MISSION DRIFT IN MICROFINANCE INSTITUTIONS OF OIC COUNTRIES: THE INFLUENCE OF INSTITUTIONAL AND MACRO RISK INDICATORS ON THE MUTUAL EXCLUSION OF DOUBLE BOTTOM LINES

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MASTER OF SCIENCE
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To my family,
whose sacrifices are ineffable…

MISSION DRIFT IN MICROFINANCE INSTITUTIONS OF OIC COUNTRIES: THE INFLUENCE OF INSTITUTIONAL AND MACRO RISK INDICATORS ON THE MUTUAL EXCLUSION OF DOUBLE BOTTOM LINES

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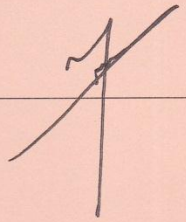

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ABSTRACT

With commercialization and transformation taking place in the microfinance industry, the original mission of poverty alleviation may drift toward profit maximization. This thesis thus attempts to investigate the concern of mission drift in the member states of the Organization of Islamic Cooperation (OIC) and how they are influenced by various institutional and macro risk indicators. This quantitative research approach used a panel dataset of 5 years' observation (2011-2015) of 57 MFIs of the OIC member countries. The ordinary least squares techniques with robust estimation to the general form of the cross sectional and temporal dependency was utilized. The evidence of this study should dispel the widely held apprehension of "mission drift", rather it reveals that outreach to the lowest strata of poor can actually bolster the financial viability of MFIs. However, positive evidence of mission drift was identified for the regulated and matured MFIs. The results also indicate that non-bank financial institutions and non-governmental organizations have outperformed in social outreach than their counterparts. The findings show that network affiliation has a significant positive impact on the microfinance social mission. Furthermore, the study reveals mixed findings regarding the influence of institutional and macro risk indicators. Maturity, network affiliation and Gross Domestic Product (GDP) growth rate show greater influence than others on the relationship between the financial and social performances. The study supports the implication of the trade-off paradigm and the sustainability–driven scaling up approach. Hence, this research concludes that seeking financial sustainability does not necessarily harm the social mission, however, MFIs must find an equilibrium point of balancing their double bottom lines and continue the mission of poverty alleviation in microfinance operations.

Keywords: commercialization, microfinance, mission drift, performance, sustainability

ABSTRAK

Dengan pengkomersialan dan transformasi yang berlaku dalam industri kewangan mikro ke arah, misi asal institusi kewangan mikro (MFI) khususnya untuk membasmi kemiskinan mungkin berganjak kepada memaksimakan keuntungan. Tesis ini oleh itu bertujuan untuk menyelidik perubahan misi di negara ahli dalam Pertubuhan Kerjasama Islam (OIC) dan bagaimana perubahan ini dipengaruhi oleh pelbagai faktor berkaitan institusi dan risiko makro. Kajian berbentuk kuantitatif ini mengguna pakai data panel, khususnya pemerhatian selama lima tahun (dari tahun 2011 hingga tahun 2015) terhadap 57 MFI di negara-negara OIC. Teknik kuasa dua terkecil biasa dengan penganggar teguh, tinjauan umum keratan rentas serta *temporal dependency* telah digunapakai dalam kajian ini. Hasil kajian seharusnya melenyapkan kekhuatiran tentang perubahan misi dan memperlihatkan bahawa bantuan yang diberikan kepada golongan miskin yang tegar sebenarnya boleh memperkukuh prestasi kewangan MFI. Walaubagaimanapun, dapatan yang positif tentang perubahan misi telah dikenal pasti untuk MFI yang diregulasikan dan yang matang. Dapatan juga menunjukkan bahawa institusi kewangan bukan perbankan dan organisasi bukan kerajaan memberikan lebih banyak bantuan sosial berbanding dengan institusi kewangan perbankan dan agensi kerajaan. Gabungan jaringan juga didapati memberikan impak yang positif lagi signifikan terhadap misi sosial MFI. Selain itu, kajian ini juga memaparkan dapatan yang bercampur berhubung kesan petunjuk institusi dan risiko makro. Kematangan, gabungan jaringan dan kadar pertumbuhan produk dalam negara kasar (GDP) mempunyai pengaruh yang lebih besar berbanding dengan faktor lain terhadap hubungan antara prestasi kewangan dengan prestasi sosial. Kajian ini menyokong paradigma timbal balik dan pendekatan peningkatan yang memacu kelestarian. Oleh itu, kajian merumuskan bahawa usaha untuk mencapai kelestarian kewangan tidak semestinya mengganggu misi sosial. Walaubagaimanapun, MFI perlu mengenal pasti titik keseimbangan untuk mengimbangkan matlamat berganda mereka dan meneruskan misi membasmi kemiskinan dalam operasi kewangan mikro.

Kata kunci: pengkomersialan, kewangan mikro, perubahan misi, prestasi, kelestarian

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Iftekhar Ahmed, October 2017

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LIST OF ACRONYMS

Acronyms	Descriptions
ACCION	ACCION Internation, A Global Non-profit Organization
ASA	Association for Social Advancement
BancoSol	Banco Solidario, S.A. (Bolivia)
BRAC	Bangladesh Rural Advancement Committee
BoP	Bottom of the Pyramid
CGAP	Consultative Group to Assist the Poor
CUC	Credit Union and Cooperatives
DBL	Double Bottom Lines
EAP	East Asia and Pacific
EECA	East Europe and Central Asia
EKI	Microcredit Foundation EKI
EU	European Union
FBPMC	Fondation Banque Populaire Micro-Credit
FFB	Fraction of Female Borrowers
FINCA	Foundation for International Community Assistance
FONDEP	Fondation pour le Développement Local et le Partenariat
FSS	Financial Self-sufficiency
GDP	Gross Domestic Product
GLP	Gross Loan Portfolio
GLS	Generalized Least Squares
GNI	Gross National Income
GNIALS	Gross National Income per Capita Adjusted Average Loan Size
ICFM	Islamic Conference by Foreign Minister
IMF	International Monetary Fund

IPO	Initial Public Offering
ISV	Industry Structure View
MENA	Middle-East and North Africa
MFI	Microfinance Institution
MFO	Microfinance Organization
MIX	Microfinance Information Exchange
NAB	Number of Active Borrowers
NBFI	Non-bank Financial Institution
NGO	Non-Governmental Organization
OIC	Organization of Islamic Cooperation
OLS	Ordinary Least Squares
OSS	Operational Self-sufficiency
PM	Profit Margin
RBV	Resource Based View
ROA	Return on Assets
ROE	Return on Equity
SA	South Asia
SACCOs	Savings and Credit Cooperative Societies
SHV	Stakeholder View
SPTF	Social Performance Task Force
SSA	Sub-Saharan Africa
TMFI	Transformed Microfinance Institution
WDI	World Development Indicators

CHAPTER 1: INTRODUCTION

1.0 Background of the Study

The journey of *microfinance* commenced from an initiative of Mohammad Yunus in a small rural community of Bangladesh. Subsequently, he provided formal financial institution structure to microfinance while he founded the Grameen Bank in 1983. The prime objective of microfinance was to provide small scale loans to women of the rural society and educate them to participate in income generating activities. These initiatives of microfinance can reduce poverty, promote well-being and contribute in development. Therefore, it is often considered as one of the most widely used development tools in many developing societies (Ayele, 2015; Quayes & Khalily, 2014).

However, Muhammad Yunus came up with the concept known as *microcredit* since at the beginning it was only providing small loans to the rural poor. Later microcredit extended its financial services and became more innovative in product development due to market demands (Chan & Lin, 2015; Cull, Demirgüç-Kunt, & Morduch, 2011) and eventually it has started recognizing as microfinance. This continuous development in microfinance industry had been only to achieve its prime objective of poverty reduction in different aspects (Chowdhury, 2009; Copestake, 2007).

Notwithstanding, delivering micro loan in a very rural area to the extreme poor is neither easy task, nor inexpensive (Abate, Borzaga, & Getnet, 2014; Dehem & Hudon, 2013). The institutions can only hire self-motivated personnel for the work, but the deficit of

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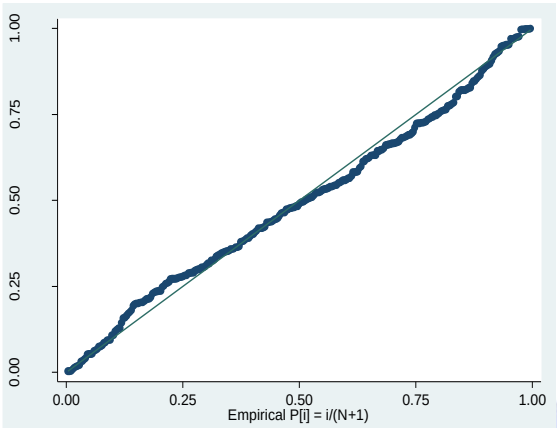
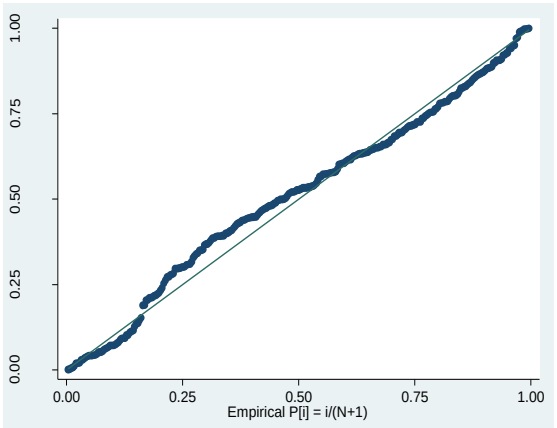
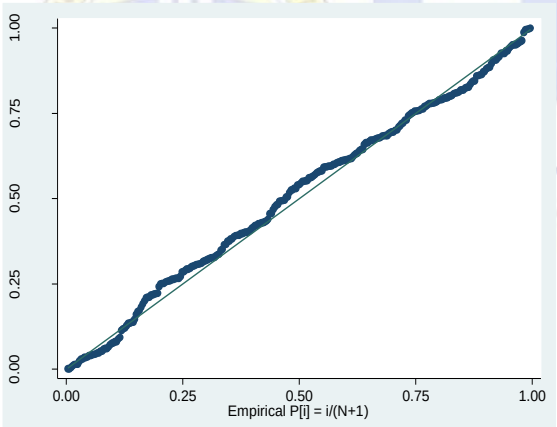
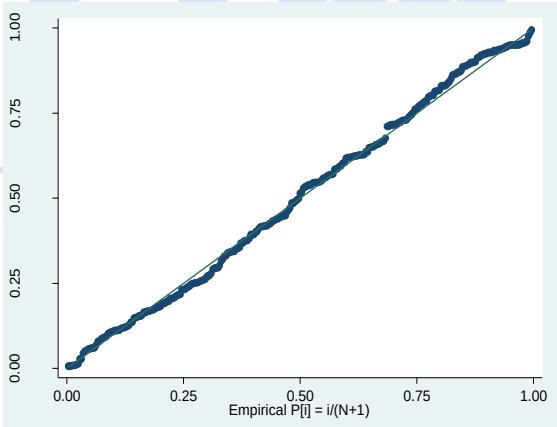
APPENDICES

Appendix A

Table A-1
Normality plot

Model 1	Model 2
	
Model 3	**Model 4**
	
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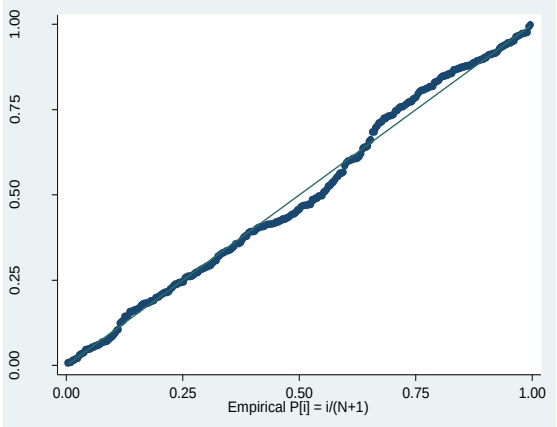	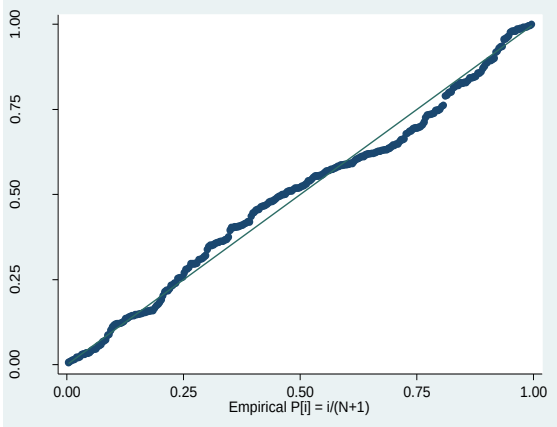

