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**MASTER THESIS**

**INSTITUTIONAL GOVERNANCE OF FINANCIAL  
DEVELOPMENT: THE CASE OF TURKEY**

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# ÖZ

## FINANSAL GELİŞMENİN KURUMSAL YÖNETİŞİMİ: TÜRKİYE ÖRNEĞİ

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Bu çalışma, güçlü ve istikrarlı ekonomik büyüme için temel bir gereklilik olan finansal gelişmenin kurumsal yönetim mekanizması ile uzun dönemli ilişkisinin Türkiye bağlamında test edilmesini amaçlamaktadır. Kullanılacak analitik çerçevenin oluşturulması için yönetim kavramı üç farklı kurumsal yaklaşım perspektifinden analiz edilmiştir. Söz konusu ilişkinin sınanması için finansal gelişme, bankacılık sektörünün ve sermaye piyasalarının gelişimi olarak iki farklı başlıkta incelenmiştir. Çalışmanın ampirik kısmında 1992-2019 yılları arası çeyreklik zaman serisi verileri kullanılarak bu dönem, 1992-2001 ve 2002-2019 şeklinde iki alt periyoda ayrılmıştır. Bankacılık sektörünün ve sermaye piyasalarının gelişiminin Akan tarafından geliştirilen makro finansal ve makro finansal olmayan yönetim değişkenleri ile ilişkisi ARDL Koentegrasyon Yaklaşımı ve Hata Düzeltme Modeli (ECM) yardımı ile her iki alt dönem için test edilmiştir. Ampirik çalışma sonucunda, bankacılık sektörünün gelişimi ile yönetim mekanizmaları arasında her iki dönem için herhangi uzun dönemli bir ilişki tespit edilemezken, sermaye piyasalarının gelişiminin her iki zaman diliminde de makro finansal yönetimden olumsuz etkilendiği gözlemlenmiştir. Diğer yandan, ilk dönemde tespit edilen makro finansal olmayan yönetimin sermaye piyasaları üzerindeki pozitif yönlü etkisi, ikinci dönemde kaybolmuştur.

**Anahtar Kelimeler:** Kurumsal Yaklaşım, Kurumsal Yönetişim, Finansal Gelişme, ARDL Sınır Testi, Hata Düzeltme Modeli

## **ABSTRACT**

### **INSTITUTIONAL GOVERNANCE OF FINANCIAL DEVELOPMENT: THE CASE OF TURKEY**

**BETÜL PİŞKİN**

The purpose of the study is to test the long-term relationship of financial development, which is a key determinant of sustainable economic growth, with the institutional governance mechanism in the case of Turkey. To construct the analytical framework to be used, the governance is discussed from three different institutionalist perspectives. To test the relationship in question, financial development is examined under two different titles as the development of the banking sector and capital markets. In the empirical part of the study, using the quarterly time series data between 1992-2019, this period is divided into two sub-periods as 1992-2001 and 2002-2019. The relationship of the development of the banking sector and capital markets with macro-financial and macro non-financial governance variables, which have been developed by Akan, is tested for both sub-periods with the help of the ARDL Cointegration Approach and Error Correction Model (ECM). As a result of the empirical study, while no long-term relationship is detected between the development of the banking sector and governance mechanisms for both periods, it is observed that the development of capital markets is negatively affected by macro-financial governance in both periods. On the other hand, the positive effect of macro non-financial governance on stock market development, having existed in the first period, has disappeared in the second period.

**Keywords:** Institutionalism, Institutional Governance, Financial Development, ARDL Bounds Test, ECM

## PREFACE

The Turkish economy has experienced several fluctuations and crises since its formation, and the problems that have caused these fluctuations have been solved with temporary solutions. Like this, the general course of the country's economy, with its rises and falls, has been parallel with other developing countries that could not achieve long-term economic growth and development, and Turkey could not put its long-term solution forth. The banking sector has been strengthened through micro-scale regulations after the 2001 Financial Crisis, but the importance of the financial development for sustainable and innovative growth has not been emphasized until 2016 when the government has adopted a developmentalist economic policy. Both in the management of financial and non-financial flows and in policymaking, systemic, coordinative real and financial sectors that will prompt each other could not be formed.

In this study, the importance of systemic and coordinative governance of financial development, in a way that it will achieve pre-determined targets, has been emphasized, and it has been examined historically and empirically whether such governance exists in Turkey.

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## LIST OF TABLES

|                                                                                                                        |           |
|------------------------------------------------------------------------------------------------------------------------|-----------|
| <b>TABLE 1-1: Measures of Financial Stability.....</b>                                                                 | <b>16</b> |
| <b>TABLE 1-2: Measures of Financial Efficiency .....</b>                                                               | <b>18</b> |
| <b>TABLE 1-3: Measures of Financial Depth .....</b>                                                                    | <b>19</b> |
| <b>TABLE 2-1: Key Indicators of Economic Performance as % of GDP in Turkey: 1980-2001</b>                              | <b>28</b> |
| <b>TABLE 2-2: Banking Sector in Turkey: 1980-2001 .....</b>                                                            | <b>30</b> |
| <b>TABLE 2-3: Stock Markets in Turkey: 1989-2001 .....</b>                                                             | <b>31</b> |
| <b>TABLE 2-4: Key Indicators of Economic Performance as % of GDP in Turkey: 2002-2007</b>                              | <b>35</b> |
| <b>TABLE 2-5: Banking Sector Development in Turkey: 2002-2007 .....</b>                                                | <b>36</b> |
| <b>TABLE 2-6: Stock Market Development in Turkey: 2002-2007 .....</b>                                                  | <b>37</b> |
| <b>TABLE 2-7: Key Indicators of Economic Performance as % of GDP in Turkey: 2008-2019</b>                              | <b>39</b> |
| <b>TABLE 2-8: Banking Sector Development in Turkey: 2008-2019 .....</b>                                                | <b>40</b> |
| <b>TABLE 2-9: New Economic Program Forecasts .....</b>                                                                 | <b>44</b> |
| <b>TABLE 2-10: Macroeconomic Development in Turkey: 1960-2017 .....</b>                                                | <b>50</b> |
| <b>TABLE 3-1: Selected Measures for Financial Development, Financial Governance, and Non-Financial Governance.....</b> | <b>63</b> |
| <b>TABLE 3-2: Unit Root Test Results .....</b>                                                                         | <b>67</b> |
| <b>TABLE 3-3: ARDL Bounds Test Results (1) .....</b>                                                                   | <b>68</b> |
| <b>TABLE 3-4: ARDL Bounds Test Results after Dummy .....</b>                                                           | <b>71</b> |
| <b>TABLE 3-5: Estimated Long-Run Coefficients for the ARDL Model.....</b>                                              | <b>73</b> |
| <b>TABLE 3-6: Error Correction Model Results: MDV=F(FGV, NFGV) 1992Q1-2000Q4 .....</b>                                 | <b>74</b> |
| <b>TABLE 3-7: Error Correction Model Results: MDV=F(FGV, NFGV) 2002Q1-2019Q4 .....</b>                                 | <b>75</b> |
| <b>TABLE 3-8: Error Correction Model Results: IDV= F(FGV, NFGV) 2002Q1-2019Q4 .....</b>                                | <b>75</b> |

## LIST OF FIGURES

|                                                                                                                    |    |
|--------------------------------------------------------------------------------------------------------------------|----|
| <b>FIGURE 1-1:</b> Macroeconomic Landscape.....                                                                    | 7  |
| <b>FIGURE 1-2:</b> The Functioning of the Financial System .....                                                   | 11 |
| <b>FIGURE 2-1:</b> Financial Stability and Depth in Turkish Banking Sector: 1960-1980.....                         | 26 |
| <b>FIGURE 2-2:</b> Portfolio Investment, Interbank Overnight and Deposit Interest Rates in Turkey: 1983-2001 ..... | 29 |
| <b>FIGURE 2-3:</b> Central Bank Credits % of GDP .....                                                             | 30 |
| <b>FIGURE 2-4:</b> Capital Adequacy Ratio in Turkey: 1999-2007 .....                                               | 33 |
| <b>FIGURE 2-5:</b> Foreign Direct Investment and Portfolio Investment in Turkey: 2002-2007...                      | 37 |
| <b>FIGURE 2-6:</b> Stock Market Development in Turkey: 2008-2019 .....                                             | 40 |
| <b>FIGURE 2-7:</b> CBRT Overnight Interest Rate.....                                                               | 42 |
| <b>FIGURE 2-8:</b> Real Effective Exchange Rate in Turkey (CPI based): 2007Q1-2019Q4.....                          | 43 |
| <b>FIGURE 2-9:</b> Banking Sector Landscape of Turkey: 2008-2019 .....                                             | 45 |
| <b>FIGURE 2-10:</b> Growth Rates of Developing Countries: 1960-2019.....                                           | 45 |
| <b>FIGURE 2-11:</b> Financial Development Index for Developing Countries: 1980-2018.....                           | 46 |
| <b>FIGURE 3-1:</b> Financial and Non-Financial Governance.....                                                     | 59 |
| <b>FIGURE 3-2:</b> Plots of the CUSUM and CUSUMSQ Stability Tests Statistics.....                                  | 69 |
| <b>FIGURE 3-3:</b> Plots of the CUSUM and CUSUMSQ Stability Tests Statistics After Dummy .....                     | 72 |
| <b>FIGURE 3-4:</b> Representations of Long-Run Relationships Between the Variables for Each Model .....            | 76 |
| <b>FIGURE 3-5:</b> Domestic Private and Public Debt Securities to GDP in Turkey: 1990-2016 .                       | 77 |
| <b>FIGURE 3-6 :</b> Domestic Borrowing Interest Rates and Public Sector Borrowing Requirement: 1989-2017 .....     | 79 |

## LIST OF ABBREVIATIONS

|             |                                                  |
|-------------|--------------------------------------------------|
| <b>BAT</b>  | : Banks Association of Turkey                    |
| <b>BRSA</b> | : Banking Regulation and Supervision Association |
| <b>CBRT</b> | : Central Bank of Republic of Turkey             |
| <b>CMB</b>  | : Capital Markets Broad                          |
| <b>CPI</b>  | : Consumer Price Index                           |
| <b>EU</b>   | : European Union                                 |
| <b>FDI</b>  | : Foreign Direct Investment                      |
| <b>FGV</b>  | : Financial Governance                           |
| <b>GDP</b>  | : Gross Domestic Product                         |
| <b>HI</b>   | : Historical Institutionalism                    |
| <b>IDV</b>  | : Banking Sector Development                     |
| <b>IFI</b>  | : International Financial Institutions           |
| <b>IMF</b>  | : International Monetary Fund                    |
| <b>MDV</b>  | : Market Development                             |
| <b>NFGV</b> | : Non-Financial Governance                       |
| <b>NPL</b>  | : Non-Performing Loans                           |
| <b>RCI</b>  | : Rational Choice Institutionalism               |
| <b>SDIF</b> | : Saving Deposit and Insurance Fund              |
| <b>SME</b>  | : Small and Medium Enterprises                   |
| <b>TSEP</b> | : Transition to Strong Economy Program           |
| <b>USA</b>  | : United States of America                       |

## TABLE OF CONTENTS

|                                   |             |
|-----------------------------------|-------------|
| <b>ÖZ .....</b>                   | <b>ii</b>   |
| <b>ABSTRACT .....</b>             | <b>iii</b>  |
| <b>PREFACE .....</b>              | <b>iv</b>   |
| <b>LIST OF TABLES .....</b>       | <b>v</b>    |
| <b>LIST OF FIGURES .....</b>      | <b>vi</b>   |
| <b>LIST OF ABBREVIATIONS.....</b> | <b>vii</b>  |
| <b>TABLE OF CONTENTS.....</b>     | <b>viii</b> |
| <b>INTRODUCTION.....</b>          | <b>1</b>    |

## CHAPTER ONE

### INSTITUTIONAL GOVERNANCE OF FINANCIAL DEVELOPMENT: THEORETICAL FRAMEWORK

|                                                                                           |           |
|-------------------------------------------------------------------------------------------|-----------|
| <b>1.1. Institutional Governance: A Comparative Analysis .....</b>                        | <b>3</b>  |
| 1.1.1. Macroeconomic Governance.....                                                      | 7         |
| 1.1.2. Financial Governance.....                                                          | 10        |
| <b>1.2. Financial Development .....</b>                                                   | <b>14</b> |
| 1.2.1. Indicators of Financial Development: How to Measure Financial<br>Development?..... | 15        |
| 1.2.1.1. Financial Stability .....                                                        | 15        |
| 1.2.1.2. Financial Efficiency .....                                                       | 17        |
| 1.2.1.3. Financial Depth (Size).....                                                      | 18        |
| 1.2.2. Determinants of Financial Development.....                                         | 20        |
| <b>1.3. Institutional Governance of Financial Development .....</b>                       | <b>21</b> |

## **CHAPTER TWO**

### **INSTITUTIONAL GOVERNANCE OF FINANCIAL DEVELOPMENT IN TURKEY**

|                                                                                               |           |
|-----------------------------------------------------------------------------------------------|-----------|
| <b>2.1. Turkish Financial System .....</b>                                                    | <b>24</b> |
| 2.1.1. Chronological Development of Financial System in Turkey .....                          | 25        |
| 2.1.1.1. 1960 - 1980: The Period of Over-Regulation.....                                      | 25        |
| 2.1.1.2. 1980 - 2001: Financial Liberalization and Crises .....                               | 27        |
| 2.1.1.3. 2002 - 2019: Rise of Regulatory State .....                                          | 32        |
| 2.1.1.3.1. 2001 - 2007: Reconstruction Period.....                                            | 33        |
| 2.1.1.3.2. 2008 - 2019: Macroprudential Policy Regime and Institutional<br>Fragmentation..... | 38        |
| 2.1.2. Regulatory and Supervisory Institutions of Turkish Financial System.....               | 47        |
| <b>2.2. Institutional Governance of Turkish Financial System Development .....</b>            | <b>49</b> |
| 2.2.1. Developments and Regulations .....                                                     | 51        |
| 2.2.2. Organizations .....                                                                    | 53        |

## **CHAPTER THREE**

### **THE RELATIONSHIP BETWEEN INSTITUTIONAL GOVERNANCE AND FINANCIAL DEVELOPMENT IN TURKEY: EMPIRICAL RESULTS**

|                                                                 |           |
|-----------------------------------------------------------------|-----------|
| <b>3.1. Theoretical Basis and Related Literature .....</b>      | <b>57</b> |
| <b>3.2. Econometric Application and Empirical Results .....</b> | <b>61</b> |
| 3.2.1. Data .....                                               | 62        |
| 3.2.2. Methodology .....                                        | 64        |
| 3.2.2.1. Unit Root Tests.....                                   | 66        |
| 3.2.2.2. ARDL Bounds Test and Long Run Coefficients .....       | 68        |
| 3.2.2.3. Error Correction Model .....                           | 74        |
| 3.2.3. Evaluation of Empirical Results.....                     | 76        |
| <b>CONCLUSION.....</b>                                          | <b>82</b> |
| <b>BIBLIOGRAPHY .....</b>                                       | <b>84</b> |

## INTRODUCTION

The nexus between financial development and economic growth has been one of the major subjects which are widely studied in the literature for several years. The importance of financial development for sustainable economic growth and development has directed scholars to explore the determinants of financial development. Institutional governance, which refers to the management of the institutions that mediate between the macroeconomic actors and markets in cooperation in the study, is also hypothesized as one of the significant determinants of financial development. Turkey, whose financial system is mostly based on the banking sector, is a developing country that focuses on to achieve to construct the bonds between financial development and economic development for prompting innovative investments through the funds provided by the financial system. Despite the contemporary efforts to establish such a link between the financial sector and the non-financial sector, the development in both the banking sector and stock markets could not be achieved enough. Turkey, which has applied several regulations and supervision after the 2001 Financial Crisis, has not been able to establish a governance mechanism that will ensure the effective management of the macro-economic flows in the system. Therefore, until now, the financial system could not reach the development level to prompt sustainable economic growth, and the current efforts have been insufficient to prevent institutional fragmentation and a long-term recession. In this study, we will investigate the relationship between financial development and macro-financial and non-financial governance in Turkey between the years 1992-2019.

In this regard, the first chapter will draw the theoretical framework. Institutional governance, macroeconomic, and financial governance will be analyzed comparatively from the perspectives of Historical Institutionalism, New Institutionalism, and Rational Choice Institutionalism. Following the examination of the financial development notion with respect to its indicators of efficiency, stability, and depth, the concept of institutional governance of financial development will be explored at the end of the chapter.

Having drawn the theoretical framework, the historical development of the Turkish Financial System will be examined in the second chapter. The historical analysis will be realized under three subperiods: 1960-1980, 1980- 2001, and 2002-2019. At the end of the

chapter, governance of the Turkish Financial System will be investigated under the lights of development plans, established organizations, and strategic plans.

The last chapter will present an empirical study that investigates the relationship between financial development and macro-financial and non-financial governance for Turkey between the years 1992-2019. The analysis of the cited relationship will be carried out by comparing two sub-periods, which are 1992-2001 and 2002-2019, and by establishing two separate models for the banking sector and stock market developments. The study will employ the ARDL Bounds Test to determine cointegration among the variables of each model, and the ECM for verifying the robustness of the cointegrating vectors. The last chapter will be concluded with the evaluation of the empirical results.



## **CHAPTER ONE**

### **INSTITUTIONAL GOVERNANCE OF FINANCIAL DEVELOPMENT: THEORETICAL FRAMEWORK**

In this chapter, the theoretical framework of the study will be drawn. With this purpose, there will be definitions and explanations of terms, which are institutional governance, macro and financial governance, financial development, and institutional governance of financial development. Firstly, the institutional governance will be defined and examined in two titles which are macroeconomic governance and financial governance. Following the financial development, its indicators and determinants, at the end of the chapter, the overall framework of institutional governance of financial development will be examined.

#### **1.1. Institutional Governance: A Comparative Analysis**

It is a rising phenomenon that institutional governance is an essential determinant of economic performance. Several empirical and theoretical studies investigate the effect of institutional governance on economic success and accept that there is a strong correlation between them. Even though the term institutional governance has been popular in the literature since "Sub-Saharan Africa: From Crisis to Sustainable Growth" was published in 1989 by the World Bank, its development has a long history. Thus, institutional governance cannot be understood without studying the history of the development of the term. To evaluate the development process of governance, we should analyze different institutional approaches, which are the origins of the term of governance. There is broad diversity within and across disciplines in what kinds of rules and relationships are construed as "institutions" (March & Olsen, 2006). In this context, first, we will investigate the approaches of Historical Institutionalism, New Institutionalism, and Rational Choice Institutionalism to the institutions, and then we will reach a deep understanding of institutional governance. After analyzing institutional basics of governance, we will examine macroeconomic governance and financial governance from the perspectives of three approaches we have ordered above.

Firstly, Historical Institutionalism which has appeared as a criticism of the New Classical Approach (Caballero & Soto-Oñate, 2015) highlights the importance of institutions in the economic and political process and, even though they agree with New Classical Thought in there is a conflict for scarce among groups or individuals in politics; they have looked for more to explain what lies on the center of politics (Schmidt, 2012). They do not accept the equilibrium assumption either; instead, they stress the significance of the process, which is shaped in the institutional environment. The modern economy is not a market economy since it is not automatic, and it is subject to human willpower working through collective action rather than the natural laws of supply and demand (Dugger, 1988). They have rejected the idea that the same operations will result in the same consequents everywhere and every time and presented the concept of "path dependence" or "historical contingency" as social causation (Thelen & Steinmo, 1992). In this sense, they see institutions as persistent and central factors in the historical framework and try to understand and explain institutions according to this path dependency. They conceptualize the institutions as external actors in the political-economic process by restricting them with historical path or path dependency (Hall & Taylor, 1996; Schmidt, 2012). Thus, like other institutionalist approaches, they have seen the institutions as solutions for collective action problems, which are particularly important in understanding political outcomes (Thelen, 1999).

