



Faculty of Women for Art,
Science and Education

Laboratory Diagnosis of Rifampicin Resistant Pulmonary Tuberculosis through Molecular Techniques

A Thesis submitted for PhD degree in science
(Microbiology)

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CONTENTS

CONTENTS

List of Tables.....	I
List of Figures	II
List of Abbreviations	IV
Abstract	VII
1. Introduction.....	1
1.1 Overview	1
1.2 Significance of Research	2
1.3 Objectives	2
2. Literature review.....	3
2.1 Tuberculosis.....	4
2.2 History.....	4
2.3 <i>Mycobacterium tuberculosis</i>	7
2.3.1 Scientific classification and general characteristics.....	7
2.3.2 Cell wall structure.....	9
2.3.3 Reproduction.....	9
2.4 Immune response against <i>Mycobacterium tuberculosis</i>	10
2.5 Pathogenesis.....	11
2.6 Signs and symptoms.....	14
2.7 Pulmonary tuberculosis.....	14

2.8 Extrapulmonary tuberculosis.....	16
2.9 Transmission.....	16
2.10 Global burden of Tuberculosis.....	17
2.11 Burden of Tuberculosis in Egypt.....	22
2.12 Vaccination against TB.....	24
2.13 Anti-tuberculosis agents and drug resistance.....	25
2.13.1 Streptomycin.....	25
2.13.2 Rifampicin.....	26
2.13.3 Isoniazid.....	27
2.13.4 Ethambutol.....	30
2.13.5 Amikacin, kanamycin and capreomycin.....	31
2.13.6 Fluoroquinolones	33
2.14 Multiple drug resistant tuberculosis.....	35
2.15 Laboratory diagnosis of tuberculosis.....	36
2.16 Specimen.....	36
2.17 Acid fast staining.....	38
2.18 Culture media for MTB isolation and differentiation.....	39
2.18.1 Egg based Lowenstein- Jensen.....	39
2.18.2 Agar based Middlebrook medium.....	40
2.18.3 Liquid Media.....	40
2.18.4 Semi-automated broth based culture.....	41
2.19 Immunological tests for TB diagnosis.....	42
2.19.1 Mauntox tuberculin test.....	42

2.19.2 Enzyme linked Immunosorbent assay (ELISA).....	43
2.19.3 QuantiFERON-TB gold test (QFT-G).....	43
2.20 Molecular techniques for laboratory diagnosis of PTB.....	44
2.20.1 NAATs for the detection of the MTBC.....	45
2.20.2 NAATs for the detection of the MTBC and drug resistance.....	49
2.20.3 LIPA for the detection of the MTBC and drug resistance.	51
2.20.4 LIPA for the differentiation of the MTC.....	53
2.20.5 Direct hybridisation assays for the detection of the MTBC	54
2.20.6 Sequencing based diagnostic methods.....	54
2.20.7 Array-based commercial tests for the detection of MTB and drug resistance.....	56
3. Materials and methods.....	58
3.1 Biosafety.....	59
3.2 Study description.....	60
3.3 Study design.....	60
3.4 Sampling.....	61
3.5 Conventional laboratory diagnosis and susceptibility testing of PTB.....	62
3.5.1 Cultivation of MTB.....	62
3.5.2 Sputum decontamination by Petrof's method.....	63
3.5.3 Acid fast staining (Ziehl-Neelsen stain).....	64
3.5.4 Drug susceptibility testing by culture proportion method.	64

3.6 Molecular diagnosis and susceptibility testing of PTB.....	67
3.6.1 Gene Xpert MTB/RIF system for detection of MTB and rifampicin resistance.....	67
3.6.2 Usefulness of stool as a sample for diagnose PTB by gene Xpert MTB/RIF.....	70
3.6.3 Genotype MTBDR <i>plus</i> for detection of MTB and drug.....	71
3.6.4 Sequencing of <i>rpoB</i> gene in rifampicin resistant isolates.....	79
3.7 Statistical analysis.....	82
3.8 Ethical approval.....	82
4. RESULTS.....	83
4.1 Study participants.....	83
4.2 Specimens.....	87
4.3 Conventional laboratory diagnosis and susceptibility testing of PTB.....	92
4.4 Gene Xpert MTB/RIF system for detection of MTB and RIF susceptibility testing in sputum samples.....	92
4.5 Usefulness of stool as a sample for diagnose PTB by gene Xpert MTB/RIF.....	97
4.6 Genotype MTBDR <i>plus</i> for detection of MTB and drug susceptibility testing.....	100
4.7 Sequencing of <i>rpoB</i> gene in rifampicin resistant isolates.....	104
5. DISCUSSION.....	118

