

بسم الله الرحمن الرحيم

{ قالوا سبحانك لا علم لنا الا ما علمتنا انك انت العليم الحكيم (32) }

سورة البقرة

صدق الله العظيم

## **Dedication**

To the ever lighting candles..... light on the way

Parents, Brother and Sisters

To my lovely late...

To all who offered me love, care and advice...

Appreciation and Respect

To my colleagues .... I dedicate this effort

## **Acknowledgement**

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## List of Abbreviations

NM	Nuclear Medicine
QC	Quality Control
QA	Quality Assurance
PMT	Photo Multiplier Tube
NaI (TI)	A thallium-activated sodium iodide crystal
PHA	pulse High Analyzer
SPECT	Single Photon Emission Computed Tomography
IU	Integral uniformity
DU	Differential uniformity
FOV	Field of View
UFOV	Useful Field Of View
CFOV	Central Field Of View
FWHM	Full Width at Half Maximum
FWTM	Full Width at Tenth Maximum
ER	Energy Resolution
RCIH	Royal Care International Hospital
NMDC	El-Neelain Medical Diagnostic Centre
IAEA	International Atomic Energy Agency
NEMA	National Electrical Manufactures Association
Kev	Kilo electron volt
KVp	kilo volt peak
SCA	Single Channel Analyzer
MCA	Multi-Channel Analyzer

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