Historical Institutionalism defines institutions as the formal or informal procedures, routines, rules, and collective notions interred in the organizational structure of the political economy of which they are the external actors (Hall & Taylor, 1996). Such actors are not individuals, but rather they are the corporate actors like unions, business, bureaucracy, and politicians (Schmidt, 2012). Individualism is not involved in the Historical Institutionalism. Organizations, having been accepted as an institution in Historical Institutionalism, are seen as determining actors in the decision-making processes political rules, institutional reorganizations, distribution of politico-economic welfare (Akan, 2019). On the other hand, as well as they do not reject the rationality of human beings, they believe that people do not behave all the time rationally so, it is not possible to understand and explain what is going on in the markets and overall political economy without considering other elements that determine the system: the institutions (Steinmo, 2001). There are uncertainty and lack of information, and the markets do not work automatically, so there is a need for economic planning to ensure efficiency in the overall economy (Dugger, 1988).

In summary, Historical Institutionalism sees institutions as persistent, external, and path-dependent actors of the political and economic system and accepts them as one of the main factors that determine the political and economic behavior and a solution to the collective action problem. They do not accept the invisible hand theory, and they insist on the need for organization and regulation of the economy.

Even though New Institutionalism is interested in the role of institutions in the political and economic processes like its counterpart, they differ in several points. Firstly, individualism, which was not employed in Historical Institutionalism, has great importance in New Institutionalism, which interprets the political and economic processes concerning the goals, plans, and actions of individuals (Klein, 1998). Secondly, unlike the Historical Institutionalism, New Institutionalism tends to accept invisible hand processes and attempt to generate arguments that are not based on intentionality (Rutherford, 1994, p. 126). They are in favor of a minimal state. Despite the disposition of the New Institutionalists to believe price mechanism's and individual choices' determining role in the economy like New Classical Economics, New Institutional Economists note that the transactions occurring in the market are not costless due to the lack and asymmetry of information, which creates inefficiency in the economy (North, 1990, p. 108; Kama, 2011). They interpret the price mechanism, perfect knowledge and rationality in a more elastic way than the New Classics. The imperfectness in the markets causes transaction costs, and this results in inefficiency like it was assumed by Historical Institutionalism. According to New Institutionalists, if there are not any transaction costs, it does not matter whether the operations are proceeded by price mechanism or within firms (Teraji, 2018). Because economic agents are looking for efficient ways to organize their operations, their main problem is to select the appropriate structure to govern the transactions (Gonzalez-Diaz & Vasques, 2008). Finally, New Institutionalism makes a separation between organizations and institutions. Instead of handling organizations as institutions, they accepted organizations as the players of the game whose rules are determined by the institutions (Chavance, 2009).

In this context, the New Institutional Approach accepts institutions as a legal environment in which the political, social, and economic decisions are taken. They do not believe that the markets operate perfectly because the operations create transaction costs, and the information is also costly. Thus, the institutions are seen as the components that fill the gaps creating inefficiency in the political and economic decision-making process.

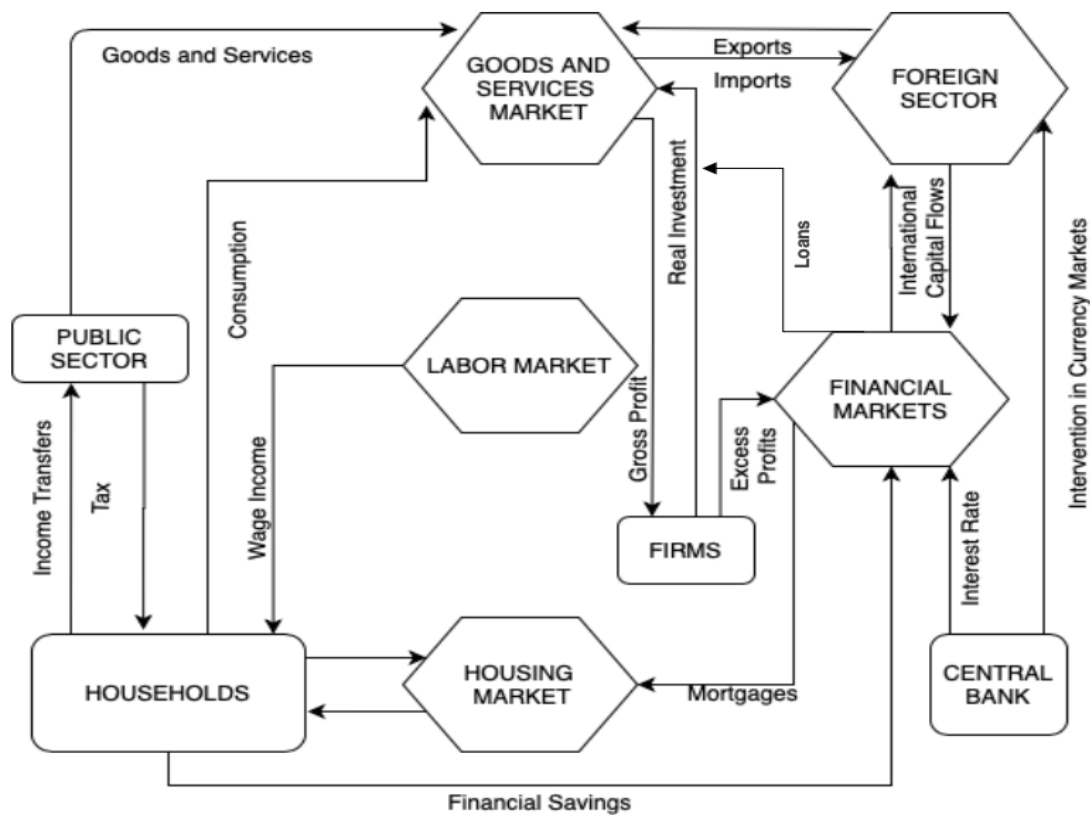
When it comes to Rational Choice Institutionalism (RCI), which is a different interpretation of New Institutionalism, it is seen that RCI shares some of its central assumptions with New Classical School like New Institutionalism did. Some of these assumptions are the equilibrium, rationality of individuals whose aim is to maximize their utility, and minimal state. It differs from the Historical Institutionalism with respect to its individualistic and positivistic approach, its assumption that preferences are granted, its acceptance of equilibrium assumption, and its view of institutions as coordinating systems that sustain this equilibrium (Krehbiel & Diermeier, 2004; Thelen, 1999). Even though RCI scholars' primary focus is on rationality and utility maximization, they have admitted that institutions matter (Schmidt, 2012). They bring the transaction cost theory, principal-agent theory, and game theory together with the new classical assumptions which are the rationality of individuals, equilibria of the markets, and utility maximization theory (Campbell & Pedersen, 2001). Differently from the New Classical Economics, the equilibrium assumed in the Rational Choice Institutionalism is not an efficient equilibrium; actually, they look for the reasons why the rational agents often generate inefficient collective outcomes (Thelen, 1999), and they design the institutions as a means of generating jointly desirable outcomes that will get over the deficiencies in the market (Peters, 1999). The rationality of the agents is bounded as a result of uncertainty and transaction costs, which creates inefficiency in the markets. They suppose that individuals have fixed desires and behave rationally to maximize their preferences (Friel, 2017), and institutions, which are a set of rules and incentives that provide the conditions for limited rationality, are simply equilibrium ways of doing things (Peters, 1999; Shepsle, 2006). Finally, the RCI approaches to the state as a rule-maker, which should prepare the proper environment in which the property rights of the agents are guaranteed, and the transaction costs are decreased. The state has the power to affect the efficiency in the markets because it has the ability to alter the context and structure of property rights and provide information (Eggertsson, 1990).

In summary, Rational Choice Institutionalism, which consists of the assumptions of New Classicalism and New Institutionalism, assumes that the individuals are rational, and they maximize their utilities, but there are transaction and information costs that prevent their utility maximization and efficiency in the market. The institutions, having been set of rules that provide opportunities for bounded rationality, are the equilibrium ways of achieving somethings, and they provide the needed legal environment in which the property rights of the economic agents are protected, and the incentives are given to them to achieve their utility maximization.

### 1.1.1. Macroeconomic Governance

The macroeconomic system consists of a few macro-markets, macro-actors, and institutions. The markets, few of those are goods and services, capital, labor, and housing markets, are the arenas for purchase and sale in which individual activities are linked by pricing conditions of supply and demand (Zysman, 1983, p. 17). The transactions in the markets are carried out by the actors who are basically the state, the central bank, households, the foreign sector, and firms. As well as the behavior of macroeconomic actors affects the market price, and the traded volume on the market, the behavior of the actors is influenced too by how the rest of the system is constructed and organized. Finally, the macro-markets are connected by the casual relations and macroeconomic activities of the actors, as shown in Figure 1-1 (Jespersen, 2009, pp. 98, 104). The activities, having been shown with arrows in Figure 1-1, which mediate the relationship among governments, private actors, and domestic and global actors, are single institutions that correlate the markets and actors of the system to each other (Akan, 2018).

**FIGURE 1-1: Macroeconomic Landscape**



Source: Jespersen, **Macroeconomic Methodology A Post-Keynesian Perspective**, Cheltenham, Edward Elgar, 2009..

For instance, consumption is an institution that mediates the interaction between households and the goods and services market, while credits are an institution that mediates the relationship between financial investors and firms.

In this context, governance of the macroeconomic system refers to the institutionalized interaction between interdependent public and private actors for regulating or supervising a specific part or all of a macroeconomic process under the guidance of predetermined rules and procedures (Akan, 2018). The governance of the macroeconomic system is the management of these institutions in coordination among the private, public, domestic, and international actors.

The question of how the macroeconomic system should be governed is answered differently by the above-introduced schools. Firstly, the Historical Institutional School, having rejected the idea that the markets work automatically, notes that government intervention is needed in the governance of the system because industrialized societies cause power concentration, rising uncertainty, performance failures, uncompensated costs, and unfavorable distributional effects (Trebing, 1988). According to the Historical Institutionalists, economic planning and corporate management are ways to decrease the uncertainty and instability of the markets (Dugger, 1988). The existing structure of the markets leads inequities in the distribution of income and economic opportunity (Rutherford, 1994), and in this framework, according to Ayres who is one of the principal members of the school, the savings which are the main component of the innovation and production in the economy depends on the inequality rather than the consumption preferences. This dependency does not prompt economic growth; instead, it creates instability in the macroeconomic system. What should be done to eliminate inefficiencies in the system is decreasing inequality in the distribution of income and regulating the system with proper reforms that promote a higher level of efficiency (Peach, 1988; Dugger, 1988). Thus, macroeconomic governance in the Historical Institutionalism refers to the coordinative management and supervision of the markets and the intermediaries which establish their relations with actors by ensuring equity in income distribution, which is the primary condition for eliminating inefficiencies in the markets and sustaining economic growth.

On the other hand, New Institutionalists and Rational Choice Institutionalists, having tended to look positively on markets' resource allocation role, and to be much more critical of the failures of government, do not consider the government as a regulatory actor who should intervene in the markets (Rutherford, 1994, p. 163). Even though they accept that the resource

allocation is automatically realized by the demand-supply mechanism in the markets, they both accept that operations in the markets create inefficiencies.

According to the New Institutional Economics, the inefficiencies are caused by the transaction costs, information costs, and constraints of property rights (Williamson, 1994), and this inefficiency can be reduced or raised by institutions that are associated with the legal framework in which economic activity is operated. Governments who are given the ability to define property rights (Toye, 1995), offered within the New Institutional Economics as tending to misallocate resources and create laws, property rights, and regulations that cause the cost to society (Rutherford, 1994). They note that the states do not maximize welfare because politicians tend to maximize their own preferences, which do not have to be consistent with national development goals (Coase, 1992; Carrigan & Coglianese, 2011). The tendency of the policymakers to follow their utility maximization may result in a situation where the state may be the source of uncertainty (Williamson, 1994). In a macroeconomic system where transaction and information costs create inefficiency in the markets and deficiencies in the welfare of the nation, New Institutionalists assume that the quality of property rights, having been guaranteed by the rule of law and democracy, has an important effect on economic growth (Oppen, 2008). The only thing that governments should do is establishing legal ground that the allocation of resources will be realized by the demand-supply preferences of the actors whose rights are protected by law in the markets. Thus, according to the new institutionalist interpretation of the macroeconomic system functioning, the state is not involved in the price determinism and resource allocation process. Instead, the markets should be left to themselves to function efficiently by creating a framework in which the possible transaction costs are eliminated by the sturdy institutional structure, which will stimulate national growth.

Similarly, Rational Choice Institutionalism assumes that the rationality of the individuals is bounded, which creates transaction costs in the markets. Thus, in the macroeconomic system in which markets are considered as the allocator of the resources, institutions are conceptualized as a collection of rules that set up 'political space' within which many interdependent political actors can operate (Peters, 1999). In this political space, the main concern of the Rational Choice Institutionalists like New Institutionalists is how to restrain government power in the economic and political determination process (Rutherford, 1994, p. 130). RCI supposes that the actors have fixed choices and behave rationally to maximize their choices and that institutions are the elements that incent the actions of the actors and decrease the uncertainties (Friel, 2017).

In this framework, the macroeconomic system works through the automatic functioning of the markets in which the rational actors try to maximize their utilities, and the inefficiencies which are caused by the transaction costs can be reduced by the institutions which are associated with the rule of law, democracy, protection of property rights and credibility of the government policies (Peters, 1999; Persson & Tabellini, 2000; Acemoglu & Robinson, 2008). The state has a fundamental role in determining the economy to catch long-term development and growth or stagnation through its power to determine these institutions (Eggertsson, 1990). On the other hand, the direct involvement of the state in economic activity is seen as an important reason for additional transaction costs and inefficiency in the macroeconomic system. It is seen that the main concern of the Rational Choice Institutionalists is the establishment of efficiency in the markets. In epitome, RCI notes that resource allocation and economic activity are operated by the rational actors in markets in the macroeconomic system, and institutional governance of the macroeconomic system is associated with the security of property rights, which will be ensured through the rule of law, democracy, and credibility.

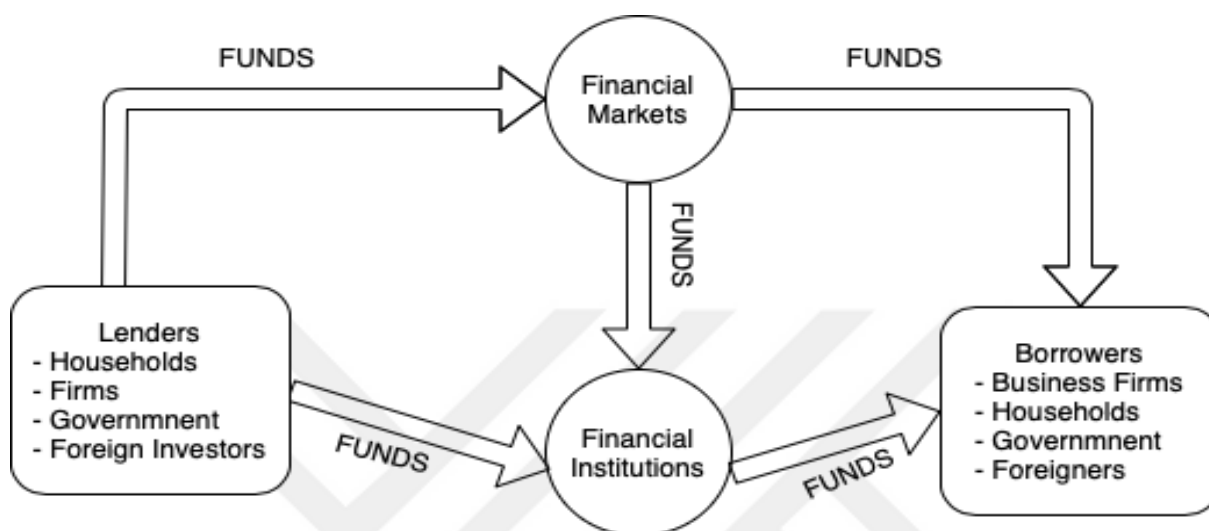
### **1.1.2. Financial Governance**

The financial system is a fundamental component of the overall economic activity with its functions of transforming the funds from lenders to borrowers, creating liquidity, and providing a payment mechanism. It consists of various markets, individuals, and institutions whose regulation is the responsibility of the supervisory institutions (Howells & Bain, 2007). A financial system can shape the domestic economy by promoting or constraining economic growth (Neave, 1991). In this manner, the economic growth and development and financial system are strongly interrelated, and they have a mutual affecting mechanism. The developed financial system is indispensable for sustainable growth and development in a country since the investors, which will produce technological and innovative values for the economy, need to be financed by a well-functioning financial system. When the system works well, it transfers funds from the ones who have saved money to the individuals, firms, and governments with investment plans that will contribute to the productivity of the economy. Otherwise, investors have trouble financing their plans, and economic growth slows down (Mankiw & Ball, 2010).

A well-functioning financial system -beyond other functions- should transfer the funds which are directed from the savers to the buyers who will use them to produce more. A financial system that is not developed enough is more likely to transfer funds, specific buyers, which will be resulted in inefficient resource allocation (Neave, 1991). In the case that the financial system

can direct the funds to the borrowers efficiently, the system will encourage the innovation and development of technology investment, which is the necessary condition for sustainable economic growth in modern times.

**FIGURE 1-2:** The Functioning of the Financial System



Source: Mishkin & Eakins, **Financial Markets and Institutions**, Vivar, Pearson Education, 2018.

The financial system which has markets, actors, and institutions like the macroeconomic system is a sub-system of the overall macroeconomic system, and the elements which mediate the relationship among the financial actors are also institutions. The funds, having been seen with arrows in Figure 1-2, are the institutions which sustain the flow of the system between actors and markets. The governance of the financial system, which is vital for the continuity of the real economic activity, then, refers to the management of the flow of funds and the process of transferring these funds to the actors who will use the funds to produce in the real sector.

According to the Historical Institutionalists, the economy is the system of power whose sources are the technology and technological change (Petr, 1988), and the money is an essential tool for accessing to this technological process. They believe that any breakdown in the flow of funds obstructs the full use of the technological process, while any improvement makes the technological process more utilized and broadened (Hamilton, 1988). In this manner, it is crucial that the financial system works efficiently. Historical Institutionalists, having accepted the existence of government intervention in the economy, believe that the flow of financial capital through the system can be controlled more efficiently by corporate activity and planned strategy rather than supply and demand working through the capital market. Corporate activity is important in the financial system governance because the financial markets are suffering from

a lack of information and uncertainty, and these will be eliminated by the collective action (Dugger, 1988). At this point, they see public institutions, such as the public utility and regulatory agencies, as tools to attain a fair allocation of risks (Stevenson, 1988). They stress the importance of the financial systems' development for the overall economic development and note that institutional complementarities among the industrial policy, financial systems, and corporate strategy create increasing returns to economic growth (Deeg & Posner, 2016). They accept the significance of the monetary policy and state that the primary role of monetary policy must be providing the economy with the purchasing capacity required by a full-employment fiscal policy (Peterson, 1988). Management of money and financial system should be conceived in accordance with some collective rules and regulations in order to prevent systemic tragedies (Minsky H, 2016). As it is seen, the emphasis of the Historical Institutional is on the complementarities across all common policies of the state and the significance of the financial system as a means of providing funds for sustainable technological processes. Thus, from the Historical Institutional perspective, the governance of the financial system refers to the management of the financial system by collective action and strategy, including public intervention, in a way that the development of the system will prompt economic growth and provide technological advances in the economy.

On the other hand, New Institutionalism and Rational Choice Institutionalism, having shared the non-interventionist nature, attempt to integrate institutions into the neo-classical structure, and accept collective property rights as institutions (Zattler, 1998). Automatic mechanisms that will achieve what those with authority are incapable or reluctant to do by themselves exist (Hart, 1995, p. 10). However, these automatic mechanisms cannot prevent the uncertainties and transaction costs in the financial markets and what will reduce these inefficiencies by providing a dependable and efficient framework for economic and financial exchange is the institutions (North, 1989). As stated before, they associate institutions with legal structures which affect even shape economic behavior. New Institutionalists argue that in countries where private property rights are enforced, private contractual arrangements are supported, and investors' legal rights are protected by legal structure, financial markets are more likely to thrive, and savers are more willing to invest in firms (Beck & Levine, 2005). They advocate that low levels of development are caused by ineffective legal systems, low levels of confidence, and other institutional challenges (Levine, 2009). Low levels of confidence results in low investment and the liquidity drain from the financial markets (Fadda & Tridico, 2014) which lead underdevelopment in the financial system. They accept that the institutions affect financial policy mainly through the government budgeting policies and the degree of independence and

accountability of the central bank (Fernández & Tamayo, 2017). Central Bank independence is seen as an important determinant of financial development. Similarly, Rational Choice Institutionalists who stress the significance of property rights and contract enforcement, argue that the regulation should aim to prevent monopoly or cartel formation to sustain equality and should allow the groups to break the barriers to entry (Lowndes & Roberts, 2013, p. 91). On the other hand, according to them, there should be active constraints on politicians and powerful groups to prevent greater gains resulting from power, and imperfect contractual arrangements (Acemoglu, Johnson, Robinson, & Thaicharoen, 2003). In summary, both of the approaches focus on the formal institutions which have a determining effect on financial development, and the financial governance is interpreted with respect to the independence of Central Banks, protection of property rights, the rule of law, openness in the market, limitation of political authorities and monopolies.