Table A-1 (Continued)

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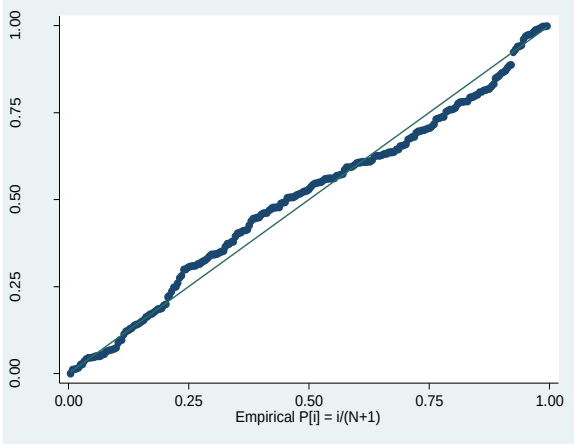	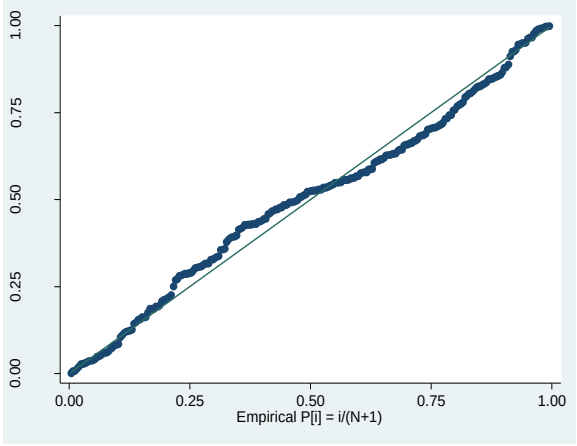
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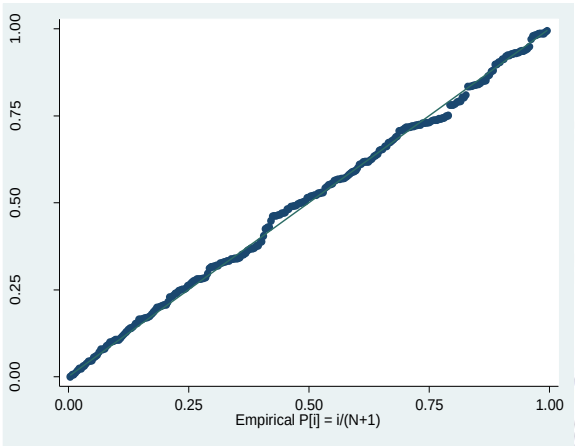
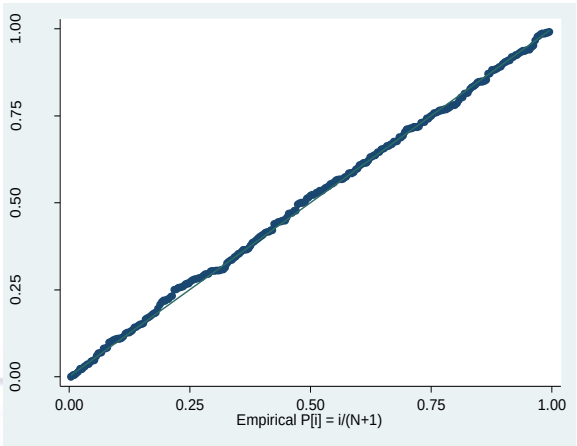
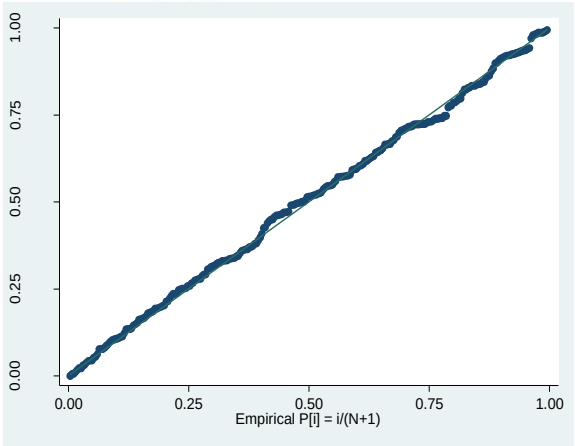
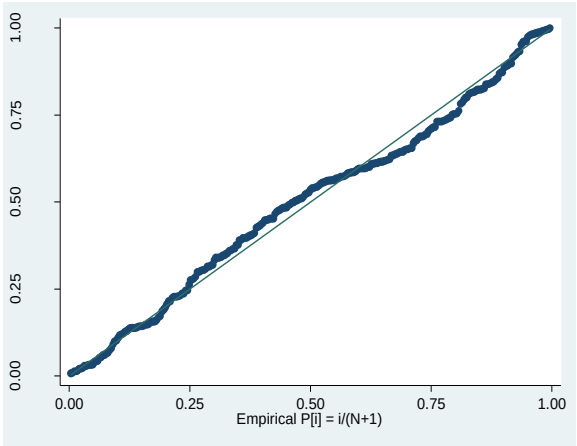
	
Model 11	**Model 12**
	

Table A-1 (Continued)

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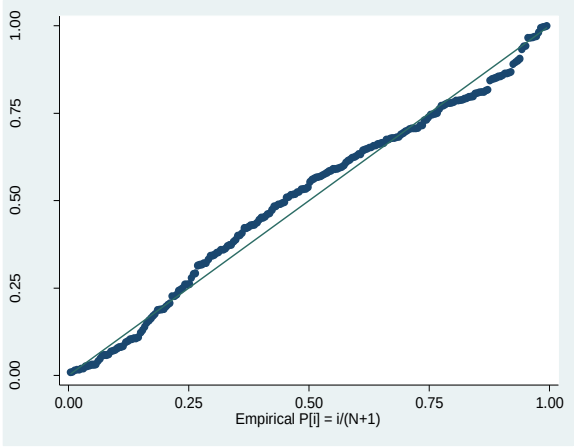	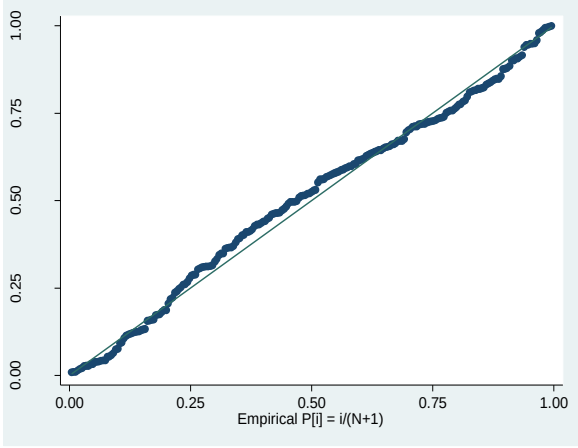
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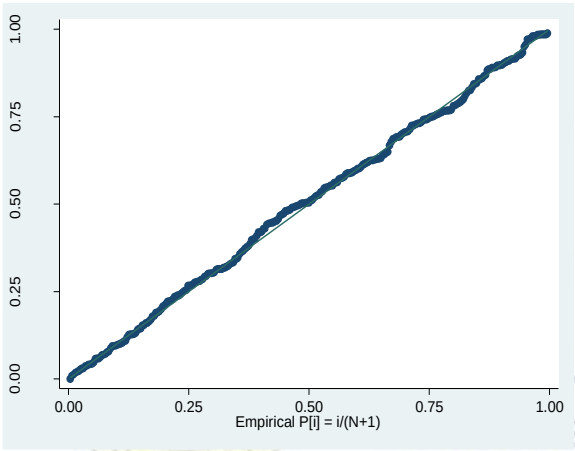
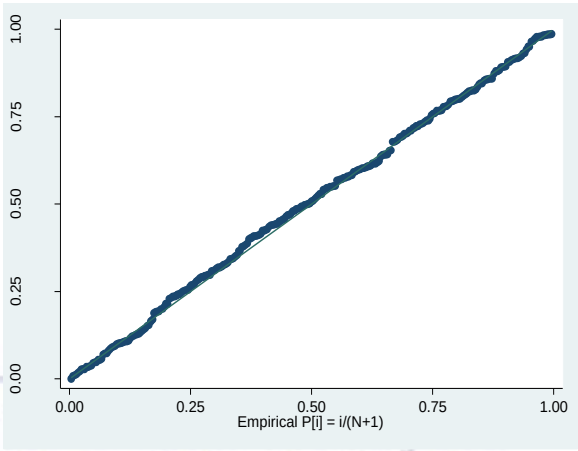
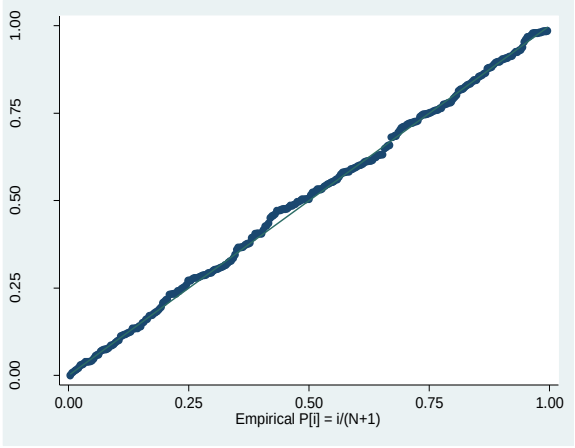
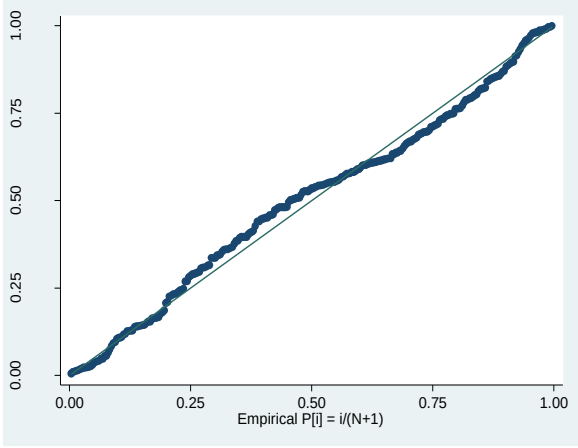
	
Model 17	**Model 18**
	

Table A-1 (Continued)