6. REFERENCES.....	146
SUMMARY.....	204

LIST OF TABLES

Table		Page
Table 1:	Demographic and clinical criteria of first patients group (Age between 18 to 60 years old).....	88
Table 2:	Demographic and clinical criteria of second patients group (Age between 1 to 15 years old).....	89
Table 3:	Validity values of Acid-fast smear (AFB) compared to LJ culture.	94
Table 4:	Gene xpert MTB/RIF results according to patient's clinical classification.....	95
Table 5:	Validity values of sputum gene xpert MTB/RIF (GX) compared to LJ culture.....	96
Table 6:	Stool gene xpert MTB/RIF results according to patient's clinical classification.....	98
Table 7:	Validity values of stool gene xpert MTB/RIF (GX) compared to LJ culture.....	99
Table 8:	Performance of MTBDR <i>plus</i> to detect MTB.....	101
Table 9:	Performance of MTBDR <i>plus</i> to detect rifampicin and isoniazid resistant in second patients group (adult patients) ...	102
Table 10:	Performance of MTBDR <i>plus</i> to detect rifampicin and isoniazid resistant in first patients group (children patients) ...	103
Table 11:	Identification of mutation of <i>ropB</i> gene in 12 rifampicin resistant Isolates.....	117

Figure	LIST OF FIGURES	Page
Figure 1:	Egyptian clay artifact of an emaciated man with a characteristic angular kyphosis suggestive of Pott's disease. Reproduced from TB, Past, Present (Pálfi 1999).....	5
Figure 2:	The pathophysiology of MTB inside the host.....	15
Figure 3:	Estimated absolute numbers of TB cases and deaths (in millions per year), 1990–2014.....	19
Figure 4:	Estimated global HIV prevalence in new and relapse TB cases, 2014.....	20
Figure 5:	Estimated global TB incidence rates, 2014	21
Figure 6:	TB Egypt profile. Incidence, prevalence and mortality rate of TB, MDR-TB and HIV patients with TB.....	23
Figure 7:	Gene xpert MTB/RIF system.	68
Figure 8:	Illustration of banding MTBDR <i>plus</i> banding patterns of different strains.....	78
Figure 9:	Demographic and clinical characteristics of 333 recruited patients with clinical signs of PTB.....	86

Figure 10:	Flowchart showing number and classification of second patients group (age between 18 to 60 years old) and their laboratory results.....	90
Figure 11:	Flowchart showing number and classification of second patients group (age between 1 to 15) years old and their laboratory results.....	91
Figure 12:	PCR amplification of rpoB gene of rifampicin resistant isolates. PCR product of rpoB was visualized on 1.5% agarose gel.....	91
Figure 13-24:	Sequence of 157 bp region of rpoB gene in rifampicin resistant isolate.....	105 – 116

LIST OF ABBREVIATIONS

AFB	Acid fast bacilli
AK	Amikacin
AM-A	Amplification mix A
AM-B	Amplification mix B
BAL	Bronchoalveolar lavage
BCG	Bacillus of Calmette and Guerin
CAP	Capreomycin
CDC	Centers for disease control and prevention
CI	Confidence interval
CON-C	Conjugate concentrate
CON-D	Conjugate buffer
CXR	Chest X-ray
DEN	Denaturation solution
DNA	Deoxyribonucleic acid
DST	Drug susceptibility testing
Eis	Enhanced intracellular survival protein
ELISA	Enzyme linked Immunosorbent assay
EMB	Ethambutol
FASII	Fatty acid synthase type II
FDA	Food and Drug Administration
FQ	Fluoroquinolones

FRET	Fluorescence resonance energy transfer
GX	Gene xpert MTB/RIF
HIV	Human immunodeficiency virus
HRM	High-resolution melting
HYB	Hybridization buffer
IL-12	Interleukin 12
INH	Isoniazid
ISS	Induced sputum specimen
KAN	Kanamycin
LAM	Lipoarabinomannan
LAMP	Loop mediated isothermal amplification
LED	Light-emitting diode
LJ	Löwenstein-Jensen
LPAs	Line probe assays
LPS	Lipopolysaccharide
LTBI	Latent TB infection
MDR-TB	Multiple drug resistant tuberculosis
MTB	<i>Mycobacterium tuberculosis</i>
MTBC	<i>Mycobacterium tuberculosis</i> complex
MyD88	Myeloid differentiation primary response 88
NAAT	Nucleic acid amplification test
NAD	Nicotinamide group of nicotinamide adenine dinucleotide
NTM	Non-tuberculosis mycobacteria

PCC	Probe Check Control
PCR	Polymerase chain reaction
PPD	Purified protein derivative
PTB	Pulmonary tuberculosis
QFT-G	Quantiferon-TB gold test
RIF	Rifampicin
RIN	Rinse solution
RRDR	Rifampicin resistance determining region
rRNA	Ribosomal RNA
RT-PCR	Real time PCR
SDA	Strand displacement amplification
SM	Streptomycin
SPC	Specimen processing control
STR	Stringent wash solution
SUB-C	Substrate concentrate
SUB-B	Substrate buffer
TB	Tuberculosis
TLR	Toll-like receptors
TNF- α	Tumor necrosis factor- α
TST	Tuberculin skin test
WHO	World health organization
bp	Base pair