After the Global Financial Crisis, having shown the seriousness of weakness resulted by the institutional crisis that is caused by the interaction between financial organizations and both formal and informal institutions in the financial system at both national and international levels, governance of the global financial system and domestic financial systems have become a major concern (Riaz, 2009). Good governance which was put forward by UN in 1989 and defined as a transparent and accountable management model in which the power and responsibilities are shared with NGOs and local authorities and, rehabilitation of institutions and the managing concept which involves the cooperation and interaction come into prominence, has come to agenda again as a co-product of New Classical Economics, Rational Choice Institutionalism and New Institutionalism (World Bank, 1989). In the context of the good governance and the Global Financial Crisis, the “good financial governance has been defined as “a transparent, legitimate and development-oriented state action in the area of public finance on both the revenue and the expenditure side to be able to carry out the desired financial and economic development.” by the German Federal Ministry for Economic Cooperation and Development (BMZ, 2014). According to this interpretation of financial governance, transparency and accountability are crucial for the governance of the financial system because one of the biggest problems in the financial markets is uncertainty.

## **1.2. Financial Development**

Financial systems that are accepted as one of the critical components of countries' economic growth and economic development have different essential functions in the economic system and affect the economy negatively or positively through these functions. Some of these functions can be ordered as allocation of resources, mobilization of savings, pooling risk, facilitation of trading, and exchange of goods and services. (Levine, 1996). The ability of a financial system to achieve these functions depends on its development level. It means that as the financial system gets developed, it will be able to mobilize the savings better, allocate the resources more efficiently, and to decrease the uncertainty. In this context, it is broadly discussed in the literature that there is a strong positive relationship between the development of financial systems and economic growth. Also, there are many different studies that empirically and theoretically proved that the countries which have developed financial systems that are efficient, deep, and stable are growing faster than the countries with underdeveloped financial markets. For example, Gallego and Loayza (2001) have noted that in a well-developed financial system, economic agents are enabled to smooth their consumption behaviors over time and the developed financial system encourages social welfare and economic growth by preserving consumers from temporary income shocks and uncertainty. After explaining the functions of the financial systems, Levine (1996), states that as the countries get more productive and innovative, depth of their financial system, which is an essential indicator of financial development, gets higher. On the other hand, De Gregorio and Guidotti (1995) empirically proved that financial development is one of the most critical determinants of economic growth in their study. They found that financial development measurements are positively correlated with economic growth, and this correlation can change across countries.

In the environment where it is accepted that financial development is a significant determinant of growth, financial development, which is generally defined as the improvements in all financial institutions, financial markets, and financial instruments, has gained importance day by day. According to the Report of World Economic Forum, measures of financial development are financial depth, access to the financial system, and the efficiency and stability of a financial system in which there are financial markets, intermediaries, assets, institutions, and regulations (World Economic Forum, 2012). It means that a country's financial development will be measured with its financial stability, efficiency, and depth, which are called as the indicators of financial development. Another broadly discussed point about financial development is the elements determining its level. There are several studies which

investigate the determinants of financial development and put forward different kind of factors which affect the level of development in the financial system (Law & Habibullah, 2009; Voghouei, Azali, & Jamali, 2011; Law & Habibullah, 2009). For instance, according to Cihák et al. (2012) financial development is determined by the liberalization of financial instruments, markets, and institutions, the effect of imperfect knowledge, limited regulation, and transaction costs. According to these studies, the most accepted determinants of financial development are institutions, policy, business environment, and liberalization.

In this subsection, firstly, we will examine the indicators of financial development. After the examination of the indicators, the section will proceed to discuss the determinants of financial development in the light of literature.

### **1.2.1. Indicators of Financial Development: How to Measure Financial Development?**

As it is stated before, financial development, which shows the improvements in all parts of the financial system, is defined as a combination of depth, efficiency, and stability in the financial system. In this part of the study, these indicators of financial development will be investigated.

#### **1.2.1.1. Financial Stability**

One of the most critical signs of financial development is financial stability that implies the strength of the financial system, which gives the system the ability to be resistant against the fluctuations in the economy (MNB, 2020). When it is defined narrowly, financial stability is the absence of crises, extreme volatility, and stress in a financial system (Gadanecz & Jayaram, 2008). It is linked with the success of financial markets and institutions that do not fail and do not cause an economic breakdown (Creel, Hubert, & Labondance, 2015). When it is defined extensively by taking account of the role of financial development on the overall economy, financial stability is a situation in which the financial system can fulfill its regular duties which are the intermediation of financial funds, management of risks and the arrangement of payments and can withstand the shocks and resolve imbalances. The financial system is in a state of equilibrium as it dispels financial imbalances that occur endogenously or as a result of adverse and unexpected significant events (World Bank, 2015). Therefore, financial stability is an essential indicator of financial development, reduces the possibility of

deterioration in the financial intermediation process, which is an integral part of the allocation of savings to innovative and profitable investments (Gadanecz & Jayaram, 2008).

When it comes to the measures of financial stability, it is possible to argue that there is not an individual measure of financial stability yet. In the literature, several indicators are used to determine the relationship of financial stability with other variables. The first of these indicators, whose some part has been represented in Table 1-1, is the Bank's Z score, which is used in analyzing stability at firm level. To assess a bank's solvency risk, it specifically compares reserves (capitalization and returns) with risk (return volatility).

A higher Z-score indicates a lower bankrupt risk of the firm. Z score checks the market capitalization and returns against the volatility of returns. Another widely used measurement is credit to deposit ratio, which is used in the determination of the ability of the banking sector to satisfy credits by the deposits. As it increases, financial stability is expected to increase too. Finally, for market-focused analysis, the most used indicator in the literature is stock market volatility. It shows the rate of uncertainty in the financial markets. It is used to determine the risk rates of the securities and as the volatility rises, the riskiness of the security increases, too (Čihák, Demirgüç-Kunt, Feyen, & Levine, 2012).

**TABLE 1-1:** Measures of Financial Stability

|                                        |                                    |
|----------------------------------------|------------------------------------|
| Financial<br>Institutions<br>Stability | Banking Sector Z score             |
|                                        | Bank Credit to Bank Deposit(%)     |
|                                        | Credit to Assets (%)               |
|                                        | Capital Adequacy Ratios            |
|                                        | Liquidity Ratios                   |
| Financial<br>Market<br>Stability       | Stock Market Volatility            |
|                                        | Price to Earning Ratio             |
|                                        | Duration                           |
|                                        | Short-term bonds to Total Bonds(%) |

Source: Čihák et al. 2012, World Bank 2020

In summary, financial stability is an essential indicator of financial development. It represents the robustness and success of the financial markets, institutions, and intermediation process. It has a mutual and positive relationship with real economic variables, such as

economic growth and development. While instability in the financial system can cause severe economic crises, the negative or positive real shocks also can induce instability in the financial system. Thus, stability in the financial system is essential for confidence to a country's financial sector and the overall economy and, it is mostly measured with the variables such as Bank's Z score, credit to deposit ratio, and volatility.

#### **1.2.1.2. Financial Efficiency**

Another significant component of financial development is financial efficiency. Financial efficiency represents the ability of the financial institutions and markets to ensure financial services with low costs and sustainable revenues. Efficient financial systems mediate the transformation of resources into capital at a minimum price. With the concept of maximum income with minimum cost, financial efficiency is mostly accepted as an essential indicator of financial development in the literature. For example, Blejer (2006) has noted that financial efficiency is also significant for stability of the financial system, and policy authorities, wishing to sustain the balance of the system, should consider efficiency as a prompting element for stability. Thus, as the efficiency in the financial system gets higher, the resources will be transformed to productive investments with minimum price and the higher efficiency in the system will guarantee the stability of the system, and the development will realize in a higher degree.

Financial systems are accepted as efficient if they allow getting high revenues without enormous transaction costs. When transaction costs are minimized with the efficient collection and allocation of wealth, entrepreneurship, and innovation will increase, and the sustainable growth will occur in the economy (Cihák, Demirgüç-Kunt, Feyen, & Levine, 2012). When it comes to the measurements of financial efficiency, it can be said that the commonly used indicators are net interest margin and turnover ratio. The net interest margin shows the ratio of the difference between interest incomes and expenses and average earning assets of a financial institution-usually of banks- to determine how profitable the investment decisions of financial institutions. If it is negative, it means that the institution has an adverse interest profit. According to the World Bank's definition, as a percentage of its average interest-bearing (total earnings) assets, it is the accounting value of the bank's net interest income.

So, it is understood that as the net interest margin rises, the efficiency of a financial institution increases too. On the other hand, the efficiency of the financial markets such as bond

markets and stock markets is measured by indicators such as turnover ratio, the tightness of the bid-ask spread, and others shown in Table 1-2. The turnover ratio shows the relationship between the funds of the institutions and the income they earn from these funds. It is used to check whether the financial funds in a stock market are used in profitable investments. The higher rates of the turnover ratio are associated with higher efficiency in the stock market.

**TABLE 1-2: Measures of Financial Efficiency**

| Financial Institutions Efficiency                                                                                                                                                                                                                                                                                       |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <ul style="list-style-type: none"> <li>• Net Interest Margin</li> <li>• Lending Deposits Spread</li> <li>• Overhead Costs ( % of GDP)</li> <li>• Non-interest Income to Total Income</li> <li>• Credit to Government and State Owned Enterprises to GDP (%)</li> <li>• Bank return on assets (% , after tax)</li> </ul> |
| Financial Markets Efficiency                                                                                                                                                                                                                                                                                            |
| <ul style="list-style-type: none"> <li>• Turnover Ratio</li> <li>• Liquidity/Transaction Costs</li> <li>• Turnover of Bond</li> <li>• Price Impact</li> </ul>                                                                                                                                                           |

Source: World Bank 2020, Čihák et al. 2012

Besides, the indicators which are collected by Čihák et al. (2012) are presented in Table 1-2, Demirgüç-Kunt and Levine (2001; 196) have stated that financial efficiency is the logarithm of the ratio of the value traded and overhead costs.

In summary, financial efficiency, which is generally measured with net interest margin and turnover ratio and shows how sufficient financial funds or savings are used, is critical for both financial stability and financial development. In basic economic terms, it implies whether the savings in a country are turning to productive investments and innovations or not and the degree of this proportion.

### **1.2.1.3. Financial Depth (Size)**

Financial depth represents the amount of financial wealth relative to the economy, and it is a significant indicator of financial development. Many different studies imply the positive relationship of financial depth with financial development and economic growth (Trew, 2008; Christopoulou & Tsionas, 2004; Čihák, Demirgüç-Kunt, Feyen, & Levine, 2012). The term

is defined by World Bank (2016) as the size of all financial institutions' and financial markets' assets in a country relative to a measure of economic output. It is the most used indicator of financial development. The effect of financial depth on economic growth and development was investigated several times. For example, Christopoulou and Tsionas (2001) has demonstrated that there is a positive long-run relationship between financial deepening and economic growth. On the other hand, Čihák et al. (2012) have demonstrated that the higher the financial depth is the lower the Gini coefficient, which implies that income inequality declines.

There are various indicators of financial depth, some of them, which are collected by Čihák et al. from several studies, are shown in Table 1-3. The most comprehensive indicator is the private credit by deposit money banks to GDP(%), which measures the domestic private credit to real sector by deposit money banks as percentage of local currency (World Bank, 2020). Some of the other most used indicators can be ordered as Stock Market Capitalization to GDP, M2 to GDP, and Deposits to GDP.

**TABLE 1-3: Measures of Financial Depth**

| Financial Institutions Depth                                                                                                                                                                                                                                                                                                                                             |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <ul style="list-style-type: none"> <li>• Private Sector Credit to GDP (%)</li> <li>• Assets to GDP (%)</li> <li>• M2 to GDP (%)</li> <li>• Deposits to GDP</li> <li>• Private Credit by Deposit Money Banks to GDP (%)</li> <li>• Central Bank Assets to GDP (%)</li> <li>• Private Credit by Deposit Money Banks and Other Financial Institutions to GDP (%)</li> </ul> |
| Financial Markets Depth                                                                                                                                                                                                                                                                                                                                                  |
| <ul style="list-style-type: none"> <li>- Stock Market Capitalization to GDP(%)</li> <li>- Stocks Traded to GDP(%)</li> <li>- Public Debt Securities to GDP (%)</li> <li>- Private Debt Securities to GDP (%)</li> <li>- International Debt Securities to GDP (%)</li> <li>- Stock Market Total Value Traded to GDP (%)</li> </ul>                                        |

Source: World Bank 2020, Čihák et al. 2012

Another critical feature of financial depth is that it makes it possible to determine whether the financial system is market-based or bank-based. It is possible to reach the financial structure ratio that shows the structure of the financial system by computing the ratio between size indicators for banks and financial markets.

Hence, financial depth is the size of financial markets and institutions' assets to GDP, and it is a significant indicator of financial development with its positive long-run relationship with economic growth. It is mostly measured with Private Sector Credit to GDP and Stock Market Capitalization to GDP.

### **1.2.2. Determinants of Financial Development**

Another important point about financial development is which factors which affect it and how the relationship between these factors and financial development work. While the indicators of financial development show us the level of development, determinants demonstrate the factors which decrease or increase it. Thus, in this subtitle, we will investigate what determines the level of financial development.

The first determinant that will be examined in the study is institutions, which are the widely studied determinant of financial development. Institutions have gained significance, especially after the Global Financial Crisis of 2008. The crisis has uncovered the need for regulation in the institutional environment of the financial system because institutions relate the financial success with the overall economic achievement, and they have a vital role in the determination of the process of economic growth by financial development (Arestis & Demetriades, 1997; World Economic Forum, 2012). Institutions refer to the legal, regulatory, and supervisory environment in which the development process is shaped. It includes regulations, laws, rules, and regulatory and supervisory organizations. The protection of property rights, healing of accounting practices, and contract enforcement are accepted significant institutional determinants of financial development (Huang, 2010, p. 3). These factors show the quality of the institutional framework and have an appealing role in the allocation of resources and the efficient transformation of savings to investments. The content of the institutional framework is arguable in different approaches. For example, New Institutionalism handles institutions as the legal framework that should protect the property rights of the actors to sustain efficiency in the system (Khan, 1995) while Rational Choice Institutionalism considers institutions as the mechanism affecting the individual behavior or choice (Shepsle, 2006). On the other hand, Historical Institutional Approach is more related with the regulation and supervision of the markets and institutions and, the rules which will bind them to these regulations (Minsky, 2008, p. 11; Ülgen, 2018)

The second widely studied determinant of financial development is the liberalization of financial markets which indicates releasing of financial markets from the government intervention with the abolition of credit limits, interest rate deregulation, independence of the banking system, free entry into the banking sector (Voghouei, Azali, & Jamali, 2011; Masci, 2008). Even though the majority of the related studies note that financial liberalization is crucial for financial development (Levine, 1996; Claessens, Demirgüç-Kunt, & Huizinga, 2001; Elkhuisen, Hermes, Jacobs, & Meesters, 2018), there are notable studies state that the involvement of government in financial markets is needed to prevent moral hazard and adverse selection (Stiglitz, 2000).

Openness, geography and international relations are the other widely mentioned determinants of financial development (Huang, 2010). According to Levine (1996) openness to international trade and capital flows is advantageous for the welfare of a country since it promotes financial and goods and services markets. Although, in the literature liberalization and openness of financial markets are associated with higher levels of financial development because they increase the financial size, the liberalization of financial markets can be resulted in underdevelopment in the financial markets when it is applied to the system which is not ready to be liberalized such as Turkey which was liberalized when it had not reached the sufficient depth yet.

In conclusion, financial development is affected by several factors such as institutions, policy which involves trade and capital openness and financial liberalization, geography and international relations. While policy determines financial development directly by intervening and non-intervening to the markets and indirectly by determining the institutions, institutions ensure the legal and regulatory environment for financial operations and determine the quality, credibility and safety of the financial markets, institutions and operations

### **1.3. Institutional Governance of Financial Development**

The financial system is an essential subsystem of the overall macroeconomic system with its functions of channeling funds from lenders to borrowers, creating liquidity, and ensuring payment system (Howells & Bain, 2007). The financial system mobilizes the savings and channels them into productive activity, thereby, influencing the pace of economic development (Mishkin & Eakins, 2018). For lack of an efficient financial system, economic development will be impaired and for a well-functioning efficient financial system, economic growth will be

prompted. In this manner, the development of the financial system is a key element to promote economic development. A deeper, more stable, and more efficient financial system will create funds for the innovative and technological investments which are leading elements of economic welfare in the modern world.

There are several elements that influence the level of financial development. Besides the existence of some unchangeable, structural determinants such as geography or culture, it is possible to determine financial development by implementing correct policies and enhancing institutions (Huang, 2010). The institutional framework and policy choices are seen as the primary determinants of financial development. The policy is associated with trade openness, and financial liberalization, interest rate regimes, inflation targeting, and other financial and non-financial policies. Additionally, institutions are the legal and regulatory framework covering the economic activity, and it includes structural elements such as rule of law, democracy, transparency, accountability, and protection of property rights (Acemoglu & Robinson, 2008).

The governance of financial development, as stated before, is the exertion to manage the financial system with the purpose of ensuring its efficient funding to sustainable economic growth through innovative and technological investments. One of the essential points here is where the funds are transferred. In an underdeveloped financial system, the funds are channeled to the exact actors instead of the ones who have the idea, or a project to make valuable investments. In the case that the financial system does not allocate the funds effectively; it cannot be expected that the financial system spurs economic growth. Instead, the transmission of the funds to the financial investments will create a financialization problem which is the process that evolves from funding the non-financial sector to using the non-financial sector as a means of possibly cultivating resources for speculation (Akan, 2018). Thus, an underdeveloped financial system will transfer the real sector income to the financial investments to be used as a speculation tool rather than funding the real sector investments.

Institutional governance takes several definitions and interpretations according to economic approaches. For instance, the mainstream economics, and the World Bank define the institutions as the legal environment in which the economic activity is held, and the institutional governance as the management which ensures proper legal environment for the functioning of economic activity efficiently (Acemoglu & Robinson, 2008). On the other hand the governance is widely defined as the exercise of cultural, political and administrative authority to manage the affairs of a country at all levels, including structures, processes and institutions by which people and groups express their interests, exercise their constitutional rights, fulfill their duties

and mediate their distinctions (United Nations, 1997). Therefore, institutional governance of the financial development is interpreted as the administrative power to manage the system's improvement in all its dimensions by providing an environment that protects the rights of actors, decreases the uncertainty with openness and transparency, stimulates the financial actors to take risks in the boundaries of regulations, and constitutes an interactive interrelated domestic and domestic and global management structure in the financial system.



## **CHAPTER TWO**

### **INSTITUTIONAL GOVERNANCE OF FINANCIAL DEVELOPMENT IN TURKEY**

In this chapter, we will investigate how the governance of financial development has been structured in Turkey and how it is affected by the institutional governance methods with its all sides and content. In this manner, we will first examine the historical evolution of Turkish financial system and then we will explore the national and international institutions, developments, regulations, and organizations that shape how the financial system be governed in Turkey.

#### **2.1. Turkish Financial System**

Turkey has experienced various economic periods that have different characteristics due to the changing conditions of the time and international conjuncture. The formation and development of the financial system have been shaped by the circumstances and the policies, which were implemented as responses to the problems of the periods like many other developing countries. Thus, understanding the current structure of the Turkish Financial System and its governance is not possible without considering the development of the system. Before analyzing the relationship between the financial sector performance and governance of the system in the country, it is compulsory to examine the development of both the financial system and its institutional structure, and also macroeconomic landscape. Thus, in the following subsection of the study, the historical development of the financial system and its institutional improvement will be highlighted shortly. After the examination of historical context and explication of the institutions of the Turkish Financial System, financial sector performance will be analyzed, and the substructure of the analysis of the relationship of the financial sector performance with governance, which will be discussed in the next section, will be drawn.