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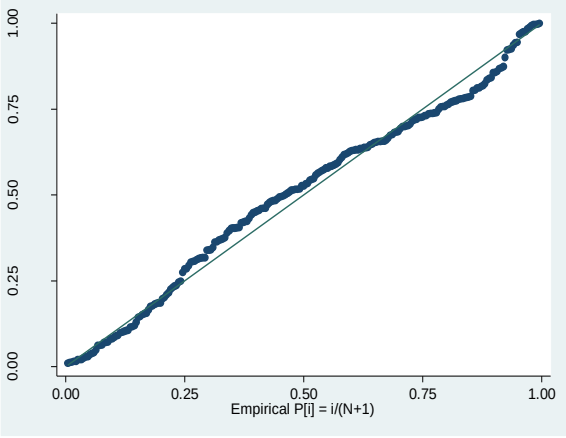
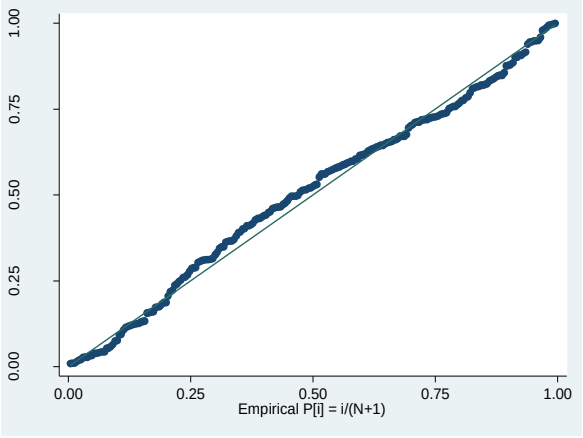
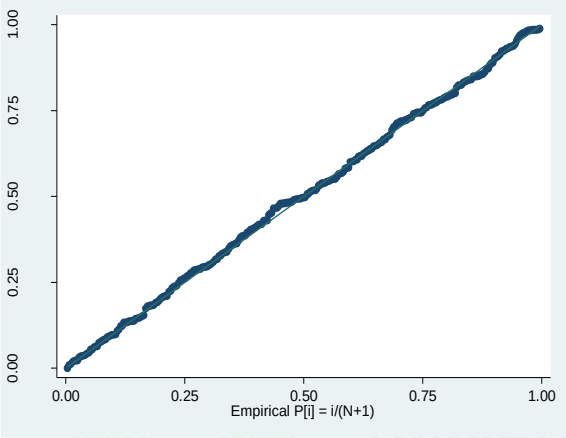
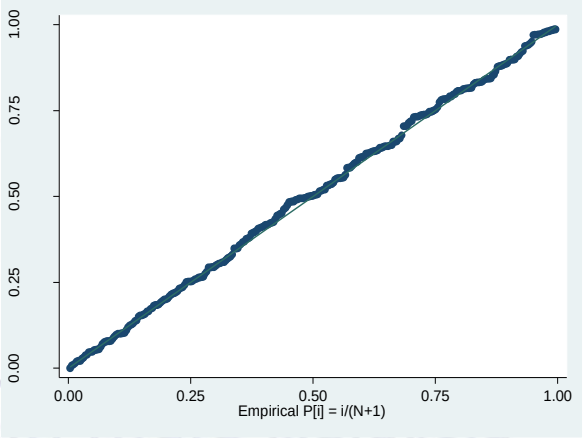
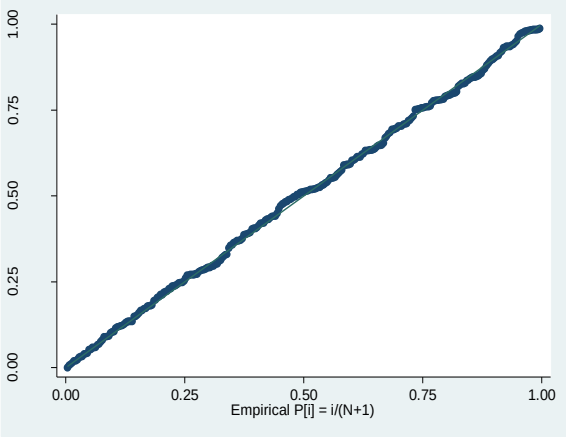
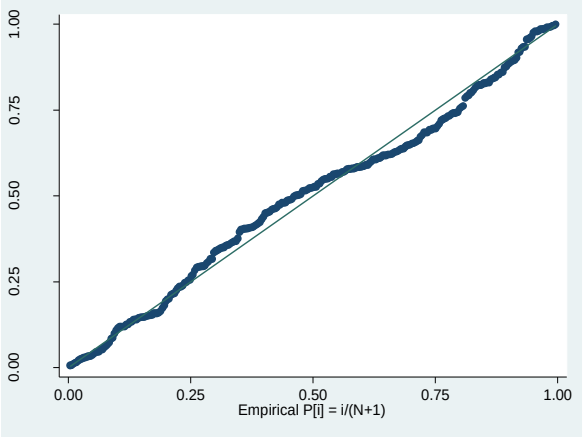
	
Model 21	**Model 22**
	
Model 23	**Model 24**
	

Table A-1 (Continued)

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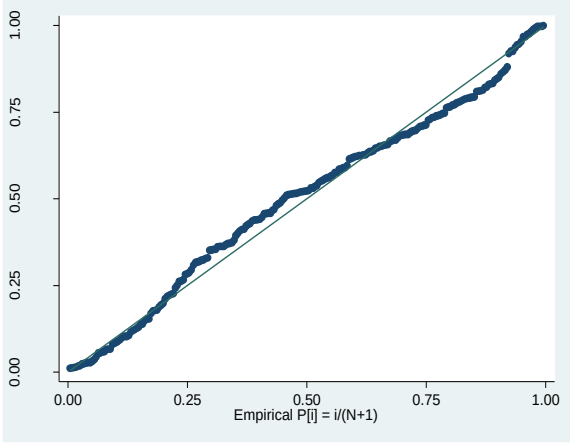

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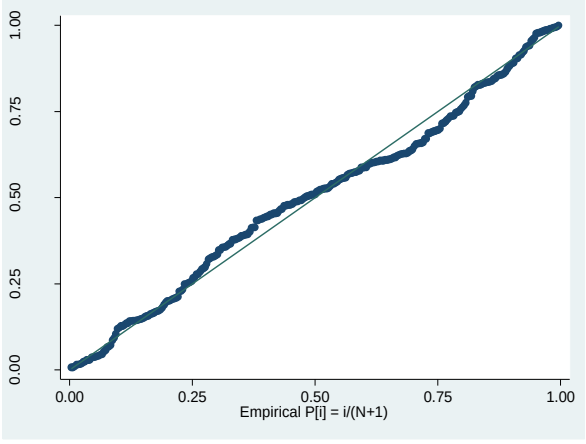

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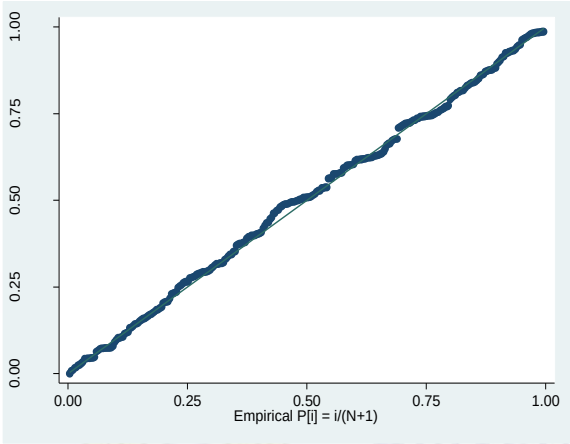

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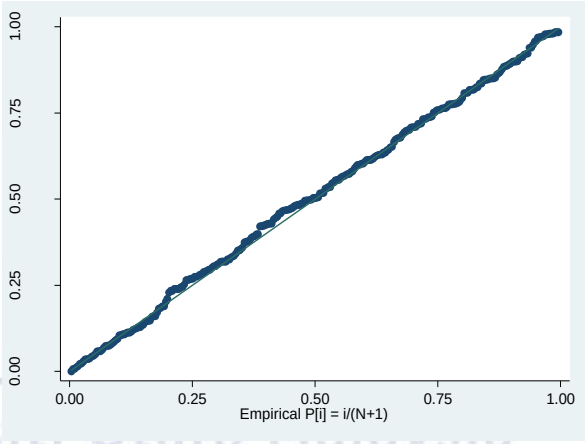

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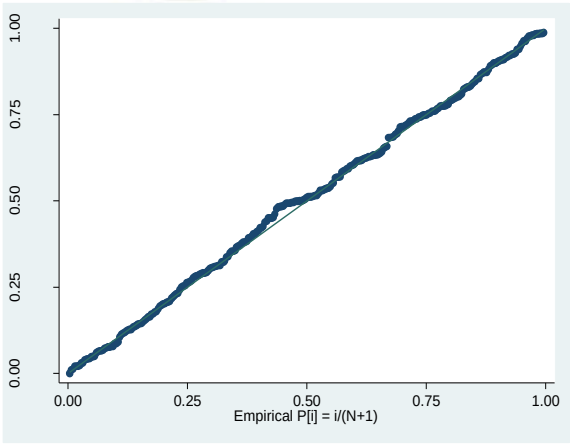

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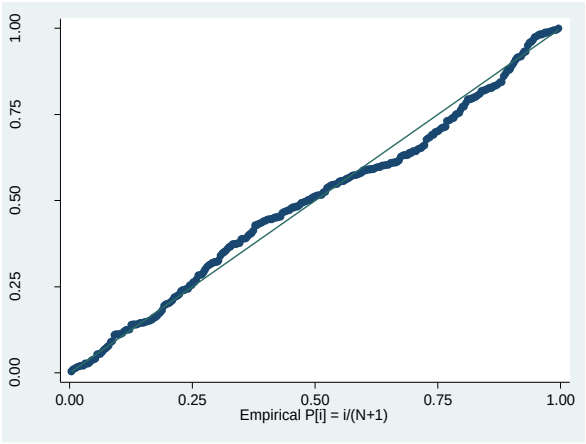
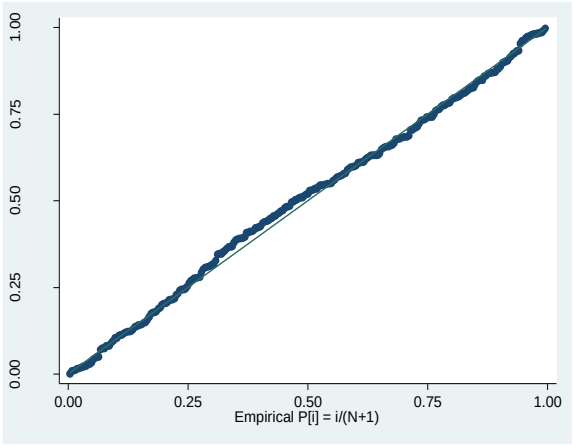


Table A-1 (Continued)

Model 31



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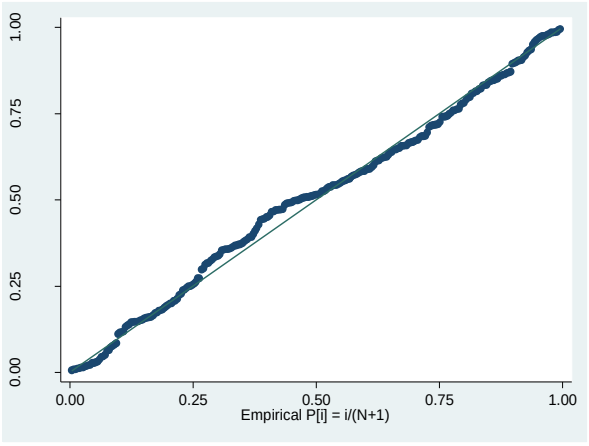
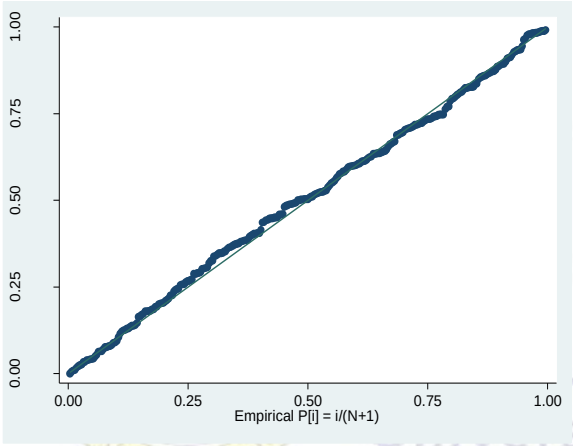
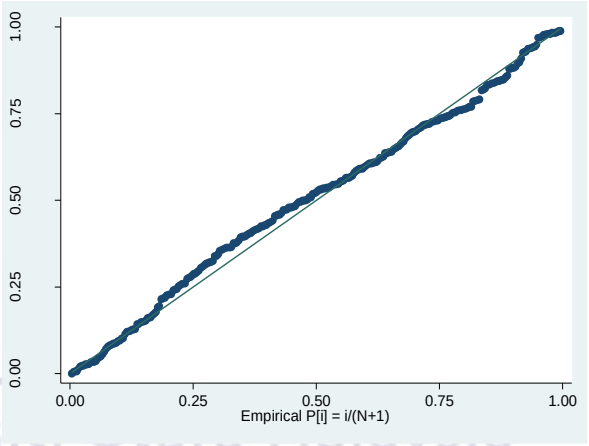


