سامية محمد مصطفى

شبكة المعلومات الجامعية

بسم الله الرحمن الرحيم

سامية محمد مصطفى

شبكة المعلومات الجامعية

شبكة المعلومات الجامعية

التوثيق الالكتروني والميكروفيلم

سامية محمد مصطفى

شبكة المعلومات الجامعية

جامعة عين شمس

التوثيق الإلكتروني والميكروفيلم

قسم

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

يجب أن

تحفظ هذه الأقراص المدمجة بعيدا عن الغبار

سامية محمد مصطفى

شبكة المعلومات الجامعية

بعض الوثائق الأصلية تالفة

سامية محمد مصطفى

شبكة المعلومات الجامعية

بالرسالة صفحات لم ترد بالأصل

Soluble Transferrin Receptor In Anaemia Of Chronic Renal Insufficiency

Thesis Submitted for
Partial Fulfilment of Master Degree
In Paediatrics

By
Safaa Mohamed Abdel-Wahab
MB.,B.Ch., Alexandria University

Supervised By
Dr. Mohamed Salah El-Din Faheem
Assistant Professor of Paediatrics & Paediatric Nephrology
Ain Shams University

Dr. Ihab Zaki El Hakim
Lecturer in Paediatrics
Ain Shams University

Dr. Hanaa Mohamed El-Sayed Afifi
Assistant Professor of Clinical Pathology
Ain Shams University

Faculty of Medicine
Ain Shams University
Cairo
2000

B
10391

بسم الله الرحمن الرحيم

"قالوا سبحانك لا علم لنا إلا

ما علمتنا إنك أنت العليم

الحكيم"

صدق الله العظيم

سورة البقرة

آية ٣٢

ACKNOWLEDGEMENT

First and foremost, I thank God almighty, the beneficent and most merciful.

I would like to express my endless gratitude and appreciation to **Dr. Mohamed Salah El Din Faheem,** associate professor of paediatrics, Ain Shams University for giving me the honour of working under his supervision and providing me with a lot of encouragement and support.

My deep thanks are to **Dr. Ihab Zaki El Hakim,** lecturer in paediatrics. Ain Shams University, for his generous assistance and valuable guidance and unfailing efforts during the whole period of the study.

This work would have never been completed without the great help, close supervision and meticulous laboratory work offered by **Dr. Hanaa Mohamed El-Sayed Afifi,** Assistant professor of clinical pathology, Ain Shams University.

My expression of thanks would fail to give the team of the paediatric dialysis unit, Ain Shams University, its worth of gratitude for its practical and moral support through out this work. I acknowledge my patients and their brave parents for their cooperation and sincere feelings.

No words can describe the support and encouragement offered to me by my parents and my husband.

LIST OF CONTENTS

Introduction	1
Aim of the work	3
Review of literature	
Iron metabolism	5
Iron deficiency	18
Anaemia of chronic renal failure	30
Erythropoietin	39
Subjects and Methods	57
Results	65
Discussion	89
Summary and Conclusion	95
Recommendations	99
References	101
Arabic summary	

LIST OF FIGURES

Figure (1)	The principles of absorption of heam iron and the non-haem iron from the food.	8
Figure (2)	Transferrin molecule with its two lobes and the transferrin receptor molecule in the cell membrane	10
Figure (3)	Schematic illustration of a cellular iron uptake and transferrin receptor recycling	13
Figure (4)	Schematic illustration of body iron turnover	16
Figure (I)	Reticular cell count, RBCs and Hb among studied groups	78
Figure (II)	Hct, MCV and MCH among studied groups	78
Figure (III)	Serum iron, saturation index and hypochromic cell percentage among studied groups.	81
Figure (IV)	TIBC, serum ferretin and STR among studied groups	81
Figure (V)	Significant negative correlation between STR and saturation index in group C	83

Figure (VI)	Reticular cell count, RBCs and Hb before and after therapy in group A.	85
Figure (VII)	Hct, MCV and MCH before and after therapy in group A.	85
Figure (VIII)	Serum iron , saturation index and hypochromic cell percentage before and after therapy in group A.	87
Figure (IX)	TIBC, serum ferretin before and after therapy in group A	87
Figure (X)	Significant negative correlation between STR and saturation index in group A.	