### **2.1.1. Chronological Development of Financial System in Turkey**

The study will argue the development in the banking sector and stock markets for the period after 1960. However, before beginning to analyze the mentioned period, it is possible to summarize pre-1960 age in three periods: Formation, Republican, and Multiparty Periods. While there was a struggle to establish a national banking sector that would increase economic development during the formation years, by the time of the Republic, it is seen that capital accumulation was determined by the state in selected areas. The most significant improvement in this period is the setting up the Central Bank of Republic of Turkey (CBRT) in 1930 and the establishment of large public banks. Briefly, in this period, the banking sector developed under the shadow of the public sector and to finance its investments. Stock markets were also tried to be nationalized and did not catch the chance to develop and deepen. In the 1950s, there was a relative liberalization movement, which increased trade actions. This increase in trade and national income caused a rise in the number of private banks and their branches (Yetiz, 2016). At the end of the period, the increasing budget deficits resulted in an economic recession that caused the banking sector crises in 1958. The establishments of the Banks Association of Turkey (BAT) in 1958 and the Banks Liquidation Fund in 1960 were the major developments in this period. Finally, this short and straightforward liberalization period finished with the 1960 Military Coup, which led to a new period for both Turkish political and economic life.

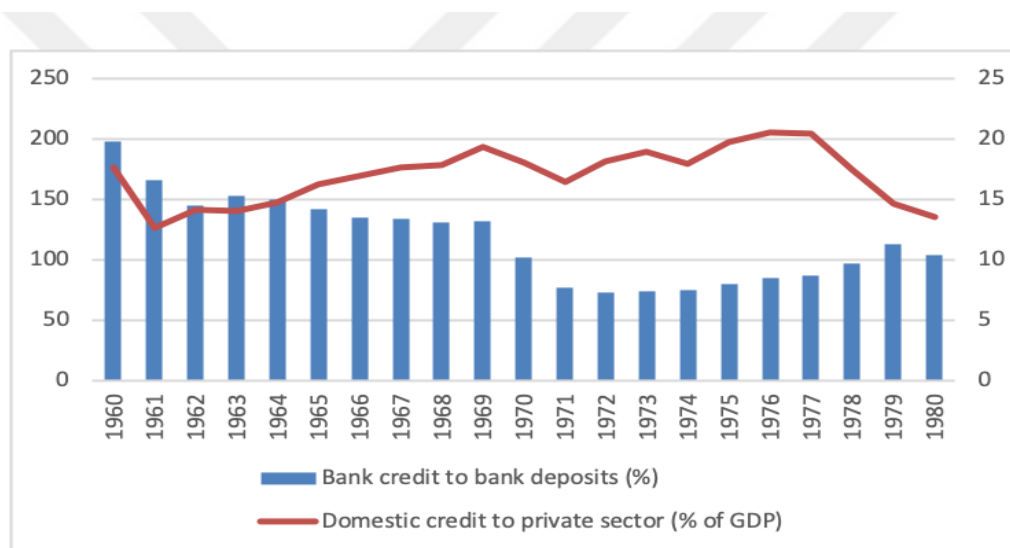
#### **2.1.1.1. 1960 - 1980: The Period of Over-Regulation**

The recession of the late 1950s and the economic instability which could not be ended by the 1958 Stability Program resulted in the abandonment of liberal policies of the 1950s and an increase of government involvement in the economy. In this manner, political authorities implemented inventory policies to regulate and supervise the economics and finance (BAT, 2008). The economic model applied during the 1960s was the import-substitution model, which targeted to decrease the share of import and to increase the percentage of local production in the aggregate supply. In this era, the state implemented a closed economic policy to protect the targeted sectors and, it determined the interest rates and exchange rates independently from the world markets itself. Besides, the banks were oriented to support the development plans of the state (Cekin, 2019). On the other hand, because the growth rates and industrial production

increased remarkably due to the applied import-substitute economic model, the financial deepening started to increase during the first part of the era.

Since the financial system was controlled entirely by the state, there was nearly no risk and instability in the system as it can be seen in the Figure 2-1. The absence of the financial risk that is mostly resulted by the exchange and interest rate changes made private banks possible to increase the number of their branches to increase their deposits by negative interest rates (BAT, 2012). Thus, the long-lasting economic and financial stability caused a significant rise in financial depth as it is shown in Figure 2-1.

**FIGURE 2-1: Financial Stability and Depth in Turkish Banking Sector: 1960-1980**



Source: World Bank, 2020

By the middle of the 1970s, the picture changed, and the fragility of the Turkish economy appeared. Turkey was dependent on oil import, and it was the reason why it was remarkably affected by the oil price shocks. Higher oil prices could not be adopted to the economy, and the economic policymakers were forced to concentrate on short-term solutions. Foreign exchange rate guarantees increased contingent liabilities of the public sector, and inflation became high and volatile (Görmez & Yigit, 2009). Turkey's dependence on foreign funding for sustainable growth started to increase again in the 1970s. The growth trend based on inflationary policies, postponement of the structural adjustment programs, and massive borrowing resulted in a 1978 external debt crisis (Utkulu, 2001). With the arrival of the second oil shock in 1979, a severe balance of payments problem coupled with hyperinflation, which led to a contraction of output,

became inevitable. The new economy program of the 1980s was a response to the crisis, which was worsened by the second oil shock (Celasun, 1994).

In summary, it is seen that the institutional structure of the financial system was quite primitive, and the system was under the full control of the state. In the era in which there was not an independent executive committee, the only regulatory and supervisory institutions were Central Bank and Treasury, which governed the financial system until the 1980s. Central Bank's independence was a faraway dream (Görmez & Yigit, 2009). The resources of the Central Bank were used to ensure credits to prioritized sectors like development and investment banks' resources (Köksal, 2001). Even though there was an intense regulation movement in the era, it was an irregular and non-structural regulation rather than the governance of the economy and finance systematically and strategically. The supervision and regulation of the system were not to make it stronger but, to fund the related sectors and the investors. The financial deepening which had started in the 1960s was cut off by the oil price shocks, foreign exchange shortages, heavy debts, and high inflation. Thus, at the end of the period, the financial system was underdeveloped and frail. After the crisis, the situation worsened, the stabilization programs which were implemented with the help of international financial institutions failed, and the era ended with a new economic agenda in January 1980, which was supported by international financial institutions and the military forces of Turkey.

#### **2.1.1.2. 1980 - 2001: Financial Liberalization and Crises**

Economic problems that started to appear by the middle of the 1970s and reached the peak point at the end of the era resulted in a need for a new economic program. The import substitution policy had been brought as a solution to a significant depression in the economy, but it also caused substantial economic problems. The solution for these problems has come from a new economic policy program that has been accepted as a turning point in the Turkish Economy because it was one of the first of its kind and included both short-term stabilization and long term structural regulations (Onis, 2003, p. 6). The program, whose main dynamic element was deregulation, was launched in 1980. The central aspects of the economic policies included in the program were the establishment of a market-oriented economic model that foresee decreasing the share of the public in the economic determination process, the integration of the Turkish economy to the world and increasing the foreign capital inflows, liberalizing the interest rates to stimulate the private savings, and expanding the currency inflow in the economy (Atiyas & Ersel, 1996). Differently from the liberalization of the 1950s, the program of the

1980s was irrevocable due to the pressures that come from the World Bank and the IMF, who gave conditional loans to the country to implement neo-liberal policies (Kazgan, 2005, p. 195).

The liberalization of the financial system started on June 1, 1980, when the interest rates have been released, and the banks have been permitted to issue deposit certificates (Bakkal & Alkan, 2011, p. 73), and it was totally liberalized in 1989 when capital accounts liberalized, and full convertibility of Turkish Lira was established. It was the final stage of the liberalization program, and the main reason for this transition was the increasing need for foreign capital flows to finance public sector borrowing requirement (Demir, 2004).

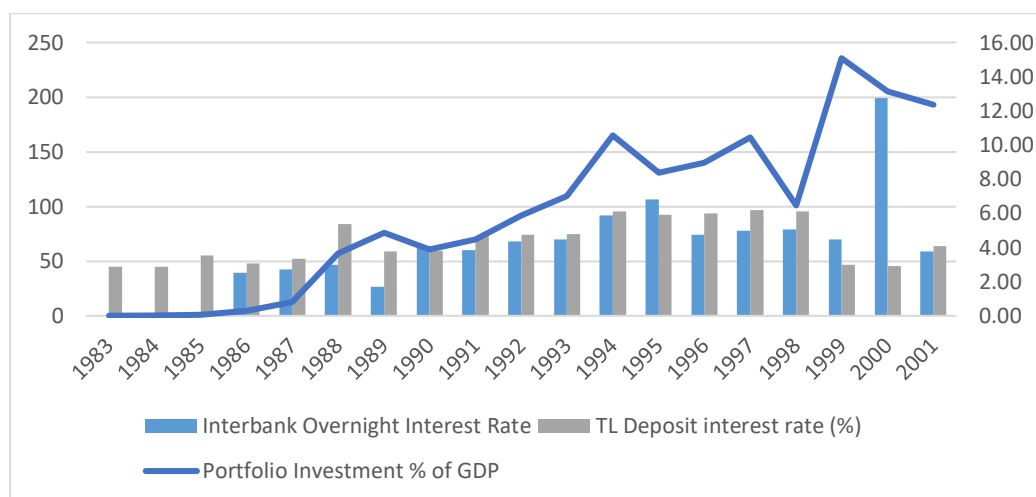
**TABLE 2-1:** Key Indicators of Economic Performance as % of GDP in Turkey: 1980-2001

| Indicator / Year                                 | 1980-<br>1985 | 1986-<br>1990 | 1991-<br>1995 | 1996-<br>1999 | 2000 | 2001  |
|--------------------------------------------------|---------------|---------------|---------------|---------------|------|-------|
| GDP Growth                                       | 3,65          | 5,67          | 3,32          | 3,47          | 6,64 | -5,96 |
| Private Consumption                              | 75,6          | 65,1          | 67,2          | 66,3          | 70,5 | 68,4  |
| Government Expenditure                           | 6,6           | 6,9           | 7,6           | 5,8           | 6,1  | 7,5   |
| Public Investment                                | 7,3           | 6,8           | 4,8           | 4,2           | 4,6  | 4,2   |
| Private Investment                               | 6,8           | 13,5          | 17,1          | 18,5          | 15,7 | 11,7  |
| Net Export                                       | -1,4          | 0,9           | 0,4           | -0,1          | -3,0 | 4,1   |
| Inflation                                        | 47,6          | 53,17         | 79,3          | 78,9          | 54,9 | 54,4  |
| Unemployment                                     | 8,0           | 8,7           | 8,9           | 7,5           | 7,0  | 8,9   |
| Broad Money                                      | 23,46         | 27,12         | 28,7          | 34,9          | 33,6 | 44,6  |
| Budget Deficit                                   | -1,8          | -2,3          | -3,5          | -6,5          | -8,0 | -12,2 |
| Current Account Balance                          | -2,3          | -0,3          | -0,5          | -0,4          | -3,7 | 1,9   |
| Gross Savings                                    | 15,4          | 25,9          | 24,6          | 22,5          | 18,4 | 18,4  |
| Private Savings                                  | 10,6          | 21,4          | 24,8          | 24,2          | 21,8 | 25,5  |
| Public Savings                                   | 4,9           | 4,5           | -0,1          | -1,7          | -3,4 | -7,1  |
| FDI                                              | 0,11          | 0,36          | 0,49          | 0,37          | 0,36 | 1,67  |
| Foreign Trade Volume                             | 18,67         | 19,5          | 20,5          | 29,8          | 32,1 | 38,51 |
| Portfolio Investment                             | ...           | 2,71          | 7,25          | 10,24         | 13,1 | 12,34 |
| Source: SBB, 2020; <sup>a</sup> World Bank, 2020 |               |               |               |               |      |       |

The 1980s experienced relatively high growth rates and financial deepening thanks to the openness of the markets to the world and the capital inflow to the country. However, this debt-oriented growth did not last long, and by the end of the 1980s, the economic conditions started to worsen.

Even though the steps for liberalization of financial system started to be taken in the early 1980s, the effects of them appeared after 1986; especially in the 1990s (Atiyas & Ersel, 1996). Establishment of full convertibility of Turkish lira and the full liberalization of capital markets increased the short-term international capital flows, which encouraged commercial banks to purchase securities instead of direct loan extensions. In this way, domestic agents who increasingly borrowed from abroad with lower interest rates began to finance public deficits with higher interest rates, which is resulted in increasing bank profits and rising budget deficits. As a result, the domestic borrowing ratio increased while the external borrowing proportion decreased. The high-interest rates, which were seen as an encouragement to foreign capital inflow, were the main characteristic of the era. However, the higher interest rates meant that the government would pay more interest payments, which resulted in higher budget deficits (Onis, 2003, p. 7)

**FIGURE 2-2: Portfolio Investment, Interbank Overnight and Deposit Interest Rates in Turkey: 1983-2001**



Source: World Bank, 2020; SBB, 2020

As was noted before, financial deepening was achieved but, it was the public banks that largely formalized the financial deepening by credit expansion (Görmez & Yigit, 2009; Gemici, 2012) which did not permit private capital markets' development in Turkey. During the lost years of the 1990s, the credits to GDP increased rapidly during the 1980s and 1990s, but the

share of the private sector was far below the percentage of public credits. As seen in Table 2-2, the credit to private sector did not change much throughout the period. The increase in total credits was resulted by public sector credits. On the other hand, it seems that the rising deepening could not ensure the efficiency in the savings-investment transmission mechanism (Yeldan, 2016, p. 128).

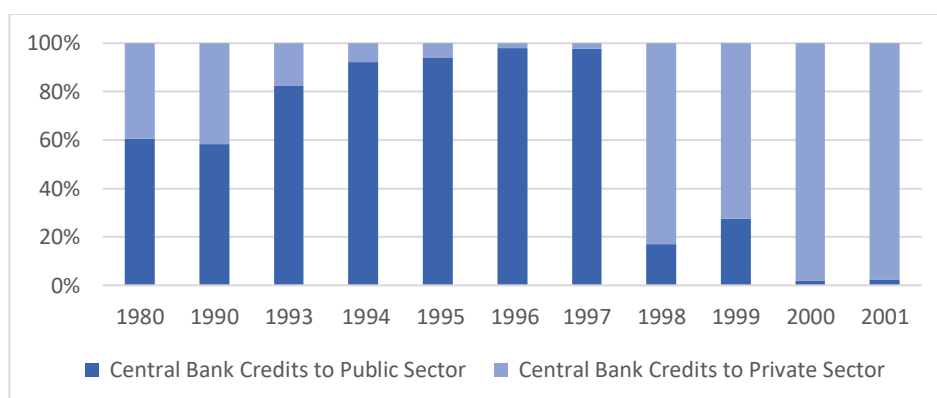
**TABLE 2-2: Banking Sector in Turkey: 1980-2001**

|                  | <b>Bank credit to bank deposits (%)</b> | <b>Domestic credit to private sector (% of GDP)</b> | <b>Central bank assets to GDP (%)</b> |
|------------------|-----------------------------------------|-----------------------------------------------------|---------------------------------------|
| <b>1980-1985</b> | 92,24                                   | 17,46                                               | 12,1                                  |
| <b>1986-1990</b> | 75,79                                   | 18,18                                               | 5,01                                  |
| <b>1991-1995</b> | 69,93                                   | 17,53                                               | 3,39                                  |
| <b>1996-2000</b> | 61,59                                   | 19,89                                               | 2,12                                  |
| <b>2001</b>      | 44,69                                   | 15,03                                               | 6,05                                  |

Source: World Bank, 2019

On the other hand, Central Bank was not independent from the political authorities, and it was operated as a creditor to fund the treasury (Rodrik, 2012). During the 1990s, the assets of Central Bank declined linearly, and as it is seen in Figure 2-3, from 1980 to 1998, Central Bank credits were given dominantly to Public Sector.

**FIGURE 2-3: Central Bank Credits % of GDP**



Source: SBB, 2020

When it comes to stock markets, beside the liberalization of markets, there were some additional critical movement related with stock market development and structural progress. Firstly, in 1986, under the leadership of Central Bank, some submarkets of money markets such

as Interbank Money Market, Open Market Operations, Exchange Market, and Gold Market were formed to increase the opportunities of investment. The formation of Interbank Money Market, whose aim was providing liquidity to the banks which do not have cash, was a critical institutional step to achieve financial market depth (CBRT, 2014). Another important development to increase deepening in financial markets was the formation of the Istanbul Stock Exchange into action in 1986. Even though volatility increased during the period, the worsening economic conditions of the 1990s did not affect markets as much as banking sector and stock markets' depth linearly.

**TABLE 2-3: Stock Markets in Turkey: 1989-2001**

|                  | <b>Stock market<br/>turnover ratio (%)</b> | <b>Stock price<br/>volatility</b> | <b>Stock market<br/>capitalization to GDP<br/>(%)</b> |
|------------------|--------------------------------------------|-----------------------------------|-------------------------------------------------------|
| <b>1989</b>      | 24,42                                      | 39,49                             | 3,05                                                  |
| <b>1990-1995</b> | 107,83                                     | 50,73                             | 10,73                                                 |
| <b>1996-1999</b> | 144,09                                     | 48,99                             | 16,36                                                 |
| <b>2000</b>      | 218,49                                     | 57,61                             | 27,83                                                 |
| <b>2001</b>      | 152,20                                     | 64,34                             | 21,55                                                 |

Source: World Bank, 2019

As it is shown in Table 2-1, while growth was declining, inflation and budget deficits were rising by the beginning of the 1990s. These poor macroeconomic conditions brought on a financial crisis in 1994. On the other hand, the Central Bank tried to keep interest rates low and to control the exchange rates, which resulted in a sudden capital outflow: FDI and portfolio investment declined abruptly and the government, having realized the capital outflow, started to sell foreign exchange which caused serious decrease in the exchange reserves (Rodrik, 2012).

The 1994 financial crisis resulted in a decreasing credit rating of Turkey and a broad pessimism about the economy, and hence, it has become difficult to raise funds from abroad for many small banks (Kibritcioglu, 2005). In 1999, Turkey had to sign an exchange rate-based stabilization program with the IMF, including reforms such as establishing an independent supervisory and regulatory banking authority to increase the financial stability and accepting a new Banking Law with it in 1999. However, the implementation of the program was weak, which was the main reason why it was not successful (Bakir & Onis, 2010). Primarily, the lag

of the needed restructuration of public banks which caused the World Bank not to give compliance loans, uncontrollable domestic demand, and high rates of current account deficit resulted in a breakdown in macroeconomic conditions. Under an environment where worsening macroeconomic and financial conditions were out of control and even got worse, a devastating crisis was inevitable (BAT, 2012). Firstly, in 2000, the banking crisis showed. The crisis was overcome by IMF credits, but political authorities could not manage the crisis effectively and the most destructive financial crisis of Turkish history occurred in 2001.

It was different from previous crises and could not be solved without structural reforms. The solution came from International Financial Institutions again, which will be the main actor in the emergence of the regulatory state in the Turkish financial system. In this context, a standby agreement was signed with the IMF, and the Transition to Strong Economy Program (TSEP) was launched in May 2001. As distinct from the 1999 exchange rate-based program, the application of the TSEP was in the hands of an international agent Kemal Dervis, who was independent of the political authorities. The program has become successful this time; the economic situation started to get better. With the establishment of political stability in 2002, when a single party took power, the credibility of the country increased. AKP government adopted the program and sustained it successfully.