Model 33



Model 34



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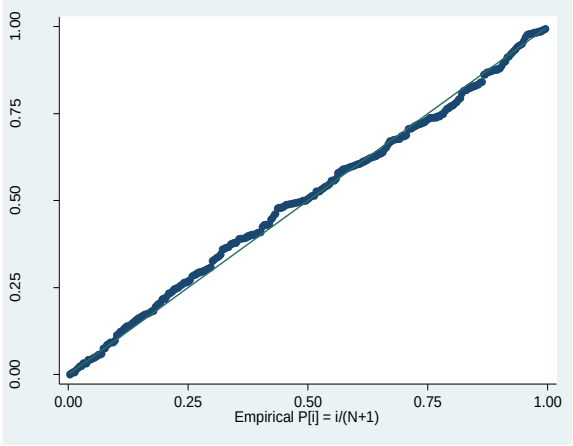

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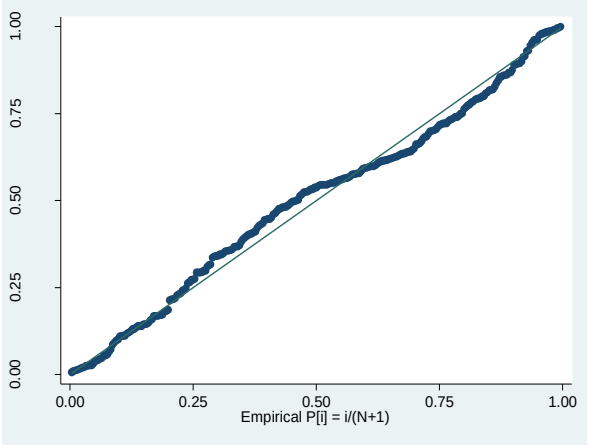

Table A-1 (Continued)

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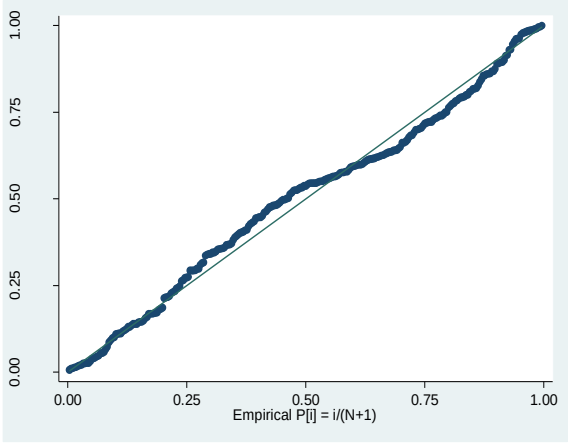
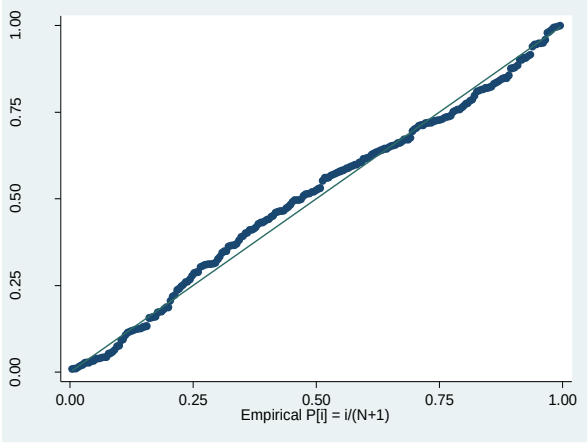
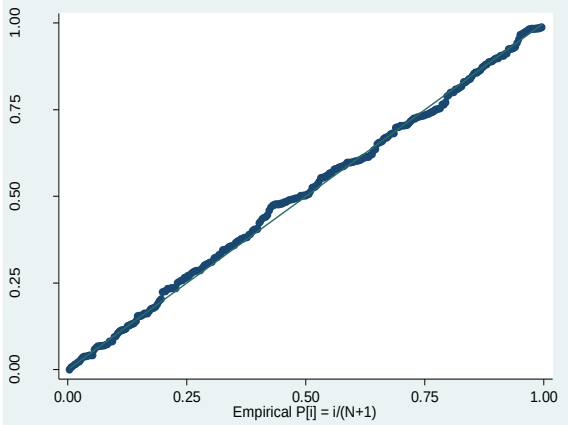


Model 38



Model 39



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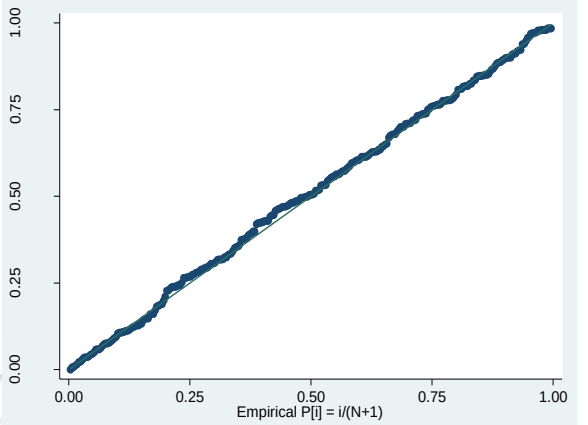

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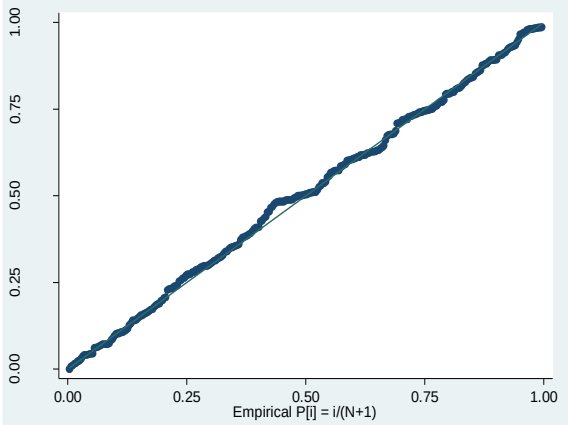


Model 42

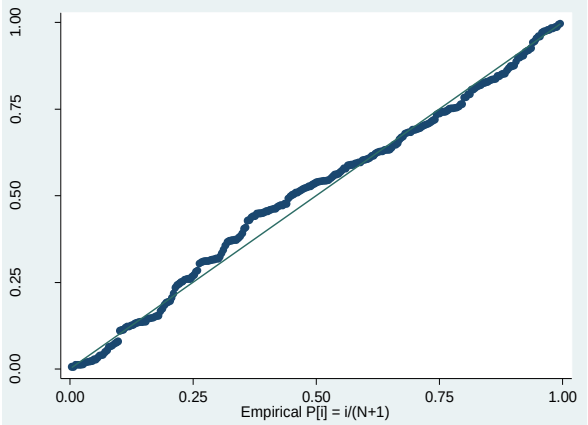


Table A-1 (Continued)

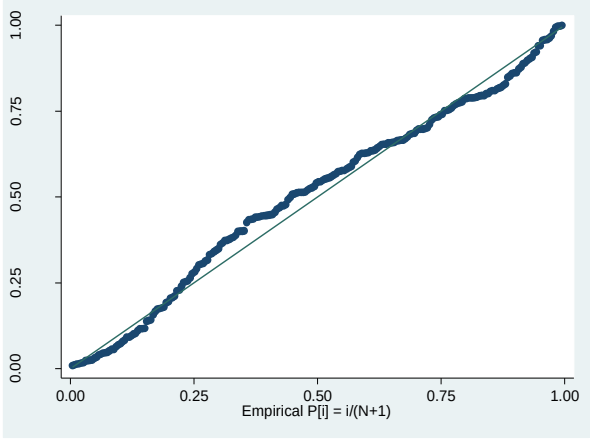
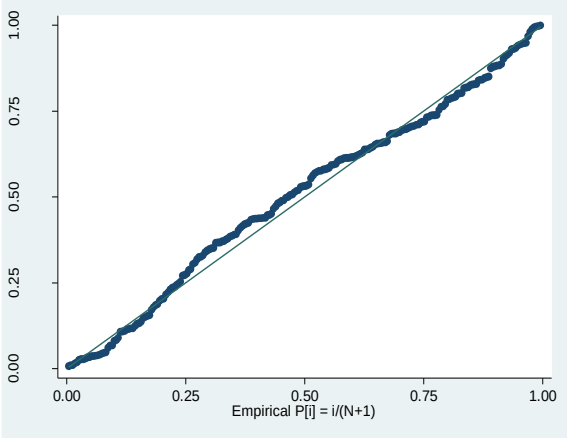
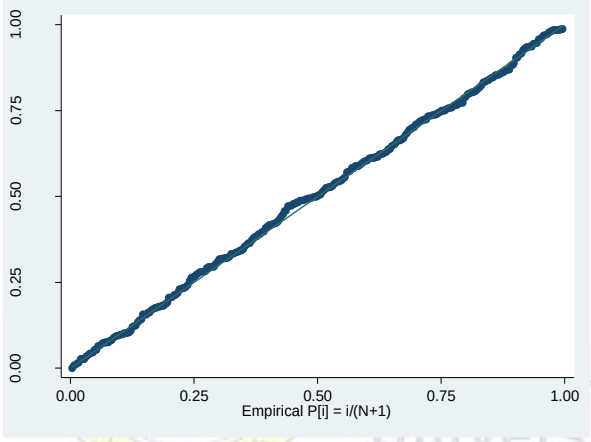
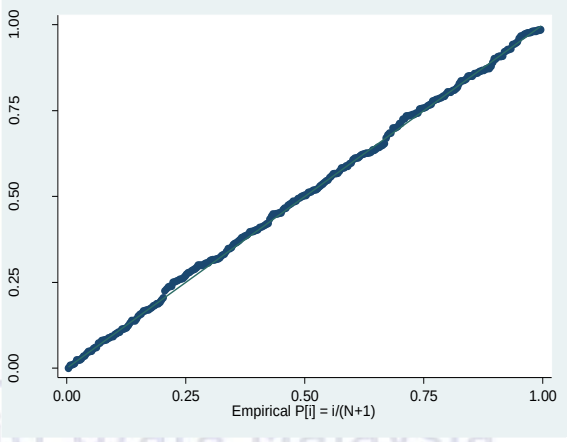
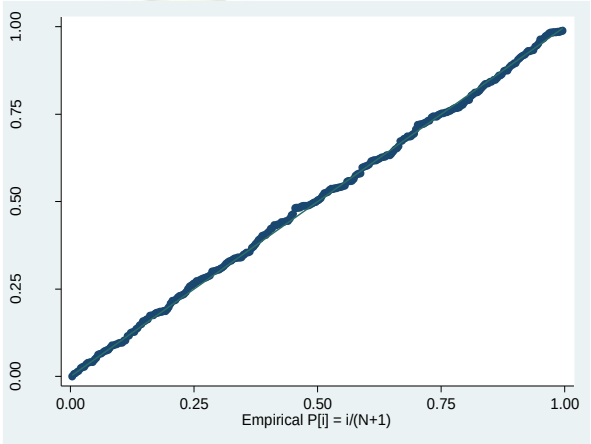
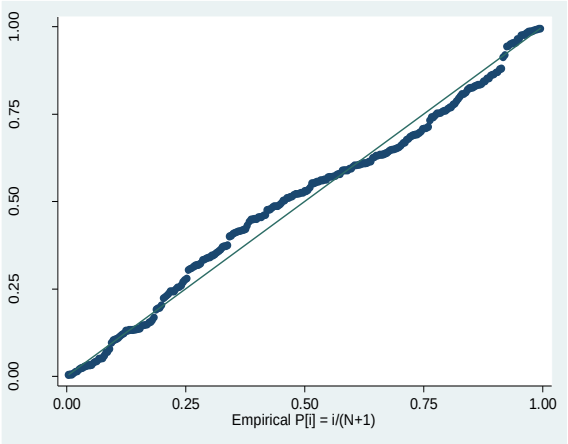
Model 43	Model 44
	
Model 45	**Model 46**
	
Model 47	**Model 48**
	

Table A-1 (Continued)

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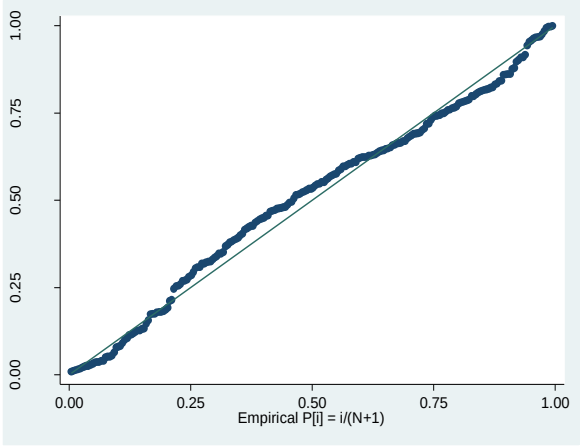

