NECK

THESIS

**SUBMITTED IN PARTIAL FULFILLMENT OF MASTER
DEGREE IN RADIODIAGNOSIS**

BY

Ehab Mansour Mohamad Mousa
(M.B.B.CH.) ASSIUT UNIVERSITY

SUPERVISORS

Dr. Ahmad Moustafa Hamed
Assistant Professor of Radiodiagnosis Department
FACULTY OF MEDICINE, ASSIUT UNIVERSITY

Dr. Hesham Moustafa Kamel
Lecturer of Radiodiagnosis Department
FACULTY OF MEDICINE, ASSIUT UNIVERSITY

Dr. Ahmad Fathy Ahmad
Lecturer of Radiodiagnosis Department
FACULTY OF MEDICINE, ASSIUT UNIVERSITY

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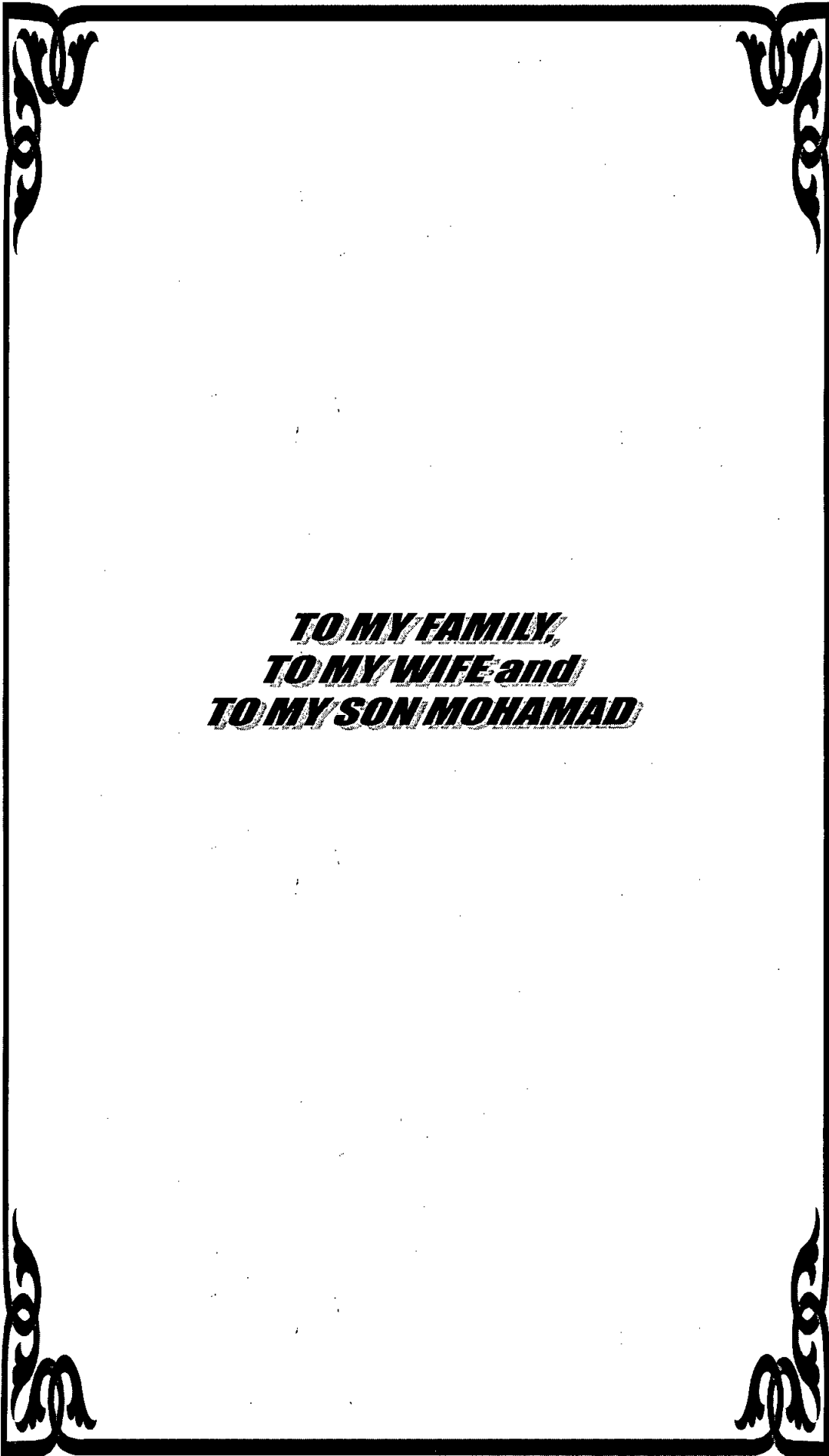
بِسْمِ اللَّهِ الرَّحْمَنِ الرَّحِيمِ