### **2.1.1.3. 2002 - 2019: Rise of Regulatory State**

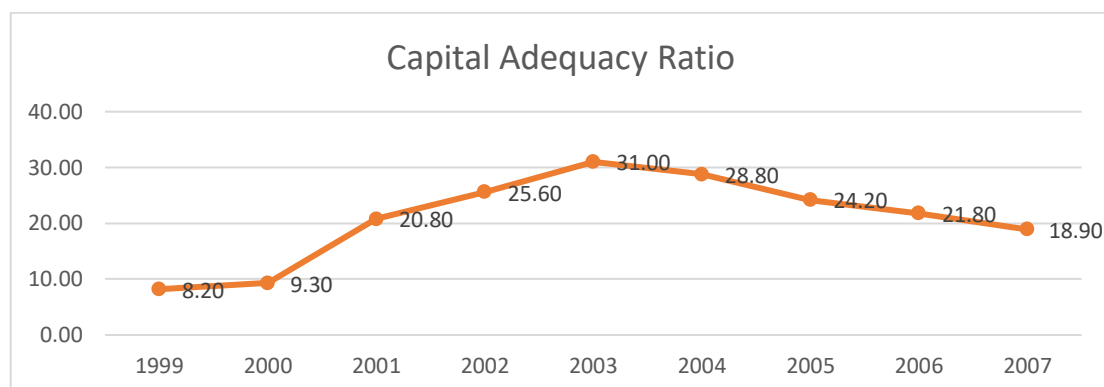
The third period has started with the optimistic foresight that the growth-driven and stable financial system can be achieved with the implementation of accurate macro and micro-financial policies. The 2001 financial crisis revealed the shortcomings of the system. Political instability, rent-seeking attitude of political authorities, the structural problems on domestic financial institutions, and lack of consistency in policy implementation were some of these shortcomings. After the crisis, the policymakers followed the way to fill these gaps in the governance of the financial system. Even if the applied policies have been successful in the first part of the era in which the global economic conditions were convenient, after the 2008 Global Financial Crisis, the insufficiency of prevailing predictions has appeared. Thus, after the 2008 crisis, Turkey's policy approach to the economy had to change and it has interiorized a growth-based economic policy model which also could not be successful and ended with an economic and financial crisis in 2018. As the macroeconomic and financial landscape and policy choices have changed after the Global Financial Crisis, we will analyze the third period under two sub-periods: 2002-2007 and 2008-2019.

### 2.1.1.3.1. 2001 - 2007: Reconstruction Period

By the end of the crisis, Turkey has passed the regulatory state position and started to regulate the economy and financial sector step by step and with the powerful support of International Financial Institutions (IFIs). The crisis had revealed the gaps in the financial system and provided the proper environment to initiate the structural reform process (Akin, Aysan, & Yıldırım, 2008). On the other hand, there was pressure from the global financial institutions to achieve internationally acceptable regulation standards.

The main target of the policymakers in the first years was filling the gaps, such as the rising inflation, substantial budgetary deficits, negative growth rates, and inefficient and unstable financial system. In the case that the gaps are filled, it was expected to reach desired macroeconomic and financial conditions. IMF prepared the road map to reach the target, and the first steps were also taken with the help of the prepared program. Serious steps were taken to strengthen the banking system. In this context, Banking Sector Restructuring Program was launched in 2001. The public banks were operationally and financially restructured and bankrupted or seriously damaged private banks transferred to the Saving Deposit Insurance Fund (SDIF) to be rehabilitated, and the supervisory and regulatory organizations were strengthened (Kibritcioglu, 2005). Thus, the supervision and regulation in banking sector have increased enormously at the beginning of the period. As a result of the strict regulations, Capital Adequacy Ratio increased to 25,6 in 2002 from 8,2 in 1999 as seen in Figure 2-4.

**FIGURE 2-4:** Capital Adequacy Ratio in Turkey: 1999-2007



Source: CBRT, 2006 & 2008

Another significant development was that the independency and credibility of the CBRT were guaranteed with a new memorandum which ended the bound between the government and the monetary authority (Aysan, Güler, & Orman, 2013). The obligation to transfer resources to the public banks was eliminated and the primary aim of the Central Bank was determined as the stabilization of inflation.

In March 2003, Basel II Steering Committee was established within the body of the BAT to ensure the rapid implementation of the BASEL II criteria. The adaption to the BASEL II was necessary for the EU admission process too. In this manner, December 2004 was a turning point for Turkey because the negotiations for full membership to the EU started. After that, the EU intervention in the development of the Turkish Financial System has increased, and the financial policies have become the products of supranational interdependence (Bakir, 2006). Akin et al. (2008) have named the period between 2002 and 2004 as the recovery and stabilization period by considering the intense and consistent restructuring activities. The steps taken generated favorable results in financial markets, banking sector, and overall macroeconomic situation. Uncertainty and pessimism, which were dominant by the end of the 90s, were eliminated. The Turkish economy grew at an average annual rate of nearly 7 percent between 2002 and 2007, for the first time in the last half-century (Aysan, Güler, & Orman, 2013). In 2004, Turkey grew % 9,6 and inflation decreased to the single-digit numbers. Foreign direct investment increased, and the budget deficit decreased incredibly.

All of these developments in the economy were the products of strict fiscal discipline and institutional regulations on the financial system (Akin, Aysan, & Yıldırım, 2008).

**TABLE 2-4:** Key Indicators of Economic Performance as % of GDP in Turkey: 2002-2007

|                                          | <b>2002</b> | <b>2003</b> | <b>2004</b> | <b>2005</b> | <b>2006</b> | <b>2007</b> |
|------------------------------------------|-------------|-------------|-------------|-------------|-------------|-------------|
| <b>GDP Growth <sup>a</sup></b>           | 6,43        | 5,61        | 9,64        | 9,01        | 7,11        | 5,03        |
| <b>Private Consumption</b>               | 68,02       | 71,25       | 71,29       | 71,72       | 70,52       | 71,31       |
| <b>Government Expenditure</b>            | 12,73       | 12,20       | 11,95       | 11,79       | 12,33       | 12,79       |
| <b>Public Investment</b>                 | 4,34        | 3,38        | 2,92        | 3,30        | 3,39        | 3,40        |
| <b>Private Investment</b>                | 12,38       | 13,63       | 17,42       | 17,73       | 18,90       | 18,02       |
| <b>Net Export</b>                        | 1,63        | -1,04       | -2,63       | -3,50       | -4,91       | -5,16       |
| <b>Inflation <sup>a</sup></b>            | 44,96       | 21,60       | 8,60        | 8,18        | 9,60        | 8,76        |
| <b>Unemployment</b>                      | 10,78       | 10,98       | 10,80       | 10,60       | 10,20       | 10,30       |
| <b>Broad Money <sup>a</sup></b>          | 38,96       | 34,23       | 33,54       | 39,06       | 40,73       | 42,07       |
| <b>Budget Deficit</b>                    | -11,60      | -8,59       | -5,25       | -1,20       | -0,59       | -1,56       |
| <b>Current Account Balance</b>           | -0,26       | -2,41       | -3,52       | -4,20       | -5,69       | -5,45       |
| <b>Public Debt</b>                       | 27,34       | 27,34       | 27,34       | 27,34       | 27,34       | 27,34       |
| <b>Gross Savings</b>                     | 18,59       | 15,47       | 15,98       | 16,05       | 16,67       | 15,60       |
| <b>Private Savings</b>                   | 23,44       | 19,61       | 16,94       | 13,25       | 12,51       | 13,22       |
| <b>Public Savings</b>                    | -4,85       | -4,14       | -0,96       | 2,80        | 4,16        | 2,38        |
| <b>FDI</b>                               | 0,45        | 0,55        | 0,69        | 2,00        | 3,65        | 3,26        |
| <b>Portfolio Investment <sup>b</sup></b> | 10,02       | 9,63        | 11,30       | 14,48       | 15,28       | 17,85       |
| <b>Foreign Trade Volume</b>              | 38,79       | 38,42       | 40,85       | 38,75       | 42,26       | 41,82       |

Source: SBB, 2020; <sup>a</sup> World Bank, 2020; <sup>b</sup> IMF, 2020

When we look at the banking sector indicators, it seems that depth, efficiency, and stability increased during the years between 2002 and 2007. Credits to GDP and Assets to GDP increased linearly, which indicates that the banking sector deepened throughout the period, albeit it is not a kind of significant deepening.

On the other hand, as a result of the decrease in inflation and public debt ratios, banks have regained their intermediation roles. (Akin, Aysan, & Yıldırım, 2008). The ratio of loans to deposits rose year by year. In contrast, the proportion of bank overhead cost to total assets

declined, which demonstrates that financial stability and efficiency also increased between the cited years.

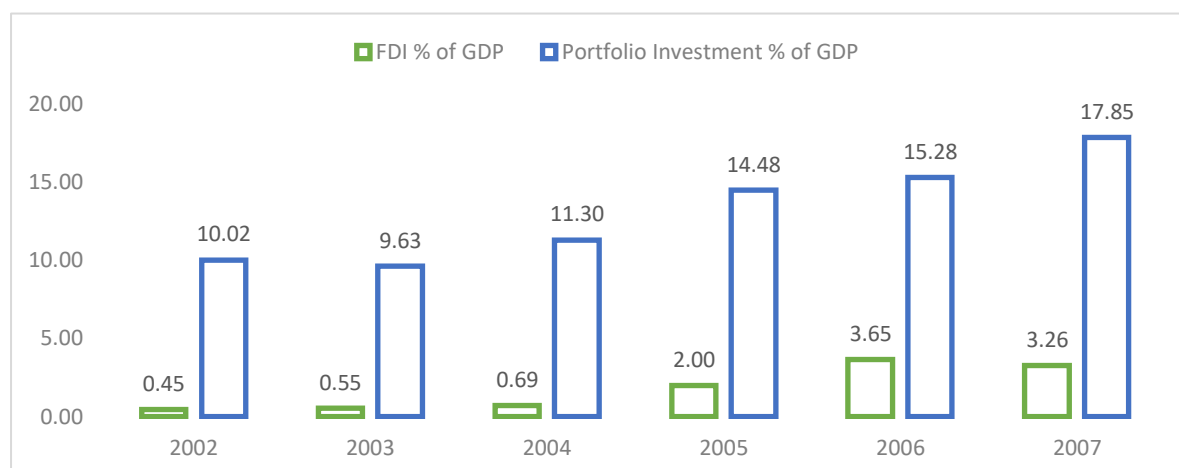
**TABLE 2-5: Banking Sector Development in Turkey: 2002-2007**

|                                                                                | 2002  | 2003  | 2004  | 2005  | 2006  | 2007  |
|--------------------------------------------------------------------------------|-------|-------|-------|-------|-------|-------|
| <b>Credits/Deposits <sup>a</sup></b>                                           | 37,12 | 41,22 | 48,98 | 56,53 | 62,83 | 69,28 |
| <b>Credits/Total Assets</b>                                                    | 22,5  | 25,9  | 31,7  | 37,8  | 43,8  | 49,1  |
| <b>Assets/GDP</b>                                                              | 59,2  | 53,4  | 53,1  | 60,4  | 63,3  | 66,1  |
| <b>Credits/GDP</b>                                                             | 16,5  | 16    | 18,3  | 24,4  | 28,8  | 33,6  |
| <b>Central bank assets to GDP (%)<sup>a</sup></b>                              | 9,41  | 6,46  | 4,46  | 3,17  | 2,44  | 2,04  |
| <b>Domestic credit to private sector (% of GDP)<sup>a</sup></b>                | 14,16 | 14,14 | 16,74 | 21,43 | 24,93 | 28,25 |
| <b>Bank overhead costs to total assets (%)<sup>a</sup></b>                     | 4,73  | 5,66  | 6,71  | 3,98  | 3,77  | 3,55  |
| <b>Non-performing Loans/Total Gross Loans <sup>b</sup></b>                     | 18    | 12    | 6     | 5     | 3,8   | 3,5   |
| Source: <sup>a</sup> World Bank, 2020; SBB, 2020; <sup>b</sup> CBRT 2006, 2008 |       |       |       |       |       |       |

Even if the regulations on the banking sector were intense between the years 2001 and 2004, the banking sector regulation continued after 2004 too. As of mid-February 2005, the new Banking Law which guaranteed the operational and financial independence of the BRSA and the SDIF was legislated. Moreover, in the revised loan portfolio of banks, the non-performing loans (NPLs) were classified in compliance with international standards (Kibritcioglu, 2005). As a result of all of these processes, the ratio of NPLs to gross loans decreased to 3.8 % in 2007 from 18 % in 2002.

When it comes to the stock markets in Turkey, they have been affected also by the convalescent economic and financial conditions, and abundance of global liquidity. Relatively good global and domestic conditions contributed to the rise in FDI and portfolio investment throughout the era (Bayar, 2017). Even though it is pretty small increase when it is compared to the other developed and developing countries', stock market capitalization has raised between the years 2002 and 2006.

**FIGURE 2-5: Foreign Direct Investment and Portfolio Investment in Turkey: 2002-2007**



Source: IMF, 2020; SBB, 2020

On the other hand, while the turnover ratio in stock markets increased, stock price volatility decreased which means efficiency and stability in stock markets have increased regularly until 2007.

**TABLE 2-6: Stock Market Development in Turkey: 2002-2007**

| Indicator                                     | 2000  | 2001  | 2002  | 2003  | 2004  | 2005  | 2006  | 2007  |
|-----------------------------------------------|-------|-------|-------|-------|-------|-------|-------|-------|
| <b>Stock Market Capitalization to GDP (%)</b> |       |       |       |       |       |       |       |       |
| Stock Market                                  | 21,55 | 16,26 | 16,81 | 20,86 | 26,01 | 28,24 | 33,81 | 27,18 |
| <b>Turnover Ratio (%)</b>                     |       |       |       |       |       |       |       |       |
| Stock Market                                  | 152,2 | 175,3 | 187,1 | 173,6 | 153,1 | 145,1 | 142,1 | 106,4 |
| Turnover Ratio (%)                            | 0     | 3     | 7     | 0     | 3     | 7     | 5     | 8     |
| <b>Stock Price Volatility</b>                 |       |       |       |       |       |       |       |       |
| Stock Price                                   | 64,34 | 55,66 | 44,97 | 37,79 | 27,79 | 27,09 | 28,51 | 32,68 |

Source: World Bank, 2020

The improvement in the Turkish economy and financial system has continued until the global financial crisis, which has started in 2008 and lasted until 2009. Even though the banking sector was strengthened, and several institutional measures were taken, the Turkish economy was still dependent on the capital inflows. The results of the structural reform during the era were successful, but it was not only due to the reforms but also to the abundance of global liquidity and favorable global conditions. The shortcomings of the system have appeared again

with the Global Financial Crisis in 2008. As soon as the FDI and the portfolio investment inflows decreased because of the global recession, deteriorations have started in the Turkish Financial System and the overall economy.

#### **2.1.1.3.2. 2008 - 2019: Macprudential Policy Regime and Institutional Fragmentation**

As it is stated before, the Turkish economy has had high growth rates and a relatively well-functioning financial system from 2002 to the global financial crisis. The progress in the Turkish economy was due to the intense regulations on the financial system and the abundant global liquidity conditions. During the global financial crisis of 2008, which dropped capital flows by almost half, emerging economies such as Turkey, having been fragile to the developments in international markets, became vulnerable to be harmed more intensively and suddenly (Aysan, Fendoğlu, & Kılınç, 2015). The improvements and regulations on the banking sector made it stronger, yet they could not prevent it from being affected by the crisis.

The crisis, which is accepted as the most severe financial crisis since 1930, occurred in the US in 2007 as a result of the deregulation policies of Neo-liberal Economics. It didn't take long time that the impacts of the crisis have been seen in other developed and emerging countries. Despite several regulations in the banking sector, Turkish economic activity was still dependent on capital inflows indicating that the financial system was not constructed as system that can sustain itself and promote economic activity. The only difference between the previous periods was that the banking sector was strengthened against a potential crisis or an external threat. The strengthened banking sector could withstand the extreme causes of the Global Financial Crisis when it first started, yet the overall economic activity was significantly affected (Rodrik, 2012).

GDP growth has decreased by almost 10 percent from 2007 to 2009. The decrease in growth and economic activity realized through several channels. The first one was the export, which had decreased extremely in 2008 when net export as of GDP was -4,25. The second channel was the expectations, which made consumption decreased by 10 percent in a year. The third and the last channel that the economy was affected through was the foreign capital inflows. FDI, which was 3,26 percent of GDP in 2007 declined to 2,6 in 2008 and 1,33 in 2009, while portfolio investment decreased from 17.8 in 2007, and to 8,99 in 2008.

**TABLE 2-7: Key Indicators of Economic Performance as % of GDP in Turkey: 2008-2019**

|                                | <b>2008</b> | <b>2009</b> | <b>2010-<br/>13</b> | <b>2014-<br/>16</b> | <b>2017</b> | <b>2018</b> | <b>2019</b> |
|--------------------------------|-------------|-------------|---------------------|---------------------|-------------|-------------|-------------|
| <b>GDP Growth</b>              | 0,85        | -4,70       | 8,22                | 4,81                | 7,47        | 2,83        | 0,00        |
| <b>Private Consumption</b>     | 61,61       | 62,00       | 62,63               | 60,32               | 59,13       | 56,69       | 57,40       |
| <b>Government Expenditure</b>  | 13,71       | 15,77       | 14,26               | 14,27               | 14,50       | 14,83       | 15,68       |
| <b>Public Investment</b>       | 3,90        | 3,90        | 4,00                | 4,03                | 4,20        | 4,10        | ...         |
| <b>Private Investment</b>      | 22,90       | 18,50       | 23,18               | 25,30               | 26,40       | 26,80       | ...         |
| <b>Net Export</b>              | -4,25       | -0,79       | -5,96               | -3,13               | -4,51       | -1,10       | 1,83        |
| <b>Inflation</b>               | 10,44       | 6,25        | 7,86                | 8,10                | 11,14       | 16,33       | 15,18       |
| <b>Unemployment</b>            | 11,00       | 14,00       | 10,15               | 10,37               | 10,92       | 11,00       | 13,7        |
| <b>Broad Money</b>             | 46,48       | 52,13       | 51,72               | 53,36               | 54,25       | 53,64       |             |
| <b>Budget Deficit</b>          | -1,75       | -5,28       | -1,91               | -1,10               | -1,53       | -1,95       | -2,89       |
| <b>Current Account Balance</b> | -5,08       | -1,76       | -6,73               | -3,66               | -4,80       | -2,60       | 1,10        |
| <b>Gross Savings</b>           | 16,9        | 13,3        | 22,43               | 24,54               | 25,5*       | 27,063*     | ...         |
| <b>Private Savings</b>         | 15,2        | 14,2        | 19,81               | 21,54               | ...         | ...         | ...         |
| <b>Public Savings</b>          | 1,7         | -0,8        | 2,62                | 3,01                | ...         | ...         | ...         |
| <b>FDI</b>                     | 2,60        | 1,33        | 1,53                | 1,76                | 1,35        | 1,69        | 1,1         |
| <b>Public Debt</b>             | 10,08       | 12,91       | 11,95               | 13,60               | 15,96       | 17,73       | 19,53       |
| <b>Portfolio Investment</b>    | 8,99        | 14,12       | 16,66               | 17,78               | 20,33       | 18,14       | ...         |

Source: SBB, 2020; IMF, 2020; World Bank, 2020

NOTE: The method for computing savings ratio has changed in 2006. The numbers on the table show the savings as of GDP which is computed with new methodology.

When it comes to the banking sector, at the beginning of the crisis, the banking sector was not affected much due to the strict regulations, having been taken in the previous period. However, as the intensity of the crisis became evident, banks started to tighten their lending conditions, and demand for loans decreased because of the weakening external and domestic demand and rising unemployment, and the decrease in credits became apparent. The stability in the banking sector was not influenced much either: despite the short-term decrease in credit to deposit ratio, it did not take much that time the increase in the ratio to appear. As a result of the fast recovery process, Turkey became one of the few countries whose credit rating improved

significantly during the crisis (Rodrick 2012). Additionally, the ratio of non-performing loans to gross loans, 5% in 2009, remained its normal level by the end of the crisis.