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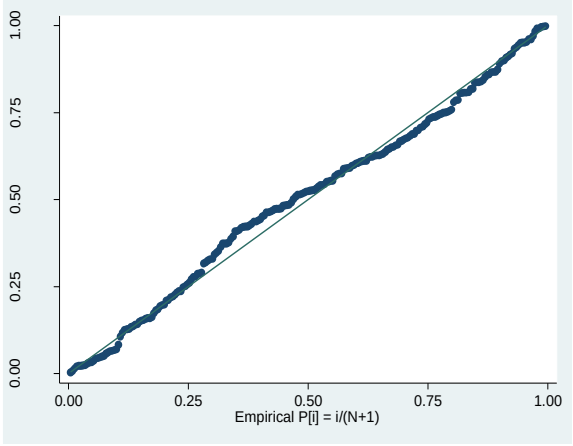

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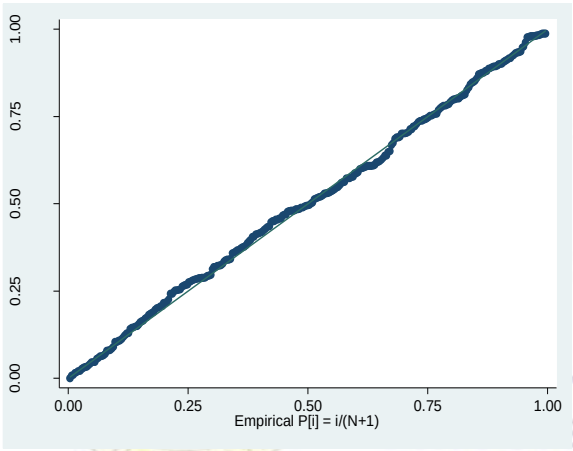
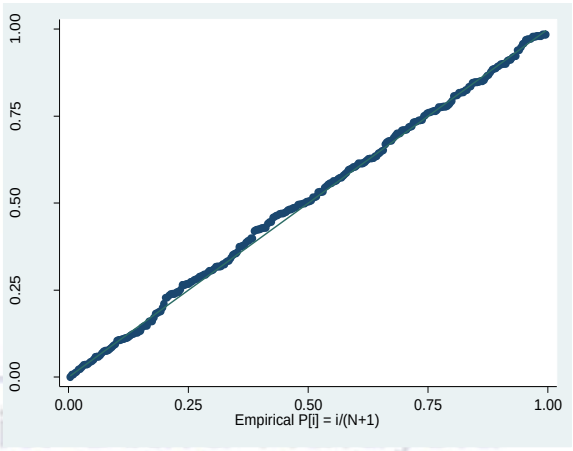
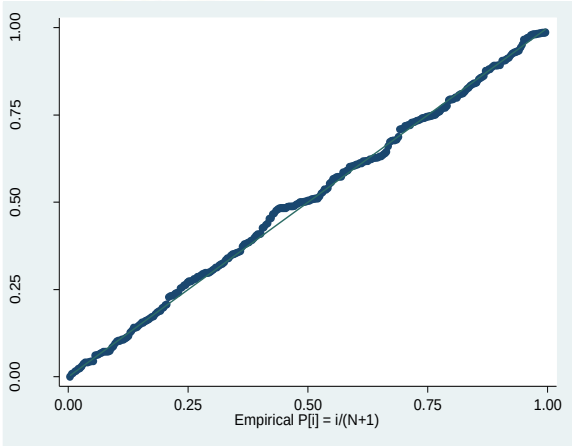


Model 52



Model 53



Source: Graphical outputs of the study dataset

Appendix B

Table B-1
Heteroscedasticity test results

Model 1

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of OSS

         chi2(1)      =    97.31
         Prob > chi2  =   0.0000
```

Model 2

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ROA

         chi2(1)      =     3.00
         Prob > chi2  =   0.0835
```

Model 3

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of PM

         chi2(1)      =     1.59
         Prob > chi2  =   0.2079
```

Model 4

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    77.80
         Prob > chi2  =   0.0000
```

Model 5

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.60
         Prob > chi2  =   0.4367
```

Model 6

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of lnALSGDP

         chi2(1)      =     2.68
         Prob > chi2  =   0.1015
```

Table B-1 (Continued)

Model 7

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of lnALSGDP

         chi2(1)      =    16.93
         Prob > chi2  =   0.0000
```

Model 8

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of lnALSGDP

         chi2(1)      =    14.85
         Prob > chi2  =   0.0001
```

Model 9

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.48
         Prob > chi2  =   0.4885
```

Model 10

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.82
         Prob > chi2  =   0.3660
```

Model 11

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.43
         Prob > chi2  =   0.5114
```

Model 12

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of lnALSGDP

         chi2(1)      =     2.40
         Prob > chi2  =   0.1212
```

Model 13

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    67.26
         Prob > chi2  =   0.0000
```

Table B-1 (Continued)

Model 14

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    78.83
         Prob > chi2  =   0.0000
```

Model 15

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     1.32
         Prob > chi2  =   0.2514
```

Model 16

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.01
         Prob > chi2  =   0.9358
```

Model 17

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.00
         Prob > chi2  =   0.9546
```

Model 18

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of lnALSGDP

         chi2(1)      =     2.92
         Prob > chi2  =   0.0877
```

Model 19

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    64.20
         Prob > chi2  =   0.0000
```

Model 20

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    78.83
         Prob > chi2  =   0.0000
```

Table B-1 (Continued)

Model 21

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.53
         Prob > chi2  =   0.4672
```

Model 22

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.01
         Prob > chi2  =   0.9358
```

Model 23

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.00
         Prob > chi2  =   0.9546
```

Model 24

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    63.57
         Prob > chi2  =   0.0000
```

Model 25

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    62.43
         Prob > chi2  =   0.0000
```

Model 26

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    65.28
         Prob > chi2  =   0.0000
```

Model 27

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.42
         Prob > chi2  =   0.5156
```

Table B-1 (Continued)

Model 28

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.01
         Prob > chi2  =   0.9199
```

Model 29

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.00
         Prob > chi2  =   0.9994
```

Model 30

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    54.31
         Prob > chi2  =   0.0000
```

Model 31

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    89.29
         Prob > chi2  =   0.0000
```

Model 32

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    76.49
         Prob > chi2  =   0.0000
```

Model 33

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of lnFFB

         chi2(1)      =    53.96
         Prob > chi2  =   0.0000
```

Model 34

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.06
         Prob > chi2  =   0.8090
```

Table B-1 (Continued)

Model 35

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.03
         Prob > chi2  =   0.8742
```

Model 36

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    62.69
         Prob > chi2  =   0.0000
```

Model 37

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    64.20
         Prob > chi2  =   0.0000
```

Model 38

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    78.83
         Prob > chi2  =   0.0000
```

Model 39

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     1.51
         Prob > chi2  =   0.2186
```

Model 40

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.00
         Prob > chi2  =   0.9473
```

Model 41

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.00
         Prob > chi2  =   0.9546
```

Table B-1 (Continued)

Model 42

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of ALSGDP

         chi2(1)      =    83.31
         Prob > chi2  =   0.0000
```

Model 43

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of lnALSGDP

         chi2(1)      =     7.48
         Prob > chi2  =   0.0062
```

Model 44

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of lnALSGDP

         chi2(1)      =    10.25
         Prob > chi2  =   0.0014
```

Model 45

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     1.02
         Prob > chi2  =   0.3136
```

Model 46

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.10
         Prob > chi2  =   0.7500
```

Model 47

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.05
         Prob > chi2  =   0.8244
```

Model 48

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of lnALSGDP

         chi2(1)      =     7.27
         Prob > chi2  =   0.0070
```

Table B-1 (Continued)

Model 49

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of lnALSGDP

         chi2(1)      =     8.89
         Prob > chi2  =   0.0029
```

Model 50

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of lnALSGDP

         chi2(1)      =    11.85
         Prob > chi2  =   0.0006
```

Model 51

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.58
         Prob > chi2  =   0.4467
```

Model 52

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.02
         Prob > chi2  =   0.8756
```

Model 53

```
Breusch-Pagan / Cook-Weisberg test for heteroskedasticity
         Ho: Constant variance
         Variables: fitted values of FFB

         chi2(1)      =     0.00
         Prob > chi2  =   0.9652
```

Source: Statistical outputs of the study dataset

Appendix C

Table C-1
Autocorrelation test results

Model 1

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =     58.373
           Prob > F =      0.0000
```

Model 2

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =     35.671
           Prob > F =      0.0000
```

Model 3

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =     25.108
           Prob > F =      0.0000
```

Model 4

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =     15.602
           Prob > F =      0.0002
```

Model 5

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =      1.309
           Prob > F =      0.2574
```

Model 6

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =     26.571
           Prob > F =      0.0000
```

Model 7

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      49) =     12.802
           Prob > F =      0.0008
```

Model 8

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      50) =     13.927
           Prob > F =      0.0005
```

Model 9

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      54) =      1.893
           Prob > F =      0.1745
```

Table C-1 (Continued)

Model 10

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      54) =      1.805
           Prob > F =      0.1847
```

Model 11

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      54) =      1.912
           Prob > F =      0.1724
```

Model 12

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =     28.912
           Prob > F =      0.0000
```

Model 13

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      43) =      7.613
           Prob > F =      0.0085
```

Model 14

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      45) =      9.149
           Prob > F =      0.0041
```

Model 15

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =      1.512
           Prob > F =      0.2240
```

Model 16

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      43) =      1.140
           Prob > F =      0.2916
```

Model 17

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      45) =      1.981
           Prob > F =      0.1661
```

Model 18

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =     15.156
           Prob > F =      0.0003
```

Model 19

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      48) =      6.982
           Prob > F =      0.0111
```

Table C-1 (Continued)

Model 20

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      45) =      9.149
           Prob > F =      0.0041
```

Model 21

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      54) =      1.948
           Prob > F =      0.1685
```

Model 22

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      43) =      1.140
           Prob > F =      0.2916
```

Model 23

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      45) =      1.981
           Prob > F =      0.1661
```

Model 24

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =     22.751
           Prob > F =      0.0000
```

Model 25

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      48) =      6.915
           Prob > F =      0.0115
```

Model 26

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =     23.044
           Prob > F =      0.0000
```

Model 27

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      54) =      1.908
           Prob > F =      0.1729
```

Model 28

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      43) =      1.188
           Prob > F =      0.2818
```

Model 29

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      45) =      1.972
           Prob > F =      0.1671
```

Table C-1 (Continued)

Model 30

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =     23.864
           Prob > F =      0.0000
```

Model 31

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      54) =     11.917
           Prob > F =      0.0011
```

Model 32

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      54) =     11.006
           Prob > F =      0.0016
```

Model 33

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =      0.440
           Prob > F =      0.5099
```

Model 34

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      43) =      0.979
           Prob > F =      0.3281
```

Model 35

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      45) =      2.078
           Prob > F =      0.1563
```

Model 36

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =      7.650
           Prob > F =      0.0077
```

Model 37

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      48) =      6.982
           Prob > F =      0.0111
```

Model 38

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      45) =      9.149
           Prob > F =      0.0041
```

Model 39

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,      56) =      1.515
           Prob > F =      0.2236
```

Table C-1 (Continued)

Model 40

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       48) =      1.028
           Prob > F =      0.3157
```

Model 41

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       45) =      1.981
           Prob > F =      0.1661
```

Model 42

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       54) =     10.424
           Prob > F =      0.0021
```

Model 43

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       43) =     25.732
           Prob > F =      0.0000
```

Model 44

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       45) =     25.117
           Prob > F =      0.0000
```

Model 45

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       54) =      2.225
           Prob > F =      0.1416
```

Model 46

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       43) =      1.173
           Prob > F =      0.2848
```

Model 47

```
Wooldridge test for autocorrelation in panel dat
H0: no first order autocorrelation
    F(  1,       45) =      1.969
           Prob > F =      0.1674
```

Model 48

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       54) =     13.353
           Prob > F =      0.0006
```

Model 49

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       43) =     22.432
           Prob > F =      0.0000
```

Table C-1 (Continued)

Model 50

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       45) =     18.133
           Prob > F =      0.0001
```

Model 51

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       54) =      1.897
           Prob > F =      0.1741
```

Model 52

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       43) =      1.047
           Prob > F =      0.3120
```

Model 53