قَالُوا سُبْحَانَكَ لَا عِلْمَ لَنَا إِلَّا مَا

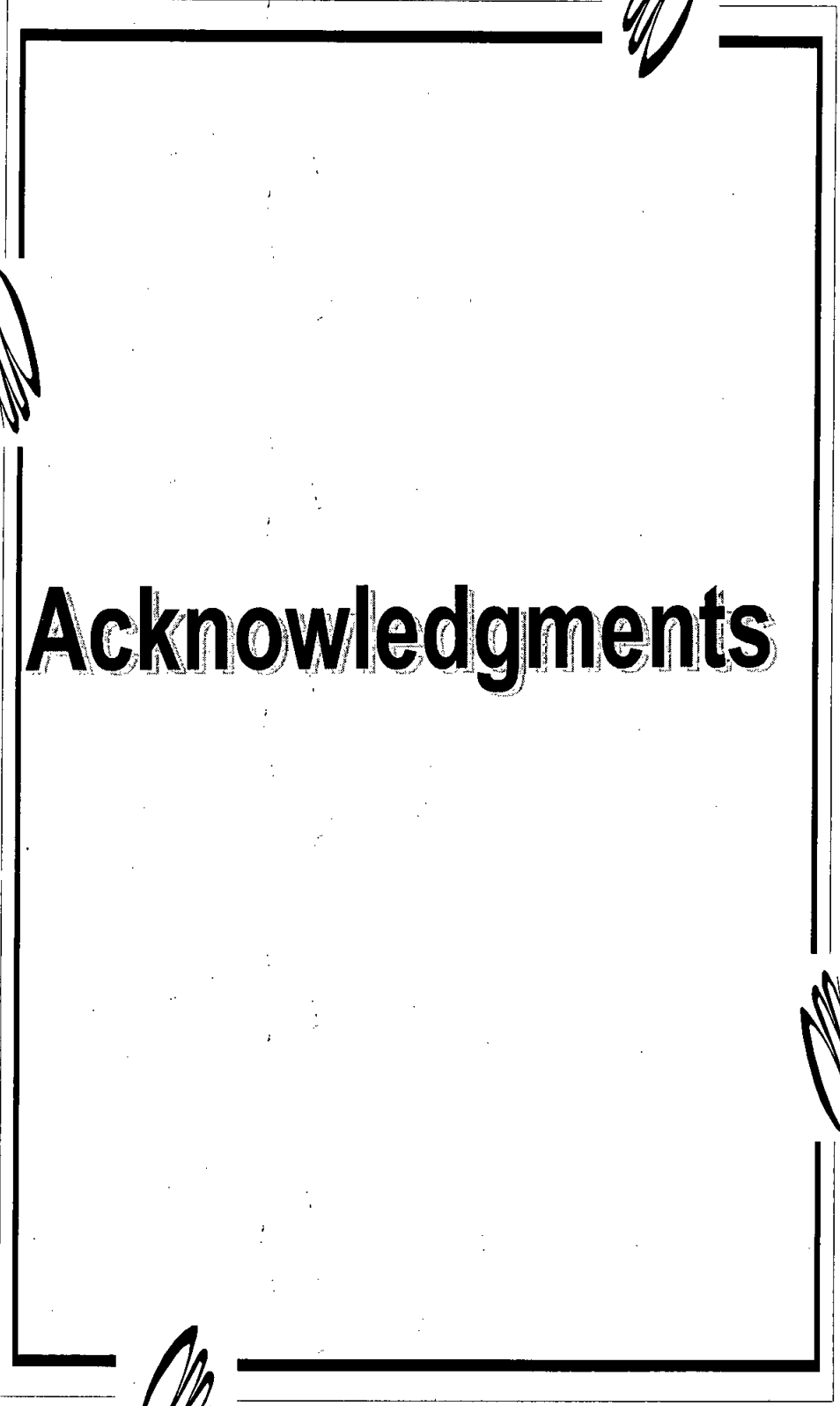
عَلَّمْتَنَا إِنَّكَ أَنْتَ الْعَلِيمُ

الْحَكِيمُ

صَدَقَ اللَّهُ الْعَظِيمُ



***TO MY FAMILY,
TO MY WIFE and
TO MY SON MOHAMAD***



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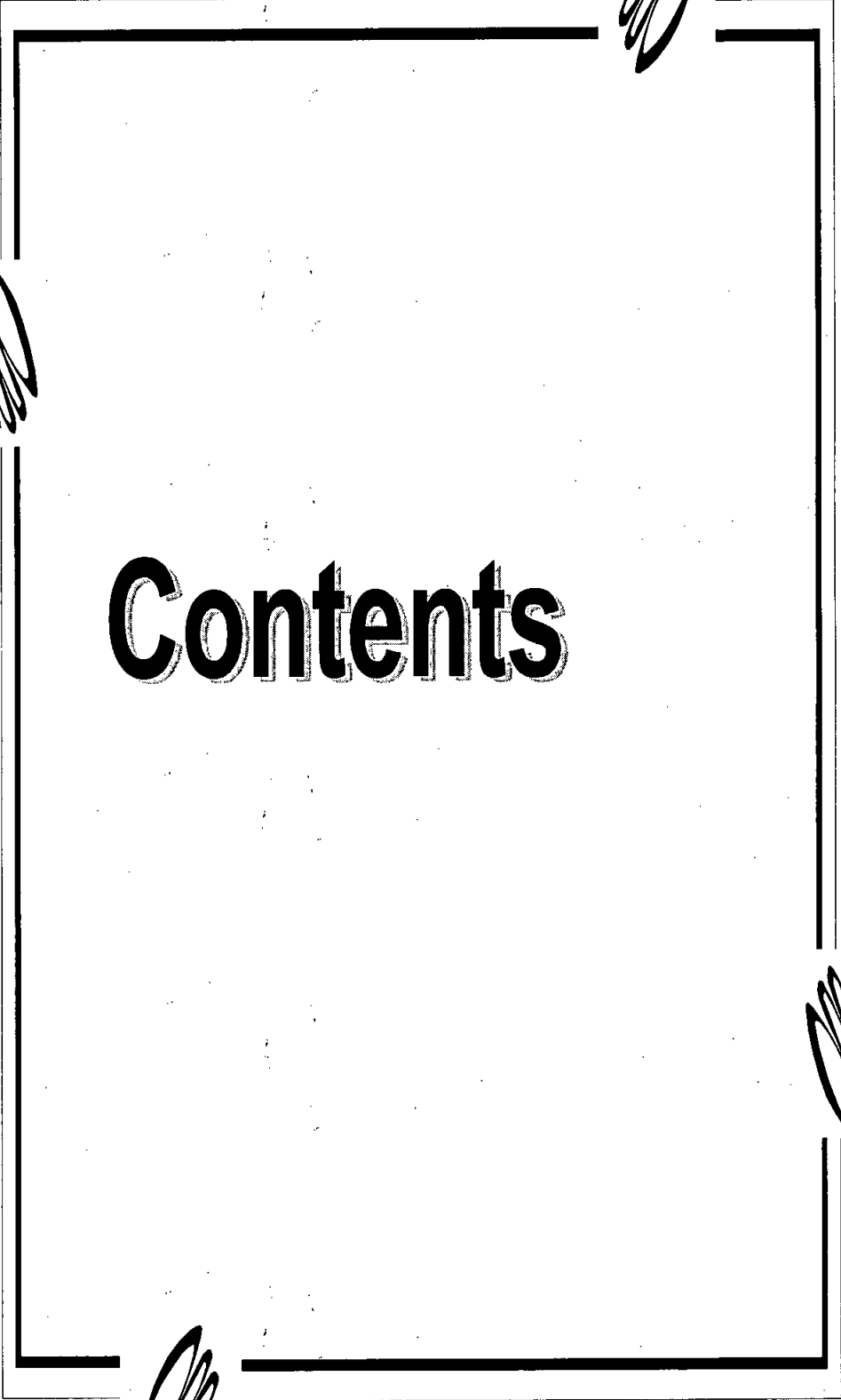
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Ehab Mansour Mohamad Mousa.



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LIST OF ABBREVAITIONS

2-D	Two-dimensional.
3-D	Three-dimensional.
BA	Basilar artery.
ECA	External carotid artery.
ECG	Electrocardiogram.
EP	Echoplanar.
FFE	Fast field echo sequence.
FISP	Fast imaging with steady precession.
FLASH	Fast low angle shot sequence.
FOV	Field of view.
Gd.DTP	Gadolinium dietheline triamine penta acetic acid.
GRASS	Gradient recalled acquisition in a Steady state.
GRE	Gradient recalled echosequence.
ICA	Intern al carotid artery.
M 2D (S 2D)	Multi slice 2D (sequential 2D).
MIP	Maximum intensity projection.
MOTSA	Multiple overlapping thin slab angiography.
MRA	Magnetic resonance angiography.
MRI	Magnetic resonance imaging.
MTC	Magnetization transfer contrast.