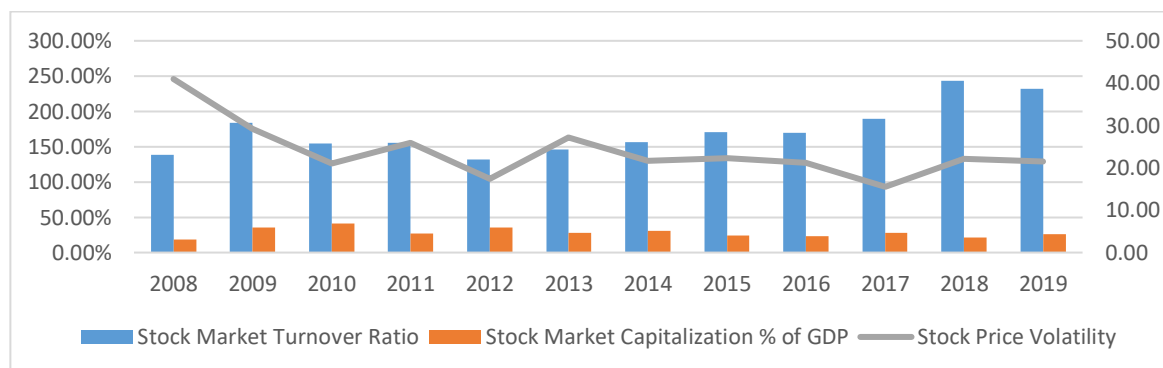
**TABLE 2-8: Banking Sector Development in Turkey: 2008-2019**

|                                                               | 2008  | 2009  | 2010-<br>2013 | 2014-<br>2016 | 2017   | 2018   | 2019   |
|---------------------------------------------------------------|-------|-------|---------------|---------------|--------|--------|--------|
| <b>Credits/Total Assets</b>                                   | 50,20 | 47,10 | 56,70         | 62,70         | 64,40  | 64,40  | 62,85  |
| <b><sup>a</sup>Domestic Credit to Private Sector % of GDP</b> | 33,64 | 37,35 | 51,75         | 66,82         | 70,85  | 68,03  | ...    |
| <b>Credits/Deposits</b>                                       | 83,90 | 80,50 | 102,33        | 122,57        | 126,40 | 117,60 | 110,24 |
| <b>Assets/GDP</b>                                             | 73,60 | 83,50 | 89,28         | 101,00        | 104,70 | 103,80 | 105,60 |
| <b>Credits/GDP</b>                                            | 38,30 | 41,50 | 52,25         | 64,17         | 69,50  | 66,90  | 66,00  |
| <b>Capital Adequacy Ratio</b>                                 | 18,00 | 20,60 | 17,20         | 15,83         | 16,90  | 17,30  | 17,63  |
| <b>NPL/Gross Loans</b>                                        | 3,4   | 5     | 2,8           | 2,94          | 2,84   | 3,9    | 5,33   |

Source: SBB, 2020; <sup>a</sup> World Bank, 2020

On the other hand, the stock markets, which were relatively young in Turkey were affected by the crisis more than the banking sector. Stock Market capitalization which was 33,81% in 2006 decreased to 18, 29% in 2008. While the turnover ratio decreased from 142% in 2006 to 138% in 2008, stock price volatility demonstrated a sharp increase from 28% in 2006 to 40,9 in 2008. As seen in Figure 2-6, stock market development decreased remarkably during the crisis.

**FIGURE 2-6: Stock Market Development in Turkey: 2008-2019**



Source: Borsa Istanbul, 2020; Bloomberg, 2020

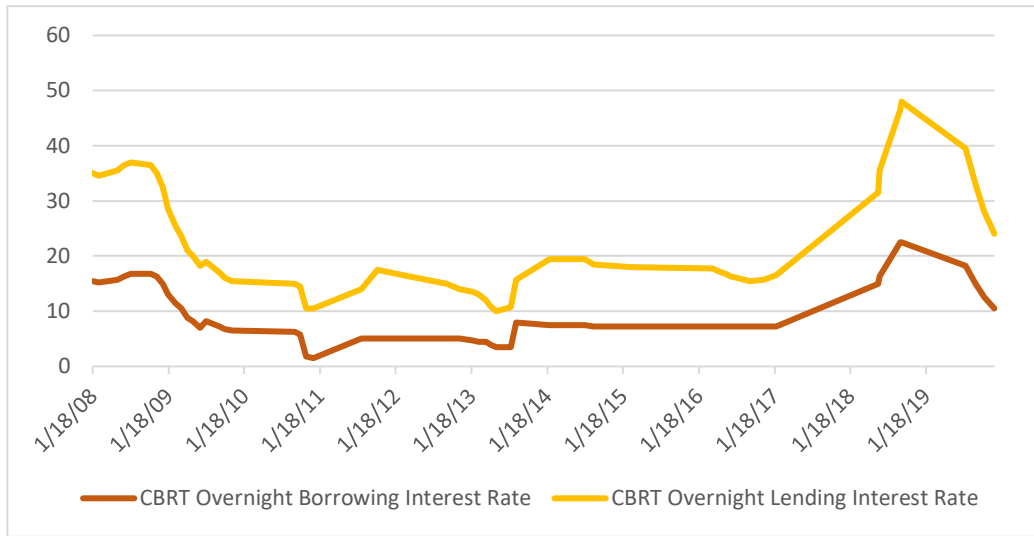
Several global and domestic measures were taken to prevent sustaining the impacts of the crisis on the economy and financial system all over the world. First of all, at the global level, financial stability became the critical policy objective, and accordingly, G-20 and Financial Stability Board were established to ensure financial stability (Yağcı, 2018). The policymakers who had focused on more the financial management of the micro institutions started to consider the macro-financial risks.

In Turkey, the complete deregulation process was ended in 2002 and some serious regulations were made to provide stability in the financial system. However, it was a micro level regulation which targeted the strength of the financial institutions. With the 2008 Global Financial Crisis, Turkey also did follow the macroprudential policy movement and started to implement it in late 2010 and took significant measures between 2011 and 2014 with the purpose of curbing the outcomes of the capital outflows in the economy. Financial stability became another underlying purpose of the Central Bank, whose primary target was determined as price stability in the early 2000s. In addition to the conventional policies such as increasing the reserve ratio and ending of the interest payment to required reserves, Central Bank used some unconventional policy tools to ensure financial stability in the country (Aysan, Fendoğlu, & Kılınç, 2015).

The first one of these unconventional policies was the interest rate corridor, which is the gap between the lending and borrowing overnight interest rate of CBRT. The policy, which draws the boundaries of real interest rates and controls the inflation and current account deficit through the real interest rate channel, was introduced to make monetary policy to be more effective in 2010 in Turkey. During good times, when the capital inflows tend to increase, the corridor is broadened; whilst during bad times, when capital inflows tend to follow a lower trend, the corridor is narrowed (Aysan, Güler, & Orman, 2013).

As it is shown in Figure 2-7, the corridor was narrowed after the crisis to reduce the cost of credit lending. The second contemporary policy tool was the reserve option mechanism, which allows banks to keep a part of their required assets in Central Bank in foreign currency or gold. The policy aimed to restrict the adverse effects of instability in the capital movements on macroeconomic and financial stability, to provide more flexibility banks in their management of liquidity, and to strengthen the reserves of central bank (Alper, Kara, & Yorukoglu, 2013).

**FIGURE 2-7: CBRT Overnight Interest Rate**



Source: CBRT, 2020

Thus, the increases in interest rates in the early stages of the global crisis started to decline as a result of the CBRT's interest rate cuts (Rodrick, 2012). After these measures and the regulations to prevent possible impacts of the crisis, a remarkable improvement was seen on Turkish macroeconomic indicators: GDP growth increased to almost 9 % in 2010, inflation was around 7%.

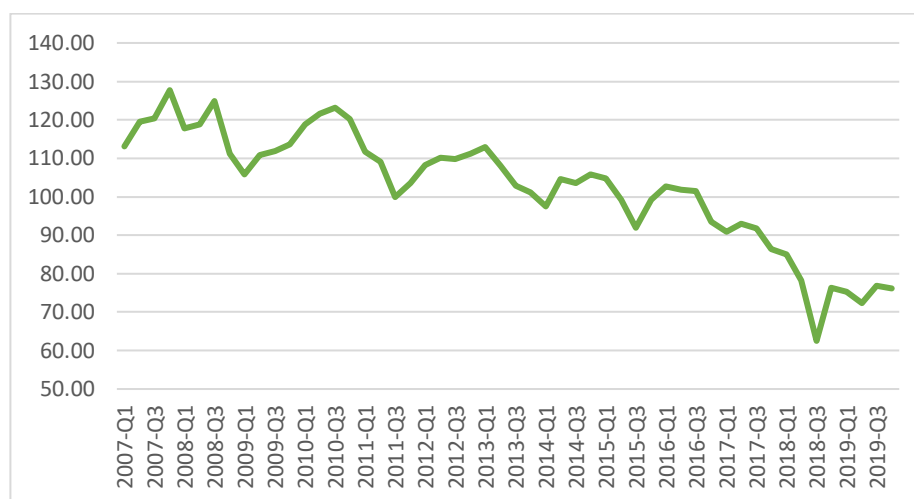
As a result of the policies, in the banking sector, credits to assets ratio increased to 56,11 in 2011 from 47,1 in 2009, the proportion of credit to deposit, which shows the stability in the banking sector increased by 8%. The response of the stock markets to the measures and general recovery in global economics was the increase in efficiency, depth, and stability, from 2008 to 2011. Price volatility decreased by almost 20%, while capitalization in stock markets increased from %18 to 40s %. Another critical improvement during these years was the establishment of the Financial Stability Committee in 2011, whose target was monitoring and preventing systemic risk and providing coordination under the risk management (CBRT, 2020) .

Despite the view that the adverse effects of the crisis were seen to be eliminated, unemployment stayed at high levels and could not be decreased. After 2015, the macroprudential policies of Central bank and the developmentalist economic approach of the President started to clash, and the interest rate policy of Central Bank has shown to be responsible for the low growth rates and high inflation (Yağcı, 2018). The Turkish Government has changed its neo-liberal policy framework and adopted a developmentalist economic regime

to prompt economic growth. The Government has conceived that the investment should be encouraged by the low-interest rates, which will be the fundamental contribution to the growth. Thus, in such a framework, the financial system has been expected to fulfill its exact function, which is funding the investment in the country. However, the increasing interest rates did not permit the encouragement of investment and growth. As a measure to this shortage in the economy, the government used the Credit Guarantee Fund to encourage small and medium-sized entrepreneurs in 2017 and 2018, which became relatively influential in increasing private investment.

The uncertainty, having risen primarily since the 2016 failed coup attempt and become serious currently, has increased the demand of the foreign investors for foreign exchange, which caused the value loss in Turkish lira. On the other hand, international developments such as trade wars between China and the USA, and the change in oil prices have contributed to the loss. Capital inflows have decreased, and interest rates has become higher and higher until the intervention of the Government in the Central Bank policy. As a result, CPI based real effective exchange rate index decreased from 86 in 2017 to 62 in the third quarter of 2018, and TL depreciated by %45 against USD, while depreciating by %41 against Euro (Figure 2-8).

**FIGURE 2-8:** Real Effective Exchange Rate in Turkey (CPI based): 2007Q1-2019Q4



Source: CBRT, 2020

Even though several measures were taken, the economic conditions could not be recovered, even got worse, and in 2018 Turkey drifted to an inevitable economic and financial crisis. In September 2018, New Economy Program, whose main target is established price stability in the short term, to maintain financial stability, to achieve economic balancing and

budget discipline, and to ensure sustainable growth was announced (BRSA, 2018).

**TABLE 2-9: New Economic Program Forecasts**

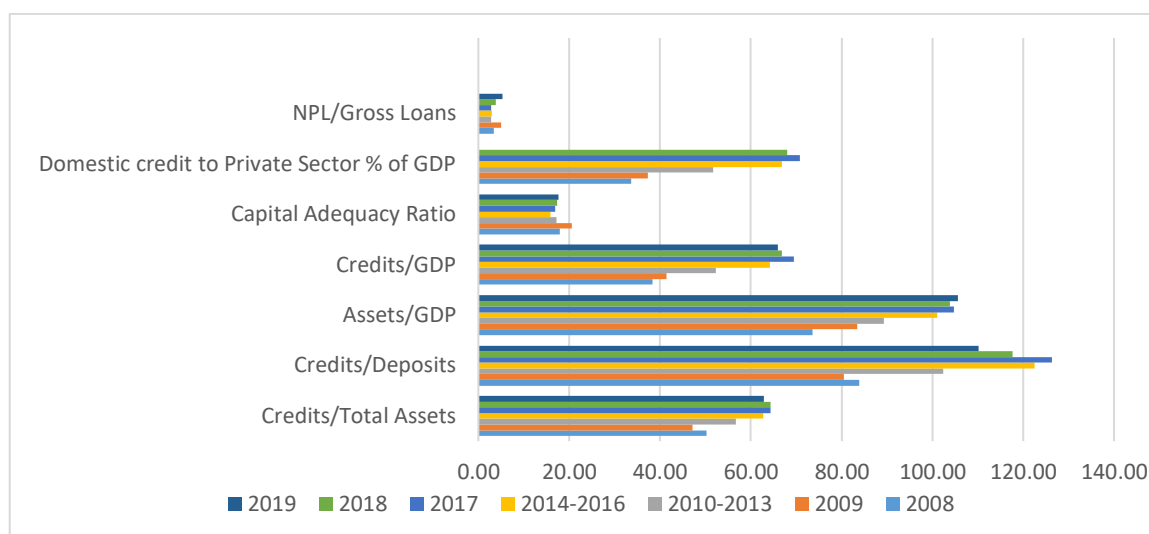
|                                       | <b>2018</b> | <b>2019</b> | <b>2020</b> | <b>2021</b> |
|---------------------------------------|-------------|-------------|-------------|-------------|
| <b>Growth</b>                         | 3.8         | 2.3         | 3.5         | 5.0         |
| <b>Inflation</b>                      | 20.8        | 15.9        | 9.8         | 6.0         |
| <b>Budget Deficit / GDP</b>           | 1.9         | 1.8         | 1.9         | 1.7         |
| <b>Current Accounts Deficit / GDP</b> | 4.7         | 3.3         | 2.7         | 2.6         |
| <b>Unemployment Rate</b>              | 11.3        | 12.1        | 11.9        | 10.8        |

Source: 11th Development Plan

After the declaration and implementation of the new program, despite the achievement of the objected inflation rate, growth rate, which was targeted to be 2.3, turned out to be 0,9 in 2019.

In July 2019, the head of the Central Bank had been changed due to the high-interest rates. After the change in the management of the Central Bank, interest rates started to decrease, and in the last quarter of the year, Turkey has grown 6%, and at the end of the year the growth rate has become 0,9. In the financial markets, the international political and economic environment, domestic political-economic problems, increasing instability and political risk have affected markets. The stock market, whose capitalization decreased to 21%, which is the lowest level since 2008 in 2018, started to pick up, and in 2019, capitalization has increased to 25% while volatility has decreased by almost 2 percent. Banking sector was also affected significantly by the 2018 shocks when the sector credits decreased by almost 2%, and NPL ratio increased to 3,9. On the other hand, the ratio of credit to deposit has decreased seriously in 2018. In contrast to the relative recovery in stock market in 2019, the banking sector could not develop. The ratio of non-performing loans has increased further and become 5%, while the proportion of credits to deposit has continued to decline. The credits also continued to decrease despite the measures taken.

**FIGURE 2-9: Banking Sector Landscape of Turkey: 2008-2019**

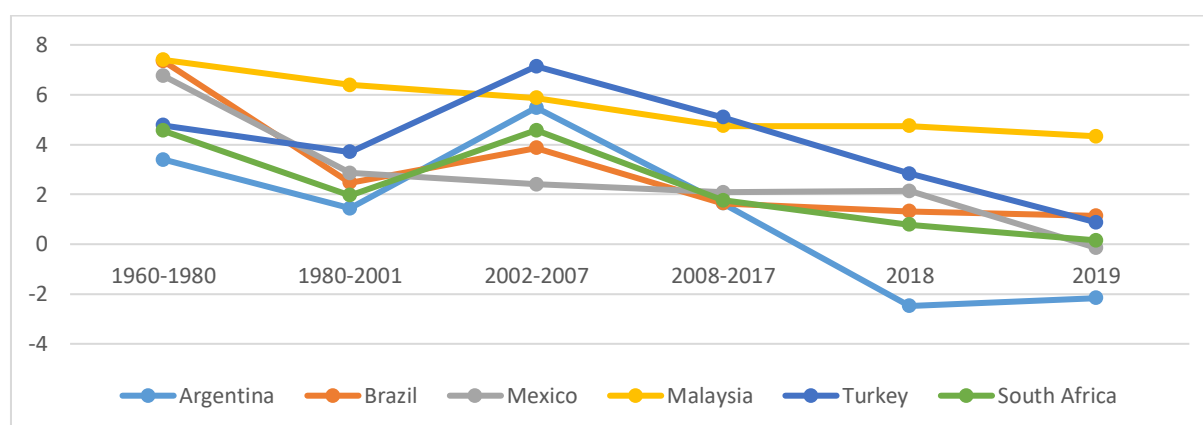


Source: EDDS, 2020; SBB, 2020

Consequently, the economic crisis, having started in 2018, has created a shock effect on both the banking sector and stock markets. Several measures have been taken, a new economic program for 4 years has been announced, increasing interest rates have started to be taken under the control, but the effects of the crisis have not disappeared yet. Despite the improvement in stock markets, the banking sector has been struggling with the crisis still by the end of 2019.

When we look at other developing countries' macroeconomic and financial conditions, firstly, it can be said that the growth rates have shown a similar trend, and the turning points, developments, and throwbacks have been experienced nearly at the same years for five selected developing countries.

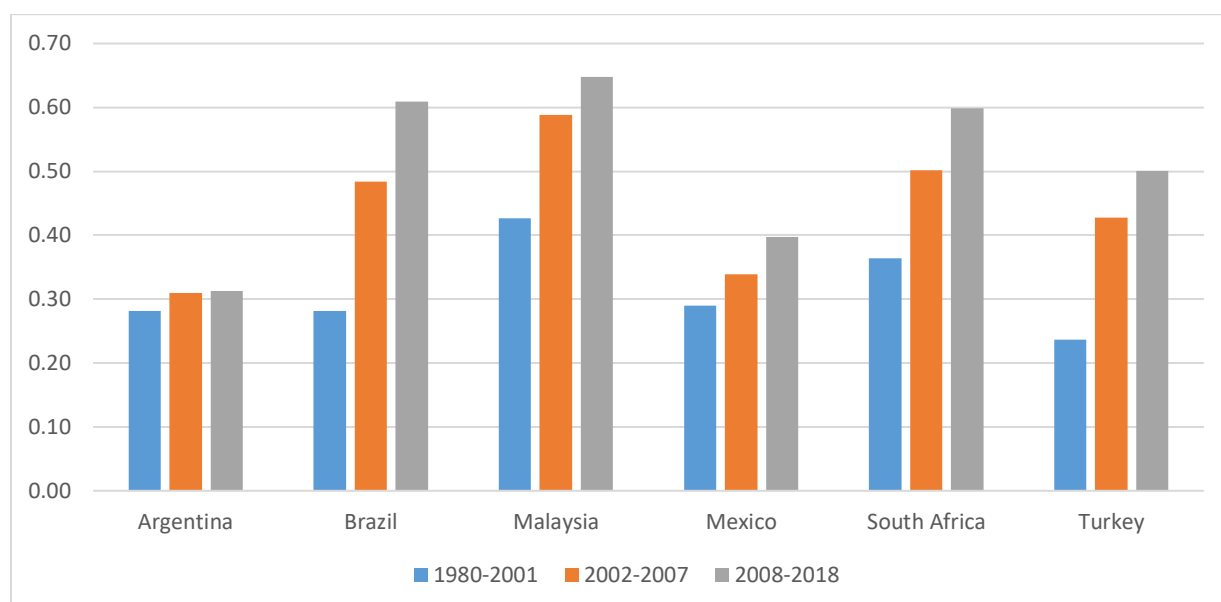
**FIGURE 2-10: Growth Rates of Developing Countries: 1960-2019**



Source: World Bank, 2020

Figure 2-10 indicates that Turkey has followed the global trend in economic conditions in a general manner. However, we can say that Turkey's growth rates have been higher than the other developing countries except Malaysia in each period. Turkey, which is one of the developing countries, having taken the advantage of abundant global liquidity between the years 2001-2008, has used it effectively and improve it more than others until the 2008 Crisis. It is seen that after the Global Financial Crisis, all of the selected countries have experienced a decline in growth rates, and the situation has gotten worsen for them except Malaysia after 2018 when a global recession has started.