```
Wooldridge test for autocorrelation in panel data
H0: no first order autocorrelation
    F(  1,       45) =      1.964
           Prob > F =      0.1679
```

Source: Statistical outputs of the study dataset

Appendix D

Table D-1
Estimations of the financial performance (dependent variable: OSS in Model 1, ROA in Model 2 and PM in Model 3)

Variable	Model 1	Model 2	Model 3
	b/se	b/se	b/se
Regulated	-0.055***	-0.013***	-0.011
	(0.015)	(0.003)	(0.026)
lnSize	-0.006	0.003***	0.012***
	(0.005)	(0.001)	(0.001)
lnMaturity	0.142***	0.025***	0.027
	(0.032)	(0.003)	(0.047)
Bank	0.275***	0.023	0.078**
	(0.082)	(0.015)	(0.033)
CUC	0.253***	0.053***	0.138***
	(0.061)	(0.012)	(0.038)
NBFI	0.250***	0.039***	0.111***
	(0.064)	(0.012)	(0.032)
NGO	0.345***	0.043**	0.133**
	(0.110)	(0.017)	(0.052)
Network	0.391***	0.066***	0.086
	(0.019)	(0.011)	(0.108)
Inflation	0.005	0.001*	-0.001
	(0.003)	(0.001)	(0.005)
GDP	-0.001	-0.000	-0.000
	(0.002)	(0.000)	(0.001)
OE	-2.985***	-0.492***	-2.245***
	(0.222)	(0.018)	(0.106)
FE	-4.288***	-0.370***	-1.944***
	(0.218)	(0.053)	(0.068)
PAR	-0.467**	-0.104***	-0.345**
	(0.231)	(0.025)	(0.139)
Yield	1.954***	0.371***	1.476***
	(0.121)	(0.017)	(0.103)
SSA	-0.144***	-0.028***	-0.153***
	(0.048)	(0.004)	(0.038)
EAP	0.253***	0.033***	0.035
	(0.022)	(0.009)	(0.057)
EECA	0.166***	0.024**	0.042
	(0.035)	(0.011)	(0.054)
MENA	-0.036	0.007	-0.025
	(0.063)	(0.005)	(0.037)

Table D-1 (Continued)

Variable	Model 1	Model 2	Model 3
Constant	0.365***	-0.202***	-0.312
	(0.098)	(0.016)	(0.195)
R-squared	0.603	0.605	0.543
Observation	285.000	285.000	285.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-2

Estimations of the social performance (dependent variable: GNIALS in Model 4 and FFB in Model 5)

Variable	**Model 4**	**Model 5**
	b/se	b/se
Regulated	0.055	-0.198***
	(0.035)	(0.008)
lnSize	-0.010	0.007***
	(0.008)	(0.002)
lnMaturity	0.070**	-0.039***
	(0.035)	(0.006)
Bank	1.062***	0.002
	(0.107)	(0.038)
CUC	1.361***	-0.002
	(0.217)	(0.034)
NBFI	0.685***	0.188***
	(0.139)	(0.015)
NGO	0.404***	0.219***
	(0.102)	(0.030)
Network	0.951***	0.277***
	(0.097)	(0.028)
Inflation	0.038***	0.011***
	(0.008)	(0.002)
GDP	0.052***	0.003
	(0.007)	(0.002)
BPSM	-0.001***	0.001***
	(0.000)	(0.000)
CPB	0.003***	-0.000***
	(0.000)	(0.000)
SSA	-0.348***	0.036**
	(0.046)	(0.016)
EAP	-0.383***	0.126***
	(0.035)	(0.041)
EECA	-0.545***	-0.190***
	(0.116)	(0.040)
MENA	-0.175***	-0.236***
	(0.033)	(0.014)
Constant	-1.623***	0.344***
	(0.267)	(0.107)
R-squared	0.677	0.667
Observation	285.000	285.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-3
Estimations of the mission drift (dependent variable: GNIALS)

Variable	Model 6	Model 7	Model 8
	b/se	b/se	b/se
OSS	-0.955***		
	(0.211)		
ROA		-0.333***	
		(0.045)	
PM			-0.231***
			(0.038)
Regulated	0.429***	0.512***	0.532***
	(0.024)	(0.043)	(0.033)
lnSize	-0.005	-0.068***	-0.038**
	(0.006)	(0.024)	(0.016)
lnMaturity	0.062**	-0.116*	-0.165**
	(0.026)	(0.059)	(0.068)
Bank	0.250	-0.259	-0.183
	(0.197)	(0.161)	(0.202)
CUC	0.473**	-0.588	-0.277
	(0.202)	(0.600)	(0.567)
NBFI	-0.475**	-0.750***	-0.753***
	(0.180)	(0.178)	(0.225)
NGO	-1.244***	-1.572***	-1.599***
	(0.230)	(0.159)	(0.205)
Network	-1.837***	-2.410***	-2.537***
	(0.055)	(0.111)	(0.119)
Inflation	0.004	-0.008	-0.011
	(0.009)	(0.013)	(0.013)
GDP	0.105***	0.090***	0.097***
	(0.018)	(0.016)	(0.018)
SSA	-0.603***	-0.287***	-0.364***
	(0.083)	(0.094)	(0.110)
EAP	-2.634***	-2.757***	-2.945***
	(0.083)	(0.227)	(0.201)
EECA	0.015	-0.149**	-0.234***
	(0.088)	(0.063)	(0.070)
MENA	-0.052	-0.101	-0.146
	(0.112)	(0.091)	(0.093)
Constant	0.686*	2.054***	2.481***
	(0.371)	(0.549)	(0.587)
R-squared	0.552	0.574	0.539
Observation	285.000	241.000	244.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-4
Estimations of the mission drift (dependent variable: FFB)

Variable	Model 9	Model 10	Model 11
	b/se	b/se	b/se
OSS	0.074**		
	(0.030)		
ROA		0.767***	
		(0.090)	
PM			0.095***
			(0.034)
Regulated	-0.203***	-0.191***	-0.205***
	(0.013)	(0.010)	(0.013)
lnSize	-0.010**	-0.011**	-0.012*
	(0.005)	(0.005)	(0.006)
lnMaturity	-0.032***	-0.040***	-0.027***
	(0.007)	(0.008)	(0.008)
Bank	0.152***	0.156***	0.163***
	(0.022)	(0.029)	(0.014)
CUC	0.152***	0.142***	0.157***
	(0.028)	(0.032)	(0.022)
NBFI	0.346***	0.335***	0.352***
	(0.032)	(0.040)	(0.026)
NGO	0.423***	0.405***	0.430***
	(0.045)	(0.052)	(0.038)
Network	0.480***	0.429***	0.488***
	(0.021)	(0.024)	(0.025)
Inflation	0.030**	0.027**	0.031***
	(0.012)	(0.011)	(0.012)
GDP	0.021***	0.022***	0.021***
	(0.004)	(0.005)	(0.004)
SSA	0.039	0.049	0.044
	(0.041)	(0.045)	(0.041)
EAP	0.186***	0.155***	0.190***
	(0.045)	(0.041)	(0.041)
EECA	-0.315***	-0.329***	-0.312***
	(0.051)	(0.043)	(0.048)
MENA	-0.275***	-0.278***	-0.272***
	(0.038)	(0.037)	(0.037)
Constant	0.342*	0.415**	0.333**
	(0.180)	(0.171)	(0.164)
R-squared	0.548	0.557	0.548
Observation	265.000	265.000	265.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-5
Estimations of the mission drift and regulation status (dependent variable: GNIALS)

Variable	Model 12	Model 13	Model 14
	b/se	b/se	b/se
OSS	-0.400***		
	(0.100)		
OSS*Regulated	-0.477***		
	(0.179)		
ROA		-0.355***	
		(0.069)	
ROA*Regulated		1.277	
		(1.782)	
PM			-0.222***
			(0.055)
PM*Regulated			0.011
			(0.349)
Regulated	0.446***	0.050	0.125
	(0.024)	(0.119)	(0.085)
lnSize	-0.009	0.019	0.043*
	(0.007)	(0.025)	(0.022)
lnMaturity	0.063**	-0.026	-0.059**
	(0.024)	(0.018)	(0.027)
Bank	0.131	0.352**	0.462***
	(0.160)	(0.132)	(0.114)
CUC	0.339	0.415	0.751**
	(0.272)	(0.381)	(0.313)
NBFI	-0.596***	0.092	0.127*
	(0.151)	(0.066)	(0.066)
NGO	-1.370***	-0.535***	-0.508***
	(0.163)	(0.129)	(0.146)
Network	-1.935***	0.210	0.127
	(0.074)	(0.164)	(0.082)
Inflation	0.004	0.191**	0.188***
	(0.010)	(0.075)	(0.070)
GDP	0.105***	0.221***	0.240***
	(0.017)	(0.022)	(0.026)
SSA	-0.615***	-0.172***	-0.250***
	(0.097)	(0.056)	(0.036)
EAP	-2.655***	-0.760***	-0.904***
	(0.079)	(0.116)	(0.135)
EECA	-0.013	0.043	-0.029
	(0.098)	(0.046)	(0.041)
MENA	-0.065	0.188*	0.138
	(0.123)	(0.101)	(0.094)

Table D-5 (Continued)

Variable	Model 12	Model 13	Model 14
Constant	1.871***	-1.639***	-1.185**
	(0.643)	(0.593)	(0.565)
R-squared	0.555	0.462	0.401
Observation	285.000	226.000	229.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-6
Estimations of the mission drift and regulation status (dependent variable: FFB)

Variable	Model 15	Model 16	Model 17
	b/se	b/se	b/se
OSS	-0.167***		
	(0.055)		
OSS*Regulated	0.237***		
	(0.078)		
ROA		0.031*	
		(0.018)	
ROA*Regulated		0.277	
		(0.519)	
PM			0.042***
			(0.013)
PM*Regulated			-0.240*
			(0.121)
Regulated	-0.212***	-0.216***	-0.173***
	(0.011)	(0.034)	(0.023)
lnSize	-0.012***	0.008**	-0.004
	(0.003)	(0.003)	(0.006)
lnMaturity	-0.022***	0.012	0.044***
	(0.008)	(0.018)	(0.014)
Bank	0.171***	0.248***	0.256***
	(0.032)	(0.029)	(0.038)
CUC	0.181***	0.330***	0.288***
	(0.062)	(0.068)	(0.072)
NBFI	0.365***	0.398***	0.408***
	(0.040)	(0.024)	(0.031)
NGO	0.457***	0.481***	0.502***
	(0.034)	(0.008)	(0.017)
Network	0.560***	0.562***	0.628***
	(0.041)	(0.025)	(0.047)
Inflation	0.011***	0.062***	0.064***
	(0.002)	(0.014)	(0.013)
GDP	-0.002	0.035***	0.030***
	(0.003)	(0.004)	(0.004)
SSA	0.075***	0.065**	0.073***
	(0.015)	(0.029)	(0.026)
EAP	0.226***	0.236***	0.281***
	(0.033)	(0.067)	(0.061)
EECA	-0.288***	-0.264***	-0.243***
	(0.027)	(0.063)	(0.065)
MENA	-0.274***	-0.226***	-0.216***
	(0.009)	(0.038)	(0.038)

Table D-6 (Continued)

Variable	Model 15	Model 16	Model 17
Constant	0.184**	-0.244*	-0.218
	(0.074)	(0.144)	(0.158)
R-squared	0.541	0.601	0.595
Observation	285.000	226.000	229.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-7

Estimations of mission drift and the size of MFIs (dependent variable: GNIALS)

Variable	Model 18	Model 19	Model 20
	b/se	b/se	b/se
OSS	0.808		
	(0.543)		
OSS*lnSize	-1.412***		
	(0.322)		
ROA		-0.361***	
		(0.060)	
ROA*lnSize		0.049	
		(0.074)	
PM			-0.222***
			(0.055)
PM*lnSize			0.001
			(0.017)
Regulated	0.469***	0.130***	0.127**
	(0.027)	(0.039)	(0.057)
lnSize	-0.014*	0.001	0.043*
	(0.007)	(0.024)	(0.022)
lnMaturity	0.069*	0.017	-0.059**
	(0.038)	(0.028)	(0.027)
Bank	0.200	0.475***	0.462***
	(0.153)	(0.179)	(0.114)