**FIGURE 2-11: Financial Development Index for Developing Countries: 1980-2018**



Source: IMF, 2020

On the other hand, when we look at the financial development indexes, having consisted of financial access, depth, and efficiency, prepared by the IMF, it is seen that Turkey is pretty behind Malaysia, Brazil, and South Africa in the last period. Even though these countries have shown significant improvements after 2002, the Turkish Financial system's development had increased more than them. However, Turkey could not sustain this fast development process, and after the Global Financial Crisis, the financial system's development increased far less than the previous period. In the current situation, it is clear that the Turkish Financial System is relatively less developed than the others except for Argentina and Mexico that are in long-lasting recession too.

### **2.1.2. Regulatory and Supervisory Institutions of Turkish Financial System**

Regulatory and supervisory institutions are one of the key actors in financial systems. During the 1990s, when deregulation policies started to create severe financial crises in emerging economies, the significance of regulatory and supervisory institutions have begun to be noticed all over the world. The regulatory and supervisory institutions, having started to be realized as important actors after the crisis, have gained a significant place in the financial system. In this section, regulatory and supervisory financial institutions, having influenced the governance of the Turkish financial system, will be examined with their structures, development, responsibilities, and authorities.

There are four fundamental institutions that regulate and supervise the Turkish Financial System. The first one is the Central Bank of the Republic of Turkey, which was established in 1931 as an incorporated company and was the only authority along with the Treasury in the financial system until the 1980s. The Central Bank is responsible for taking regulatory measures to sustain financial stability, determining exchange rate regime, achieving low inflation and price stability, and supervising the overall landscape in the financial system. It is an independent institution that is entitled to direct monetary policy tools. After 2001 Financial Crisis, the independency of the bank has been increased, and its main policy has been determined as inflation targeting like other emerging economies.

The second principal regulatory institution of Turkish financial system is the Capital Market Board which was established in 1981 with the purposes of ensuring efficient and widespread participation of people in economic development by investing the savings in securities, regulating and supervising the capital market to operate in confidence, openness and determining and protecting the rights and benefits of savers (Sermaye Piyasası Kanunu, 1981).

With the adaptation of liberal policies in 1980, the mobilized capital movements made it compulsory to constitute an institution that will regulate and supervise the capital movements to provide fairness, efficiency, and transparency in the Turkish capital markets. And, CMB is the only regulatory and supervisory institution which is the responsible for the regulation and supervision of capital markets in Turkey.

The third regulatory and supervisory institution of the Turkish financial system is the Saving Deposit Insurance Fund, which was founded on July 22, 1983, within the body of Central Bank of the Republic of Turkey (CBRT) to insure the savings deposit. After the 1994

financial crisis, the responsibilities and authority of SDIF have enhanced. Improving and restructuring the financial position of banks when necessary has been added to these duties. In 2003, SDIF has gained an autonomous status and in 2005 the existing powers of SDIF has been enhanced again. It has become entitled to determine limit of insured deposit and the tariff, collection term, and mode of risk- based insurance premium (SDIF, 2020).

Finally, after the failed coup attempt in 2016, the task and powers of trusteeship in the companies to be assigned with a trustee have been transferred to the SDIF by Decree-Law. Today, the SDIF fulfills its duties, which can be collected as a summary under four titles: deposit insurance, resolution of banks, recovery, and trusteeship (SDIF, 2020).

The final regulatory institution in the Turkish financial system is the Banking Regulatory and Supervisory Association (BRSA). It has been established in 1999 after being noticed the lack of regulation and supervision in the Turkish Banking Sector as a result of the 94 Financial Crisis (BAT, 2008). The institution has been obliged and authorized to take the necessary decisions and measures to prevent any transactions and practices that may endanger the rights of the savers and the regular and safe operation of banks and cause significant losses in the economy, and to ensure the effective functioning of the credit system (Bankalar Kanunu, 1999).

Even though the BRSA was established in 1999, it could not commence operations until 31 August 2000. Even it started to operate; it was ineffective given the strong resistance of the bank lobbies against strong regulatory action. (Bakir & Onis, 2010). Both the BRSA and the SDIF have played significant roles during the restructuring process of the banking sector. Today, it is responsible for regulating the principles of setting up, managing, operating, transfer, merger, liquidation, and supervising banks.

In summary, the Turkish Financial system is directed by mainly the policies of the CBRT and the regulation and supervision of the banking sector and capital markets have been operated by the two principal institutions: the BRSA and the CMB. The banking sector is mainly regulated and monitored by the BRSA and SDIF which are the authorities responsible for the stability and the safety of the sector. On the other hand, CMB is the regulatory and supervisory body responsible for the capital market regulation in the Turkish financial system. The scope of authority of the all mentioned institutions and their formation process has been developed in accordance with periodical conditions and needs. Their significance in financial stability has been noticed especially after two serious crises which are 94 and 2001 financial crises. However, after the 2008 Global Financial Crisis, it has been understood that the existence and

operations of these regulatory institutions are not enough for preventing systemic risk in the financial system. The cooperation and coordination among these institutions and other actors of the system have come to the fore in the governance of the financial system.

## **2.2. Institutional Governance of Turkish Financial System Development**

Until this part of the study, the concepts of governance and financial development have been examined and an overview of the Turkish financial system has been done. In this section, we will investigate the institutional governance of the Turkish financial system from the framework we have drawn above. In this context, the developments, regulations, and organizations related to the financial system governance and their effects on financial development will be examined and discussed.

Turkey has experienced three major periods which have different political-economic characteristics. The common point of these three periods is that they have been organized by considering short-term developmental strategies and as a reaction to the last period's failures. The country first adopted an inward-looking import-substitution model from 1963 to 1979, a neoliberal export-led growth model from 1980 to 2001, and a neo-liberal austerity model from 2002 to 2016 (Akan, 2019). Financial system which has started to improve especially after the liberalization of the financial markets in 1980s has developed progressively during these periods, but it could not achieve its duty to transfer savings to the innovative investments which are crucial for sustainable economic growth.

The import-substitution strategy contributed economic growth by increasing industrial production during the years, but the increase in the production was not due to the efficient working of financial system. The main characteristic of the period is an over-autonomous state which mediated the transformation of resources to the determined sectors and actors. By the end of the period, which is resulted in a huge current account deficit, a totally different period which was dominated by the neo-liberal policies was started. The liberalization realized in an environment which is not legally and institutionally ready for the well-functioning market economy. This period ended with failures too because of the lack of supervision, legislation and regulation in the economy and financial system. During this period, the country has experienced three major financial crises which are 1994, 2000 and 2001 crises. The overall economy and the financial system were deregulated and left themselves. The reasons for all of

these crises was resulted by the lack of a reliable institutional infrastructure for the effective operation of a market-oriented economy and financial system (Onis, 2003). The financial system was not structured to encourage investments to contribute the growth and development. Instead, the financial system was dominated by the public banks and it was operated as a financier for the budget deficits. It is seen that the borrowing requirement was quite high, and the industrial growth was low during the neo-liberal period.

**TABLE 2-10: Macroeconomic Development in Turkey: 1960-2017**

| <b>Indicator</b>                                   | <b>1960-1980</b> | <b>1981-2001</b> | <b>2002-2019</b> |
|----------------------------------------------------|------------------|------------------|------------------|
| <b>GDP</b>                                         | 4,69             | 4,00             | 5,41             |
| <b>Industrial Growth</b>                           | 7,23             | 5,40             | 6,62             |
| <b>Inflation</b>                                   | 20,13            | 60,89            | 13,61            |
| <b>Total Domestic Savings (% of GDP)</b>           | 20,20            | 21,87            | 23,34            |
| <b>Total Fixed Capital Formation (% of GDP)</b>    | 21,90            | 21,27            | 23,83            |
| <b>Domestic credit to Private Sector(% of GDP)</b> | 17,65            | 17,61            | 37,34            |
| <b>Credit/Deposit</b>                              | 117,38           | 68,84            | 79,44            |
| <b>Stock Market Capitalization(% of GDP)</b>       | ...              | 14,02            | 26,53            |
| <b>Stock Price Volatility</b>                      | ...              | 15,90            | 24,78            |

Source: World Bank, 2020

When the period ended with the crisis, a new strategy has been adopted to overcome the results of the crisis and to prevent such crises. The new strategy was directed by the supranational financial institutions which are the IMF and the World Bank. Turkey has continued to implement the neo-liberal economic policies in an environment where the legal and institutional structure started to be strengthened. The governance of the economy and the financial system has focused on the need for regulation and supervision on the financial system and increasing the competitiveness. During this period, financial system and economy have shown improvement but, this was also a temporary progress because the financial system could not be governed as a financing mechanism for economic growth. There was disconnection among the actors of the system and differences among the targets and it was resulted in low savings and investment.

After the 2008 Global Financial Crisis, the shortcomings of the new political-economy strategy and the gaps in the governance have been appeared and the cooperation and coordination to prevent systemic risk at both domestic and international levels have gained importance. Turkey has attended this coordinative management process and integrated the international movements. Moreover, it has created several organizations and made several legal regulations to ensure efficiency and coordination in the governance of the system. However, these institutions, organizations and regulations have not been able to ensure the efficient transformation of financial resources to the real investments. The shortcoming of the economic governance of the country, having been hidden by the contemporary improvements in macroeconomic indicators, have become appeared with the decrease in global liquidity and in 2018 the country has started to experience a recession which has not lost its effects on economic and financial development still.

In next two sub-titles, we will investigate the recent developments, regulations and created organizations to compose efficient governance of the financial system and evaluate the current situation in the macroeconomic governance of financial development.

### **2.2.1. Developments and Regulations**

After the Global Financial Crisis, the global financial concern has shifted to preventing systemic risk by ensuring transparency, accountability and supervision of financial markets. Turkey, having started to regulate and supervise the financial system intensively after the 2001 Financial Crisis, has followed the regulations and developments occurring worldwide and has modified its governance strategy to these developments progressively.

Following the 2001 Crisis, Turkey has started to implement a governance strategy which is dominated by policies imposed by international financial institutions. Until 2014, the economic and financial developments were governed with the IMF programs and the efforts to achieve EU standards. The development programs and regulations were shaped for the purpose of preventing systemic risk which is occurred by the imperfections in financial markets and they aimed to sustain stability of financial system by providing transparency, accountability, well-functioning information exchange, taking precautionary measures, and establishing coordinative institutions (8. Kalkınma Planı, 2000; 9. Kalkınma Planı, 2006). In this context, in 2005, new Banking Law has been adopted. With this new law, it has been ensured that the regulatory and audit framework is further activated, the regulation and auditing stages are carried out on a consolidated basis in parallel with the consolidation trend emerging in the

financial sector, and corporate governance is improved in financial companies and the regulatory and audit authority (9. Kalkınma Planı, 2006).

The stress of the need for financial development in the form of a supportive channel for sustainable economic growth and development has been dominant after 2014 and become concentrated in 10<sup>th</sup> Development Plan. After the Global Financial Crisis, beside the 5 years development plans, middle term plans started to be prepared and the programs begun to emphasize the necessity of the efficient transformation of savings to innovative and technological investments in financial system. Furthermore, several priority transformation programs have been prepared to fill the gaps in the economic and financial governance. The main stress has been establishing interoperability of the public institutions and increasing and transferring savings to generative investments (10. Kalkınma Planı, 2014). Furthermore, priority transformation programs have been arranged to solve structural and critical problems in the system and to achieve sustainable growth which will reach the country to 2023 targets. Istanbul International Finance Center (IFC) is one of these priority programs which aims to bring financial institutions and representatives together and provide more efficient services. The IFC has been admitted in 2009 to realize the aim of making Istanbul an international financial center which was mentioned first in 9<sup>th</sup> development plan. The program seeks to set a transparent market structure that satisfies the demands of the real sector, and that any financial instrument can be exported, has a strong physical, human, and technological infrastructure, and is effectively managed. Even if it has been admitted in 2009, the construction of the center has not finished yet due to the recent economic, political, and international problems. However, according to the last announcement of the treasury and finance minister, the physical building of the center' will be completed by the beginning of 2022, while the legal and regulatory framework will be complemented much earlier.

Another priority transformation program that is involved in the 10th development program is the Program for Increasing Domestic Savings and Preventing Extravagance. The acceleration of capital accumulation and industrialization process in the tenth development plan; increasing the efficiency levels of national savings, productive investments and production factors; it is aimed to permanently reduce the current account deficit to reasonable levels and transform the economy into an innovative and reduced import dependency structure with this program (Karagöl & Özcan, 2014, p. 21) . Accordingly, it is aimed to increase the national savings rate to 19 percent at the end of the 2014-2018 period with the Program for Increasing Domestic Savings and Preventing Extravagance (10. Kalkınma Planı, 2013). Despite the relative improvement in domestic savings, the expected stable saving rate has not been able to be

achieved yet. The government has started to use the Credit Guarantee Fund intensively to provide credit expansion and stimulate small and medium enterprise (SMEs) affected seriously by the worsening macroeconomic and financial conditions by the beginning of 2018. However, the existing implicit problems have appeared as a result of the compelling of the economy to grow above its potential and the economy has dragged to a long-term recession.

In conclusion, the governance of financial development in the meaning of providing an environment in which financial development contributes to innovation, and production, which will decrease the current account deficit by increasing the high tech, export could not be achieved from the 1960s so far. Until 2001, the structural problems and the institutional shortcomings prevented the development in the financial sector and created serious crises. After 2001, the problems were eliminated, but the process of transformation of financial improvement to real sector investments could not be achieved. The programs and targets were set according to this aim, but the implementation of the policies could not be successful. As well as the financial system could not develop, the macroeconomic conditions worsened, and the economy dragged into a recession as a result of the failure in macroeconomic and financial governance.

### **2.2.2. Organizations**

After the Global Financial Crisis, the main concern about financial markets has been the potential of systemic risk and prevention of it. Accordingly, sustaining the cooperation and information exchange among the financial authorities has become one of the major targets of the international and national financial governance processes. Several global and national organizations have been created with the aim of preventing systemic risk and increasing the efficiency and safety of financial markets. On the other hand, with the increasing emphasis on the contribution of financial development to sustainable economic growth, the existing organizations have been structured to manage the financial development and its transformation to the economic development while some new organizations have been created recently

There are several national financial organizations that are important for the governance of the financial system and development in Turkey. Most of these organizations have started to be established by the beginning of 2012, when the strategy of the Turkish government began to shift towards a developmental growth model. Some of these organizations are Systemic Risk Assessment Group, Association of Financial Institutions, Republic of Turkey Presidential Financial Office, and Financial Stability and Development Committee.

- **Systemic Risk Assessment Group:**

Systemic Risk Assessment Group was established to contribute to the cooperation and coordination among relevant institutions on systemic risk in 2012. The Group was created to enhance the coordination, cooperation and exchange of information between the BRSA, the Undersecretaries of Treasury, the CBRT, the CMB and the SDIF in order to identify potential developments that may cause systemic risk in a timely manner and take necessary measures (Türker, 2015). It has been foreseen that the group will be held 4 times in a year and whenever there is need. Additionally, The Systemic Risk Monitoring Permanent Sub-Working Group operating under the responsibility of the CBRT and the Permanent Sub-Working Group for Crisis Management and Resolution under the responsibility of the BRSA have been established to support SRDG activities.

In 2018, FinTech Working Group, which is thought to contribute to the realization of the ecosystem components and needs that are necessary for the development of the financial technology sector, as well as the appropriate environment, support and essential arrangements, was established under the SRDG (ODED, 2018).

- **Association of Financial Institutions**

Association of Financial Institutions, which is it is an umbrella organization of the sectors' union that are Financial Leasing, Factoring, and Financing Companies, being included in all three channels consisting of the production, sales, and consumption of Turkey's economy was constituted in 2012. It consists of 91 companies working in the mentioned areas. Some important duties and responsibilities of the Association are supporting rising the strength of the related sectors in international competitiveness, ensuring the establishment, placement, and observance of the own occupational standards of the sectors Financial Leasing, Factoring, and Finance Companies, identifying professional principles and standards to be observed by the members, taking and implementing all necessary measures to prevent unfair competition between its members, and ensuring cooperation among members for joint projects (Association of Financial Institutions , 2020).

The association has been attending the workshops held by the financial public organizations and it is active in the process of Istanbul International Finance Center Project. In this manner, the association is significant for the Turkish financial market development and its contribution to economic growth and development.

- **Republic of Turkey Presidential Finance Office**

Republic of Turkey Presidential Finance Office was established as having a particular budget, public legal personality, administrative and financial autonomy, under the Presidency of the Republic of Turkey by the presidential decision in 2018. The head of the office is the highest administrator of the office and is responsible to the President for the general management and the office representation. The duties of the office are monitoring national and international banking and financial planning and reporting on doing analyzes, reporting the briefings among Turkey's financial markets, diversification of financial resources and doing research for ensuring international fund inflow, and carrying out the Istanbul Finance Center project and following the developments.

According to the decision the office is authorized to organize and collaborate with all entities and organizations in matters falling within its area of duty, to hold meetings or other organizations appropriate for this purpose (1 Numaralı Cumhurbaşkanlığı Kararnamesi, 2018). In 2019, the duties of the presidential offices have been enhanced and 6 departments under the finance office have been created for its efficient working (48 Nolu Cumhurbaşkanlığı Kararnamesi, 2019). The presidential Finance Office has an important position for the effective working of the financial system and the economic system. After the transformation to the Presidency Government Model, the coordination problems were the main shortcomings of the new system. Thus, the existence of the finance office is significant for providing effective transformation of financial development to economic development and for supervising this transformation.

- **Financial Stability and Development Committee**

In 2012, the Financial Stability Committee consisting of the Undersecretary of Treasury and the Heads of the Central Bank, BRSA, CMB, and SDIF, was established in line with the developments in the international platform and the needs that emerged after the global crisis. The main responsibility of the Committee was determined as providing coordination in the field of risk management and preventing systemic risk. It consisted of the Committee are the Undersecretary of Treasury, Governor of the CBRT, Chairmen of BRSA, CMB, and SDIF. The responsibilities of the Financial Stability were determining the necessary measures and policy suggestions for determining, monitoring and reducing the systemic risks that can affect the entire financial system, warning the relevant units about systemic risks, and to follow the practices regarding warnings and policy recommendations, evaluating the systemic risk

management plans to be prepared by the relevant institutions, ensuring coordination regarding systemic risk management, and providing all kinds of data and information from public institutions and organizations regarding the field of duty, ensuring the coordination of policies and practices among institutions (CBRT, 2020).

In 2019, the related law has been amended, and the Financial Stability Committee has been replaced with the Financial Stability and Development Committee by article 21 of the Law on Amending Tax Laws and Certain Laws and Decree Laws. According to the new legislation, the Financial Stability and Development Committee has been established with the aims of managing systemic risks in order to protect trust in markets and ensuring the financial system's healthy support of economic growth, providing harmonization of financial regulations and practices, and establishing cooperation to increase coordination with the real sector (Finansal İstikrar ile Bazı Düzenlemeler Hakkında Kanun 2019).

The change in the political economy strategy of the government from the neo-liberal austerity to the developmental growth has increased the interest of the government in the contribution of financial development to economic growth. In this manner, the construction of the Financial Stability and Financial Development Committee is significant for the institutional governance of financial development.

## **CHAPTER THREE**

### **THE RELATIONSHIP BETWEEN INSTITUTIONAL GOVERNANCE AND FINANCIAL DEVELOPMENT IN TURKEY: EMPIRICAL RESULTS**

This chapter aims to empirically analyze the direction of causation between variables and determine the effect of macro-financial governance and macro non-financial governance on the development of the banking sector and financial markets for the period between 1992Q1 and 2019Q4 by using time series analysis for Turkey. The analysis will be run for two sub-periods, which are 1992Q1-2001Q4 and 2002Q1-2019Q4. We will analyze the period under two sub-periods because in 2001 Turkey has experienced a devastating financial crisis, which has been a turning point for Turkish economy and financial system. Additionally, we have applied the analysis for the banking sector and markets separately to be able to determine the effect of institutional governance separately for both. Even though the Turkish financial system is bank-based, the relationship between governance and stock market development would tell us the elasticity of the markets to the institutional governance, and in the case of its right governance, how much it can be developed and contribute to economic growth. In this context, while the first section demonstrates the theoretical basis and related literature, section 3.2 empirically studies institutional governance and financial development relation for Turkey by using econometric methods.