CUC	0.427*	0.391	0.751**
	(0.215)	(0.436)	(0.313)
NBFI	-0.519***	0.222	0.127*
	(0.168)	(0.144)	(0.066)
NGO	-1.298***	-0.452***	-0.508***
	(0.195)	(0.129)	(0.146)
Network	-1.861***	0.136	0.127
	(0.034)	(0.155)	(0.082)
Inflation	0.032	0.138***	0.188***
	(0.023)	(0.047)	(0.070)
GDP	0.108***	0.066***	0.240***
	(0.018)	(0.016)	(0.026)
SSA	-0.463***	-0.134**	-0.250***
	(0.071)	(0.062)	(0.036)
EAP	-2.639***	-0.759***	-0.904***
	(0.066)	(0.094)	(0.135)
EECA	0.013	-0.016	-0.029
	(0.091)	(0.069)	(0.041)
MENA	0.006	0.220**	0.138
	(0.099)	(0.087)	(0.094)

Table D-7 (Continued)

Variable	Model 18	Model 19	Model 20
Constant	2.200***	-1.433**	-1.186**
	(0.620)	(0.688)	(0.572)
R-squared	0.560	0.452	0.401
Observation	275.000	235.000	229.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-8
Estimations of the mission drift and the size of MFIs (dependent variable: FFB)

Variable	Model 21	Model 22	Model 23
	b/se	b/se	b/se
OSS	0.245		
	(0.195)		
OSS*lnSize	-0.135		
	(0.139)		
ROA		0.031*	
		(0.018)	
ROA*lnSize		0.014	
		(0.026)	
PM			0.042***
			(0.013)
PM*lnSize			-0.012*
			(0.006)
Regulated	-0.201***	-0.202***	-0.215***
	(0.014)	(0.009)	(0.010)
lnSize	-0.012**	0.007**	-0.002
	(0.006)	(0.003)	(0.006)
lnMaturity	-0.029***	0.012	0.044***
	(0.006)	(0.018)	(0.014)
Bank	0.153***	0.248***	0.256***
	(0.027)	(0.029)	(0.038)
CUC	0.142***	0.330***	0.288***
	(0.041)	(0.068)	(0.072)
NBFI	0.341***	0.398***	0.408***
	(0.043)	(0.024)	(0.031)
NGO	0.418***	0.481***	0.502***
	(0.057)	(0.008)	(0.017)
Network	0.477***	0.562***	0.628***
	(0.022)	(0.025)	(0.047)
lnInflation	0.029**	0.062***	0.064***
	(0.013)	(0.014)	(0.013)
lnGDP	0.021***	0.035***	0.030***
	(0.004)	(0.004)	(0.004)
SSA	0.045	0.065**	0.073***
	(0.037)	(0.029)	(0.026)
EAP	0.186***	0.236***	0.281***
	(0.045)	(0.067)	(0.061)
EECA	-0.317***	-0.264***	-0.243***
	(0.053)	(0.063)	(0.065)
MENA	-0.275***	-0.226***	-0.216***
	(0.038)	(0.038)	(0.038)

Table D-8 (Continued)

Variable	Model 21	Model 22	Model 23
Constant	0.496	-0.250*	-0.207
	(0.322)	(0.149)	(0.162)
R-squared	0.548	0.601	0.595
Observation	265.000	226.000	229.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-9
Estimations of the mission drift and the maturity of MFIs (dependent variable: GNIALS)

Variable	**Model 24**	**Model 25**	**Model 26**
	b/se	b/se	b/se
OSS	-1.087***		
	(0.254)		
OSS*lnMaturity	0.080**		
	(0.033)		
ROA		-0.409***	
		(0.041)	
ROA*lnMaturity		0.929***	
		(0.202)	
PM			-1.874**
			(0.783)
PM*lnMaturity			0.407*
			(0.242)
Regulated	0.055**	0.146***	0.065**
	(0.025)	(0.036)	(0.025)
lnSize	0.047***	0.008	0.061***
	(0.011)	(0.022)	(0.006)
lnMaturity	0.060	-0.057*	0.071
	(0.078)	(0.033)	(0.077)
Bank	0.818***	0.425**	0.701***
	(0.135)	(0.180)	(0.166)
CUC	1.035***	0.373	0.975***
	(0.257)	(0.434)	(0.293)
NBFI	0.320**	0.201	0.248*
	(0.122)	(0.144)	(0.145)
NGO	-0.303**	-0.485***	-0.405***
	(0.144)	(0.128)	(0.134)
Network	0.443***	0.048	0.363***
	(0.117)	(0.134)	(0.123)
Inflation	0.035***	0.134***	0.033***
	(0.009)	(0.044)	(0.008)
GDP	0.080***	0.065***	0.080***
	(0.016)	(0.016)	(0.016)
SSA	-0.454***	-0.142**	-0.426***
	(0.028)	(0.064)	(0.038)
EAP	-0.669***	-0.796***	-0.690***
	(0.053)	(0.111)	(0.062)
EECA	0.099	-0.028	0.097
	(0.061)	(0.064)	(0.061)
MENA	0.200***	0.219***	0.205***
	(0.066)	(0.078)	(0.050)

Table D-9 (Continued)

Variable	Model 24	Model 25	Model 26
Constant	-1.685***	-1.486**	-1.616***
	(0.524)	(0.713)	(0.549)
R-squared	0.406	0.455	0.400
Observation	285.000	235.000	285.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-10
Estimations of the mission drift and the maturity of MFIs (dependent variable: FFB)

Variable	**Model 27**	**Model 28**	**Model 29**
	b/se	b/se	b/se
OSS	0.163**		
	(0.071)		
OSS*lnMaturity	-0.024*		
	(0.014)		
ROA		0.042***	
		(0.015)	
ROA*lnMaturity		-0.060	
		(0.084)	
PM			0.038***
			(0.005)
PM*lnMaturity			-0.060***
			(0.014)
Regulated	-0.204***	-0.203***	-0.215***
	(0.014)	(0.009)	(0.011)
lnSize	-0.012**	0.007**	-0.004
	(0.005)	(0.003)	(0.006)
lnMaturity	0.001	0.019	0.057***
	(0.020)	(0.019)	(0.013)
Bank	0.160***	0.251***	0.260***
	(0.021)	(0.031)	(0.037)
CUC	0.151***	0.331***	0.285***
	(0.029)	(0.067)	(0.067)
NBFI	0.346***	0.399***	0.409***
	(0.033)	(0.024)	(0.031)
NGO	0.425***	0.484***	0.502***
	(0.046)	(0.008)	(0.015)
Network	0.484***	0.576***	0.628***
	(0.025)	(0.021)	(0.037)
Inflation	0.030**	0.063***	0.063***
	(0.012)	(0.015)	(0.014)
GDP	0.021***	0.035***	0.030***
	(0.004)	(0.004)	(0.004)
SSA	0.040	0.068**	0.071***
	(0.042)	(0.029)	(0.026)
EAP	0.185***	0.243***	0.280***
	(0.047)	(0.072)	(0.067)
EECA	-0.317***	-0.262***	-0.244***
	(0.052)	(0.066)	(0.068)
MENA	-0.276***	-0.224***	-0.219***
	(0.039)	(0.039)	(0.040)

Table D-10 (Continued)

Variable	Model 27	Model 28	Model 29
Constant	0.335*	-0.220	-0.222
	(0.179)	(0.142)	(0.156)
R-squared	0.548	0.601	0.595
Observation	265.000	226.000	229.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-11
Estimations of the mission drift and the types of MFIs (dependent variable: GNIALS)

Variable	**Model 30**	**Model 31**	**Model 32**
	b/se	b/se	b/se
OSS	-0.316		
	(0.497)		
OSS*Bank	-1.583***		
	(0.327)		
OSS*CUC	-0.586		
	(0.684)		
OSS*NBFI	-0.320		
	(0.568)		
OSS*NGO	0.207		
	(0.488)		
ROA		-0.649	
		(0.771)	
ROA*Bank		-5.815***	
		(0.850)	
ROA*CUC		-4.381	
		(3.780)	
ROA*NBFI		-3.937***	
		(1.194)	
ROA*NGO		0.784	
		(1.130)	
PM			-0.105
			(0.186)
PM*Bank			-1.810***
			(0.283)
PM*CUC			-0.877*
			(0.447)
PM*NBFI			-0.442*
			(0.223)
PM*NGO			0.188
			(0.243)
Regulated	0.059**	0.070*	0.063
	(0.022)	(0.037)	(0.051)
lnSize	0.070***	0.092***	0.087***
	(0.009)	(0.009)	(0.006)
lnMaturity	0.181***	0.074**	0.092***
	(0.055)	(0.030)	(0.027)
Bank	0.590***	0.716***	0.857***
	(0.219)	(0.120)	(0.098)
CUC	0.868*	1.194***	1.203***
	(0.449)	(0.274)	(0.257)

Table D-11 (Continued)

Variable	Model 30	Model 31	Model 32
NBFI	0.215	0.344***	0.259***
	(0.228)	(0.110)	(0.063)
NGO	-0.473***	-0.495***	-0.483***
	(0.162)	(0.050)	(0.054)
Network	0.409**	0.543***	0.432**
	(0.167)	(0.195)	(0.168)
Inflation	0.033***	0.226***	0.205***
	(0.008)	(0.034)	(0.038)
GDP	0.074***	0.278***	0.270***
	(0.017)	(0.034)	(0.034)
SSA	-0.441***	-0.365***	-0.388***
	(0.052)	(0.097)	(0.083)
EAP	-0.647***	-0.601***	-0.708***
	(0.048)	(0.129)	(0.085)
EECA	0.134**	0.210***	0.185***
	(0.054)	(0.053)	(0.053)
MENA	0.192***	0.221***	0.195***
	(0.067)	(0.043)	(0.047)
Constant	1.026	-2.655***	-2.467***
	(2.544)	(0.433)	(0.353)
R-squared	0.435	0.448	0.443
Observation	285.000	265.000	265.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-12
Estimations of the mission drift and the types of MFIs (dependent variable: FFB)

Variable	**Model 33**	**Model 34**	**Model 35**
	b/se	b/se	b/se
OSS	0.207		
	(0.220)		
OSS*Bank	0.242		
	(0.292)		
OSS*CUC	0.158		
	(0.341)		
OSS*NBFI	-0.155		
	(0.166)		
OSS*NGO	-0.203		
	(0.180)		
ROA		0.004	
		(0.016)	
ROA*Bank		3.913***	
		(0.779)	
ROA*CUC		1.132	
		(0.917)	
ROA*NBFI		1.697**	
		(0.730)	
ROA*NGO		-0.448*	
		(0.264)	
PM			0.020
			(0.016)
PM*Bank			0.084
			(0.198)
PM*CUC			0.412**
			(0.168)
PM*NBFI			0.017
			(0.246)
PM*NGO			-0.227***
			(0.082)
Regulated	-0.279***	-0.237***	-0.217***
	(0.037)	(0.014)	(0.013)
lnSize	-0.034***	0.003	-0.006
	(0.011)	(0.003)	(0.006)
lnMaturity	0.003	0.013	0.049***
	(0.019)	(0.027)	(0.014)
Bank	0.004	0.118***	0.255***
	(0.085)	(0.035)	(0.077)
CUC	0.134	0.332***	0.224**
	(0.096)	(0.097)	(0.104)

Table D-12 (Continued)

Variable	Model 33	Model 34	Model 35
NBFI	0.461***	0.323***	0.417***
	(0.039)	(0.063)	(0.085)
NGO	0.695***	0.529***	0.556***
	(0.040)	(0.026)	(0.039)
Network	0.648***	0.629***	0.588***
	(0.087)	(0.046)	(0.047)
Inflation	0.026***	0.059***	0.064***
	(0.003)	(0.018)	(0.014)
GDP	-0.017**	0.036***	0.030***
	(0.007)	(0.004)	(0.004)
SSA	0.359***	-0.010	0.091***
	(0.057)	(0.046)	(0.030)
EAP	0.493***	0.216**	0.276***
	(0.092)	(0.085)	(0.067)
EECA	-0.367***	-0.268***	-0.247***
	(0.096)	(0.071)	(0.070)
MENA	-0.323***	-0.239***	-0.216***
	(0.059)	(0.049)	(0.040)
Constant	-0.898	-0.284	-0.202
	(0.754)	(0.170)	(0.173)
R-squared	0.387	0.622	0.600
Observation	285.000	226.000	229.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-13

Estimations of the mission drift and network membership (dependent variable: GNIALS)

Variable	Model 36	Model 37	Model 38
	b/se	b/se	b/se
OSS	-1.032**		
	(0.487)		
OSS*Network	0.143		
	(0.299)		
ROA		-0.361***	
		(0.060)	
ROA*Network		0.847	
		(1.268)	
PM			-0.222***
			(0.055)
PM*Network			0.010
			(0.294)
Regulated	0.090***	0.130***	0.127**
	(0.030)	(0.039)	(0.057)
lnSize	0.049***	0.003	0.043*
	(0.010)	(0.022)	(0.022)
lnMaturity	0.132**	0.017	-0.059**
	(0.053)	(0.028)	(0.027)
Bank	0.777***	0.475***	0.462***
	(0.127)	(0.179)	(0.114)
CUC	1.096***	0.391	0.751**
	(0.237)	(0.436)	(0.313)
NBFI	0.315**	0.222	0.127*
	(0.126)	(0.144)	(0.066)
NGO	-0.302*	-0.452***	-0.508***
	(0.152)	(0.129)	(0.146)
Network	0.457***	0.125	0.126
	(0.101)	(0.170)	(0.083)
Inflation	0.179***	0.138***	0.188***
	(0.017)	(0.047)	(0.070)
GDP	0.083***	0.066***	0.240***
	(0.017)	(0.016)	(0.026)
SSA	-0.372***	-0.134**	-0.250***
	(0.035)	(0.062)	(0.036)
EAP	-0.698***	-0.759***	-0.904***
	(0.054)	(0.094)	(0.135)
EECA	0.118*	-0.016	-0.029
	(0.068)	(0.069)	(0.041)
MENA	0.278***	0.220**	0.138
	(0.064)	(0.087)	(0.094)

Table D-13 (Continued)

Variable	Model 36	Model 37	Model 38
Constant	-1.987***	-1.447**	-1.186**
	(0.493)	(0.674)	(0.578)
R-squared	0.414	0.452	0.401
Observation	275.000	235.000	229.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-14

Estimations of the mission drift and network membership (dependent variable: FFB)

Variable	Model 39	Model 40	Model 41
	b/se	b/se	b/se
OSS	0.419**		
	(0.197)		
OSS*Network	-0.299**		
	(0.145)		
ROA		0.016	
		(0.017)	
ROA*Network		0.457	
		(0.401)	
PM			0.042***
			(0.013)
PM*Network			-0.203*
			(0.102)
Regulated	-0.202***	-0.200***	-0.215***
	(0.011)	(0.007)	(0.010)
lnSize	-0.013***	0.004*	-0.004
	(0.004)	(0.002)	(0.006)
lnMaturity	-0.025***	0.003	0.044***
	(0.005)	(0.014)	(0.014)
Bank	0.105***	0.164***	0.256***
	(0.026)	(0.045)	(0.038)
CUC	0.109***	0.198**	0.288***
	(0.012)	(0.094)	(0.072)
NBFI	0.301***	0.304***	0.408***
	(0.016)	(0.029)	(0.031)
NGO	0.386***	0.405***	0.502***
	(0.028)	(0.030)	(0.017)
Network	0.497***	0.524***	0.645***
	(0.032)	(0.065)	(0.055)
Inflation	0.011***	0.053***	0.064***
	(0.002)	(0.015)	(0.013)
GDP	-0.003	-0.000	0.030***
	(0.004)	(0.005)	(0.004)
SSA	0.072***	0.069***	0.073***
	(0.016)	(0.024)	(0.026)
EAP	0.210***	0.240***	0.281***
	(0.035)	(0.051)	(0.061)
EECA	-0.304***	-0.265***	-0.243***
	(0.032)	(0.052)	(0.065)
MENA	-0.281***	-0.260***	-0.216***
	(0.011)	(0.026)	(0.038)

Table D-14 (Continued)

Variable	Model 39	Model 40	Model 41
Constant	0.713***	-0.020	-0.200
	(0.191)	(0.103)	(0.165)
R-squared	0.538	0.576	0.595
Observation	285.000	235.000	229.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-15

Estimations of the mission drift and inflation rate (dependent variable: GNIALS)

Variable	Model 42	Model 43	Model 44
	b/se	b/se	b/se
OSS	-0.641***		
	(0.213)		
OSS*Inflation	0.003		
	(0.012)		
ROA		-0.293***	
		(0.093)	
ROA*Inflation		-0.457***	
		(0.085)	
PM			-0.182**
			(0.081)
PM*Inflation			-0.135***
			(0.018)
Regulated	0.081	0.509***	0.528***
	(0.060)	(0.092)	(0.118)
lnSize	0.050***	-0.054*	-0.016
	(0.009)	(0.032)	(0.020)
lnMaturity	0.111***	-0.187***	-0.243***
	(0.028)	(0.058)	(0.063)
Bank	0.814***	-0.405***	-0.317*
	(0.079)	(0.150)	(0.167)
CUC	1.172***	-0.372	-0.005
	(0.136)	(0.429)	(0.308)
NBFI	0.282***	-0.853***	-0.843***
	(0.079)	(0.095)	(0.100)
NGO	-0.276	-1.578***	-1.564***
	(0.186)	(0.215)	(0.227)
Network	0.544***	-2.065***	-2.204***
	(0.091)	(0.171)	(0.169)
Inflation	0.209***	0.145	0.156
	(0.073)	(0.127)	(0.113)
GDP	0.281***	0.311***	0.332***
	(0.035)	(0.039)	(0.049)
SSA	-0.344***	-0.155*	-0.266***
	(0.045)	(0.078)	(0.097)
EAP	-0.684***	-2.676***	-2.884***
	(0.097)	(0.287)	(0.244)
EECA	0.166***	-0.040	-0.120***
	(0.042)	(0.046)	(0.021)
MENA	0.224***	-0.046	-0.104
	(0.072)	(0.172)	(0.170)

Table D-15 (Continued)

Variable	Model 42	Model 43	Model 44
Constant	-1.357***	1.647***	1.857***
	(0.440)	(0.211)	(0.231)
R-squared	0.426	0.613	0.574
Observation	265.000	226.000	229.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-16
Estimations of the mission drift and inflation rate (dependent variable: FFB)

Variable	Model 45	Model 46	Model 47
	b/se	b/se	b/se
OSS	0.026		
	(0.093)		
OSS*Inflation	0.037		
	(0.065)		
ROA		0.019	
		(0.012)	
ROA*Inflation		0.088***	
		(0.026)	
PM			0.003
			(0.010)
PM*Inflation			0.016***
			(0.005)
Regulated	-0.205***	-0.212***	-0.223***
	(0.019)	(0.013)	(0.011)
lnSize	-0.009	0.009***	-0.003
	(0.006)	(0.003)	(0.006)
lnMaturity	-0.029***	0.012	0.038**
	(0.005)	(0.019)	(0.016)
Bank	0.138***	0.232***	0.250***
	(0.033)	(0.023)	(0.031)
CUC	0.171***	0.308***	0.268***
	(0.025)	(0.060)	(0.060)
NBFI	0.358***	0.388***	0.404***
	(0.028)	(0.021)	(0.029)
NGO	0.416***	0.466***	0.489***
	(0.046)	(0.006)	(0.013)
Network	0.491***	0.556***	0.602***
	(0.026)	(0.012)	(0.032)
Inflation	0.011***	0.042**	0.047**
	(0.002)	(0.019)	(0.018)
GDP	0.023***	0.034***	0.030***
	(0.003)	(0.004)	(0.003)
SSA	0.050**	0.047	0.060**
	(0.019)	(0.031)	(0.027)
EAP	0.190***	0.230***	0.271***
	(0.048)	(0.072)	(0.063)
EECA	-0.313***	-0.268***	-0.247***
	(0.043)	(0.062)	(0.062)
MENA	-0.258***	-0.241***	-0.230***
	(0.020)	(0.042)	(0.041)

Table D-16 (Continued)

Variable	Model 45	Model 46	Model 47
Constant	0.238	-0.259*	-0.243*
	(0.224)	(0.133)	(0.137)
R-squared	0.547	0.604	0.595
Observation	275.000	226.000	229.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-17

Estimations of the mission drift and GDP growth rate (dependent variable: GNIALS)

Variable	Model 48	Model 49	Model 50
	b/se	b/se	b/se
OSS	-1.635***		
	(0.254)		
OSS*GDP	0.113***		
	(0.014)		
ROA		-0.400***	
		(0.142)	
ROA*GDP		0.084	
		(0.423)	
PM			-0.413***
			(0.123)
PM*GDP			0.195***
			(0.072)
Regulated	0.278***	0.454***	0.402***
	(0.079)	(0.096)	(0.107)
lnSize	0.015***	-0.046	-0.006
	(0.005)	(0.028)	(0.017)
lnMaturity	0.064	-0.197***	-0.257***
	(0.045)	(0.056)	(0.065)
Bank	0.789***	-0.458*	-0.102
	(0.183)	(0.240)	(0.200)
CUC	1.224***	-0.458	0.141
	(0.186)	(0.338)	(0.366)
NBFI	0.057	-0.876***	-0.642***
	(0.188)	(0.204)	(0.154)
NGO	-0.526*	-1.631***	-1.383***
	(0.305)	(0.350)	(0.272)
Network	-1.511***	-2.133***	-2.239***
	(0.138)	(0.103)	(0.082)
Inflation	0.064	0.032	0.013
	(0.046)	(0.111)	(0.101)
GDP	0.053**	0.297***	0.248***
	(0.022)	(0.038)	(0.032)
SSA	-0.383***	-0.264***	-0.348***
	(0.061)	(0.063)	(0.078)
EAP	-2.371***	-2.728***	-2.857***
	(0.116)	(0.274)	(0.253)
EECA	0.267***	-0.066**	-0.097*
	(0.077)	(0.030)	(0.058)
MENA	0.086	-0.130	-0.144
	(0.150)	(0.128)	(0.149)

Table D-17 (Continued)

Variable	Model 48	Model 49	Model 50
Constant	-0.869**	1.406***	1.234***
	(0.433)	(0.398)	(0.447)
R-squared	0.592	0.608	0.573
Observation	265.000	226.000	229.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.

Table D-18

Estimations of the mission drift and GDP growth rate (dependent variable: FFB)

Variable	Model 51	Model 52	Model 53
	b/se	b/se	b/se
OSS	0.150***		
	(0.029)		
OSS*GDP	-0.013***		
	(0.004)		
ROA		0.047***	
		(0.017)	
ROA*GDP		-0.071	
		(0.069)	
PM			0.061***
			(0.010)
PM*GDP			-0.072***
			(0.008)
Regulated	-0.186***	-0.200***	-0.204***
	(0.013)	(0.010)	(0.009)
lnSize	-0.011**	0.007**	-0.004
	(0.005)	(0.003)	(0.006)
lnMaturity	-0.039***	0.014	0.041**
	(0.008)	(0.020)	(0.017)
Bank	0.080***	0.236***	0.202***
	(0.025)	(0.033)	(0.041)
CUC	0.082***	0.318***	0.242***
	(0.024)	(0.068)	(0.075)
NBFI	0.278***	0.387***	0.356***
	(0.019)	(0.026)	(0.036)
NGO	0.344***	0.470***	0.448***
	(0.023)	(0.017)	(0.023)
Network	0.457***	0.575***	0.628***
	(0.021)	(0.018)	(0.040)
Inflation	0.036**	0.065***	0.070***
	(0.014)	(0.016)	(0.015)
GDP	0.059***	0.041***	0.052***
	(0.010)	(0.008)	(0.007)
SSA	0.026	0.069**	0.068**
	(0.035)	(0.031)	(0.026)
EAP	0.160***	0.243***	0.273***
	(0.036)	(0.072)	(0.065)
EECA	-0.331***	-0.263***	-0.247***
	(0.049)	(0.067)	(0.069)
MENA	-0.292***	-0.224***	-0.220***
	(0.036)	(0.040)	(0.042)

Table D-18 (Continued)

Variable	Model 51	Model 52	Model 53
Constant	0.469***	-0.177	-0.103
	(0.120)	(0.141)	(0.146)
R-squared	0.553	0.601	0.601
Observation	265.000	226.000	229.000

Note: Total asset and MFI-age are in natural logarithmic form. Standard Errors are given in the parentheses. Statistically significant where * $p<0.10$; ** $p<0.05$ and *** $p<0.01$.