#### **3.1. Theoretical Basis and Related Literature**

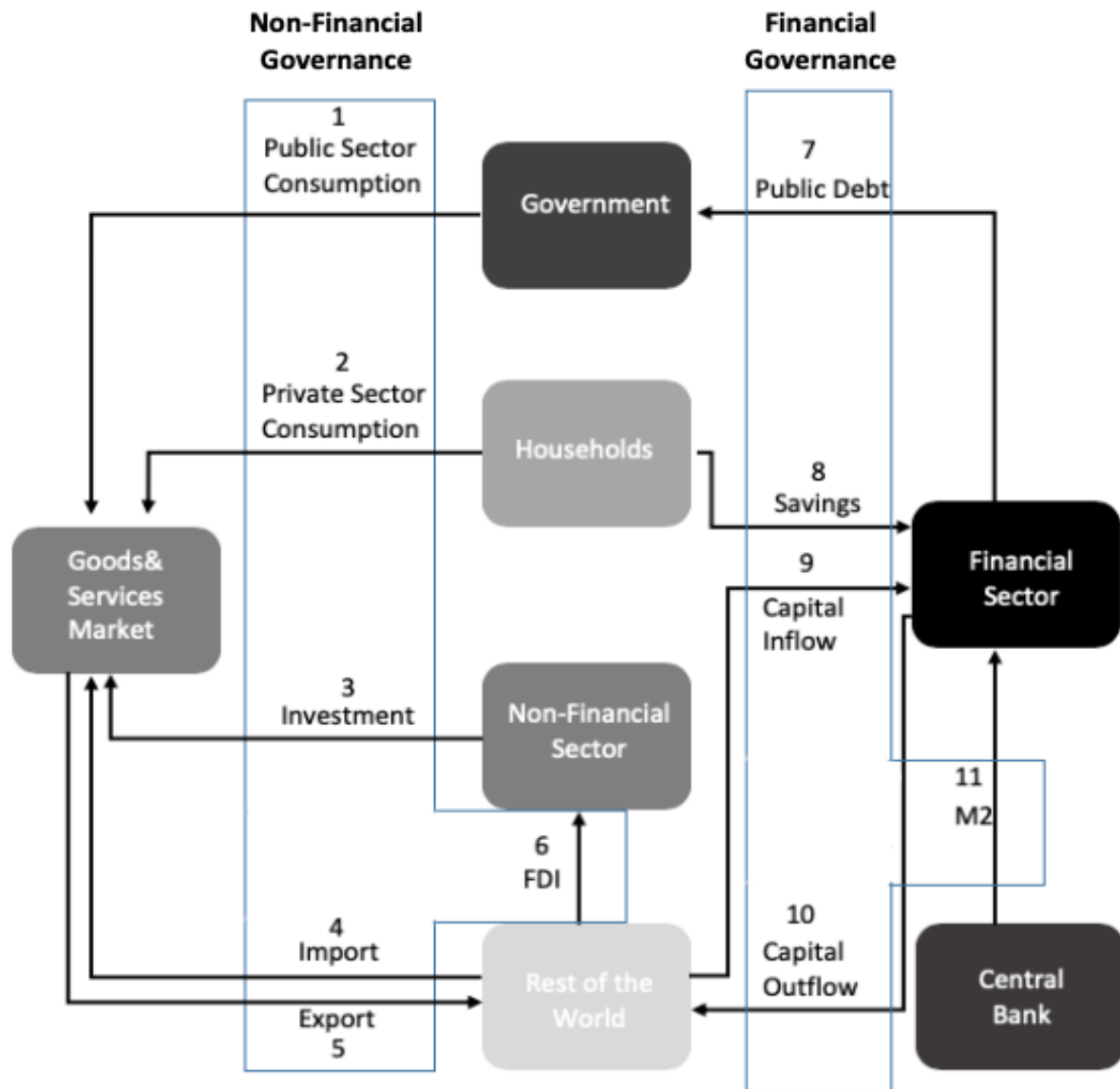
As has been explained above, there are several approaches to the definition of institutional governance. The conventional approach to institutional governance is dominated by the thought explaining institutions in terms of a political and economic environment that is provided to the market actors. In this manner, there are several institutional governance indicators such as political stability, the rule of law, democracy, and accountability. According to this approach,

the economic agents who have the intelligence will do maximize their profit in an economic circumstance in which their rights are protected by the rule of law, democracy, and contractual arrangements (Beck & Levine, 2005). On the other hand, it is expected that democracy and the rule of law will prompt the productivity of the agents because they will have a guarantee in a legal framework (Yang, 2011). There are lots of studies examining the impact of such an institutional framework on financial development (Acemoglu & Johnson, 2005; Haggard, MacIntyre, & Tiede, 2008; Marcelin & Mathur, 2015; Law & Azman-Saini, 2012).

In this study, we will handle institutional governance from the perspective of accepting institutions as the elements that sustain economic activity and bound actors and markets each other. We will look at whether there is a relationship between financial development and institutional governance in a framework that governance is tackled as the management of the economy in a broader structure in which the actors of the system work in coordination and under the predetermined rules. Institutional governance will refer to the coordinative management of the economic institutions such as consumption, investment, savings, portfolio investment, that intermediate between the actors and markets in order to realize pre-determined targets and achieve sustainable economic development (Akan, 2020). For instance, from this perspective, public debt is an institution functioning and mediating between the government and financial sector, or M2 is the institution determining the relation between Central Bank and financial markets. On the other hand, portfolio investment is an institution providing the intermediation between the financial sector and the rest of the world (Akan, 2020).

Non-financial firms are known to make real investments in the goods and services market, while financial business, whose primary function is to provide sources to the non-financial sector for the investments, market make financial investments (Krugman, Wells, & Robin, 2015, p. 193). Macro financial flows consist basically of money (stock), public debt, aggregate savings, and portfolio investment as the sum of inflows and outflows. On the other hand, macro non-financial flows comprise government expenditures, private investment expenditures, private consumption expenditures, international trade as the sum of exports and imports, and foreign direct investment (FDI) as the sum of inflows and outflows (Akan, 2020). On the left side of Figure 3-1, macro non-financial flows/institutions, which are public sector consumption, private-sector consumption, private investment, and exports & imports, are shown, while the right side of the Figure indicates macro-financial flows/institutions (Akan, 2020).

**FIGURE 3-1: Financial and Non-Financial Governance**



Source: Akan, “Does Governance Matter For Coronavirus Economy?: Lessons from Macroeconomic and Financial Governance in Germany, 1950-2019,” 2020, Furthercoming.

The organization of the macro-markets depends partially on the type of economic transaction (Jespersen, 2009). The institutions indicating the flows realizing between the actors and the markets are highly influential on the organization and functioning of the markets. The macro-financial governance, then, is the coordinative management of the financial flows occurring among the financial actors, while non-financial governance is the coordinative administration of the flows realizing between the government, households, non-financial sector,

rest of the world and goods & services market. Since the financial and non-financial institutions, can be suggested to mediate the relationship between economic actors, it is accepted that how these institutions are governed or organized is a key determinant of the overall economic performance in a country (Akan, 2020). Thus, the financial system's performance is also affected by the governance mechanisms, which refers to the ability of the political system to formulate and implement policies in the collective interest (Haldenwang, 2005). In the case that the political authorities formulate proper policies and govern the financial and non-financial institutions/flows with respect to the common aims such as financial advancement or advent in the contribution of financial development to economic development, it is expected that the non-financial governance and financial governance have positive effects on financial development and economic growth. On the other hand, it is another possibility that the authorities do not formulate a strategic policy to realize the predetermined purposes, and there is no relationship between the governance mechanisms and financial development.

There are a couple of empirical studies that formulate the macroeconomic governance mechanism from the perspective we have employed in the study. Firstly, Akan et al. (2020) have tested the long-run mutual relationship of Financial and Non-Financial Governance variables with financial development for the United States in their study "The Three Roles of Finance in the US Economy, 1952-2019" by using time series analysis. They have concluded that during the years between 1952 and 1972, there has been a systemic mode of governance in the US, and non-financial governance positively affected financial development while financial governance negatively affected. On the other hand, they have detected that financial development positively affected financial and non-financial governance, which has indicated that financial development stimulated both financial and real economic activities in the US during the era. However, this systemic mode of governance has turned into an institutional trap between the years 2007-2019 when the long-run relationship between the variables has disappeared (Akan et al., 2020). Another study that employed financial and non-financial governances as independent variables to determine their relationship with economic performance is "Explaining U.S. Economic Growth by the Governance of Macroeconomic Institutions, 1952-2019", having made by Akan, Hepsağ, and Bozok in 2020. They have tested the relationship between economic governance and economic performance by employing Johansen cointegration analysis and vector error correction mechanism, and they have concluded that higher economic performance of 1952- 1973 era is interrelated with systemic mode of governance, 1973-2007 and 1980- 2007's lower economic performance is due to institutional fragmentation, and finally, the sharp decrease in the economic conditions after

2007 is due to the institutional trap<sup>1</sup>.

In this context, we will investigate the effect of macro-financial and macro non-financial governances on Turkish financial sector development for two periods, which are 1992Q1-2001Q4 and 2002Q1-2019Q4 that represents two different governance modes. In the first period, the overall economy and financial system were organized as a market economy, which was extremely deregulated, the financial system was operated as a funding mechanism for substantial budget deficits, and there was lack of strategic management of the macroeconomic policies (Akyüz & Boratav, 2003). In the second period, which starts after the most devastating financial crisis of the country, deregulation has been replaced by the regulations and supervision in the banking system (Bakir, 2009). Economic growth and financial system functioning have gone well until 2016 when the uncertainty in the politics and economics of the country has started to increase rapidly with the contribution of the failed coup attempt. However, after that, the adverse movements on the macroeconomic and financial indicators could not be prevented since the structural and institutional problems of the macroeconomic and financial system have not been solved. Thus, we will analyze how macro-financial and non-financial governance affected the banking sector development and stock markets' development throughout two periods, and whether the regulation and supervision which have been adopted after 2001 have been contributed to financial development through the macro-financial and macro non-financial governance.

### **3.2. Econometric Application and Empirical Results**

In this chapter, an econometric study by using time series analysis for Turkey is provided to understand the relationship between institutional governance and financial development better. For analyzing the effect of institutional governance on financial development, we will employ two separate models. The first model will look for financial and non-financial governance on banking sector development. The second model will investigate the effects of the financial and non-financial governance on stock market development. Analysis of the data will be carried out by using the ARDL Bounds Test and Error Correction Model because of the reasons which will be explained below.

Throughout the section, initially, econometric methodology and data which the study employs will be explained. After the explanations of the methodological process and data, the

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<sup>1</sup> For the concepts of systemic governance, institutional fragmentation, and institutional trap see Akan, 2018 "The Complementary Roots of Growth and Development".

analysis will be realized by using the selected methodology. Finally, the outcomes of the investigation will be presented and interpreted.

### **3.2.1. Data**

Time series analysis, which is used in this study, covers quarterly data from 1992Q1 to 2019Q4, which is collected from EDDS of CBRT, IMF, Stock Exchange Istanbul, and Bloomberg. All of the variables used in the model are constructed by using Principal Component Analysis (PCA), which is widely used in time series analysis to create an index variable out of more than one. There are several studies in the literature using PCA to construct financial development variable (Pradhan, Arvin, Bahmani, Hall, & Norman, 2017; Feridun & Jalil, 2011; Soytaş & Küçükkaya, 2011). In this context, each of the Market Development (MDV), Banking Sector Development (IDV), Non-Financial Governance (NFGV), and Financial Governance (FGV) are made up of several variables. Firstly, The NFGV consists of government purchases (consumption and investment expenditures, private consumption expenditures, international trade as the sum of exports and imports, and foreign direct investment (FDI). The FGV consists of broad money (M2), public debt, and net portfolio investment (Akan, 2020).

Banking sector development, whose abbreviation is IDV, is defined as the process of developments in the depth and stability of the banking sector. The process includes the ratio of private sector credits to total credit volume and credit to deposit ratio. Likewise, stock market development (MDV) is also defined as the process of improvements in the depth and stability of stock market development. In this context, it consists of stock market capitalization and stock price volatility.

All of the data for the FGV has been taken from EDDS of CBRT. When it comes to the components of IDV, the data belongs to private sector credit/total credit volume, and bank credits/bank deposits also have been taken from EDDS. On the other hand, stock market capitalization has been obtained from Stock Exchange Istanbul, and Stock Price Volatility has been taken from the Bloomberg database.

**TABLE 3-1:** Selected Measures for Financial Development, Financial Governance, and Non-Financial Governance

| Abbreviation | Variable                   | Indicator                                     | Source         |
|--------------|----------------------------|-----------------------------------------------|----------------|
| <b>MDV</b>   | Stock Market Development   | Stock Price Volatility                        | Bloomberg      |
|              |                            | Stock Market Capitalization                   | Borsa Istanbul |
| <b>IDV</b>   | Banking Sector Development | Bank Credit/Bank Deposit                      | EDDS           |
|              |                            | Private Sector Credits by Deposit Money Banks | EDDS           |
| <b>FGV</b>   | Financial Governance       | M2                                            | EDDS           |
|              |                            | Debt Stock                                    | EDDS           |
|              |                            | Portfolio Investment                          | EDDS           |
| <b>NFGV</b>  | Non-Financial Governance   | International Trade (X+M)                     | IMF            |
|              |                            | Final Consumption Expenditure, Public Sector  | IMF            |
|              |                            | Final Consumption Expenditure, Private Sector | IMF            |
|              |                            | Gross Fixed Capital Formation                 | IMF            |
|              |                            | FDI                                           | EDDS           |
|              |                            |                                               |                |

The data for NFGV, except FDI has been received from the IMF International Financial Statistics Database, and FDI has been taken from EDDS. Additionally, the data belonging to the M2, debt stock, M2, public and private sector consumptions, stock market capitalization, Private Sector Credits by Deposit Money Banks, Gross Fixed Capital Formation, and International Trade (X+M) have been seasonally adjusted.

The reason why IDV and MDV involve only financial stability and financial depth variables is that efficiency data for the banking sector for the period we have chosen is not completely available. Financial Efficiency data for markets has not been included either to be able to ensure consistency in the content of financial development variables. Thus, financial development will represent only financial stability and debt measurements in the model.

### 3.2.2. Methodology

In the study, Autoregressive Distributed Lag (ARDL) procedure, which was introduced by Pesaran et al. (2001), will be used to test the long-run equilibrium relationship between financial development and the variables of financial governance and non-financial governance for both banking sector and financial markets. The most significant advantage of the ARDL approach is that it makes it possible to look for cointegration between the variables which are integrated into different orders besides the variables purely integrated to 0 or 1 (Pesaran, Shin, & Smith, 2001). Pesaran and Shin (1995), stated in their study of An Autoregressive Distributed Lag Modelling Approach to Cointegration Analysis:

“The ARDL-based approach to estimation and inference, and the fully-modified OLS procedure are both asymptotically valid when the regressors are  $I(1)$ , and a choice between them has to be made on the basis of their small sample properties and computational convenience.” (Pesaran & Shin, 1995)

Thus, an autoregressive distributed lag (ARDL) model is an ordinary least square (OLS) based model which is applicable both for non-stationary time series and mixed order time series (Pesaran, Shin, & Smith, 2001).. After the cointegration test with the ARDL approach, we will continue with the ECM, which can be derived from ARDL through a simple linear transformation to determine the relationships among the variables and their directions. The advantage of the ECM is that it combines short-run dynamics with long-run equilibrium without missing long-run information and avoids the problem of the spurious relationships arising from non-stationary time-series data (Shrestha & Bhatta, 2018).

The logic behind the ARDL Bounds Test is that it implies that if there is cointegration between the variables which can be ordered to different levels except 2, their combination will be stationary at level  $I(0)$ . Generalized ARDL (p, q) model for the banking sector and markets' development is specified as:

$$IDV_t = \gamma_0 + \delta_j IDV_{t-1} + \beta_{1j} FGV_{t-1} + \beta_{2j} NFGV_{t-1} + \varepsilon_{jt}$$

$$MDV_t = \gamma_0 + \delta_j MDV_{t-1} + \beta_{1j} FGV_{t-1} + \beta_{2j} NFGV_{t-1} + \varepsilon_{jt}$$

where  $IDV_t$  and  $MDV_t$  are the vectors, the variables  $FGV_{t-1}$  and  $NFGV_{t-1}$  are allowed to be purely  $I(0)$  or  $I(1)$  or cointegrated;  $\beta$  and  $\delta$  are coefficients, and  $\varepsilon_{jt}$  is the white noise vector of

the error terms.

ARDL Bounds Test is principally based on joint F statistic under the null hypothesis that there is no cointegration (Belloumi, 2014). I(0) bounds are obtained by assuming that all of the variables are integrated to order 0, and I(1) bounds are created by considering all of the variables in the model are integrated order 1. The null hypothesis of no cointegrations is rejected if the calculated F statistic is above the I(1) bound, while it cannot be rejected when the F statistic is below the I(0) bound. Additionally, if the calculated F statistic is between the I(0) and I(1) bounds, it is understood that the result is not conclusive (Akinlo, 2008).

After implicating the ARDL bounds test, if there is long-run causality, we will run the Error Correction Model (ECM), which is an appropriate reparameterization of the general ARDL model (Asteriou & Hall, 2007, p. 311). The generalized ECM for banking sector development and stock market development is specified as:

$$\Delta IDV_t = a_{01} + \sum a_{1i} \Delta IDV_{t-i} + \sum a_{2i} \Delta FGV_{t-i} + \sum a_{3i} \Delta NFGV_{t-i} + \lambda ECT + \varepsilon_{1t}$$

$$\Delta MDV_t = a_{01} + \sum a_{1i} \Delta MDV_{t-i} + \sum a_{2i} \Delta FGV_{t-i} + \sum a_{3i} \Delta NFGV_{t-i} + \lambda ECT + \varepsilon_{1t}$$

where ECT is the error correction term which consists of the OLS residuals series omitted from the long-run regression represents the long-run elasticity between dependent and independent variables (Pak & Ku, 2017). The term's coefficient also provides information about the speed of adjustment when there is disequilibrium. Thus, we will use ECM if there is cointegration between the variables, which will be seen with the bounds test results. We will decide if the deviations are adjusted to equilibrium in the long-run by checking the error correction term (ECT). The ECT is expected to produce statistically significant negative coefficients in order to be reliable (Solarin, Al-Mulali, & Ozturk, 2007).

In the study, we will run two models for two periods. In this framework, there will be four model analyses, which are IDV and MDV for 1992Q1-2001Q4 and 2002Q1-2019Q4. We will look for the cointegration among the IDV, FGV and NFGV, and MDV, FGV, and NFGV for the cited periods.

In this context, after the determination of the integration levels of the variables by ADF and PP tests, we will apply the ARDL bounds test to determine the long-run causality to all four models. After determining the existence of cointegration among the variables, we will check the stability of the models by using CUSUM and CUSUM SQUARE tests which are

represented graphically by two straight lines that are bounded by the 5% significance level and expected to stay between these lines to be able to be stable (Brown, Durbin, & Evans, 1975). After determining cointegration and checking the stability of the models, we will run the ECM to decide whether the deviations converge to the equilibrium in the long-run. Finally, we will interpret the levels equation coefficients, which are long-run coefficients of the variables to determine whether they are statistically significant and positive or negative in the case the ECTs are statistically negative.

### **3.2.2.1. Unit Root Tests**

Since non-stationary variables create spurious regression results, the first step of the analysis is determining the stationarity of each variable by using Augmented Dickey-Fuller (ADF) and Phillips Perron (PP) unit root tests. As well as the non-stationarity is important for preventing spurious regression, the integration levels of the variables are essential to satisfy the conditions of the ARDL procedure. As it has been stated above, the ARDL procedure is applicable in the cases that the variables are integrated purely to 1, purely to 0, or 0 and 1 together. However, in the case that one of the variables is integrated to order 2, it is not possible to implement the ARDL procedure (Pesaran & Shin, 1995). Thus, we should be sure that the variables employed in the models are not integrated order 2.

ADF test, having been developed by Dickey and Fuller in 1981, is used to check whether there is a unit root in the case that there is serial correlation in the series by allowing the lags of the dependent variable to be involved in the unit root test while PP test, having been advantageous since it is not sensitive to the heteroscedasticity forms in the error terms, uses nonparametric methods to handle with serial correlation without adding lagged difference terms while checking of the unit root (Gujarati & Porter, 2009, p. 757).

The results of both tests for our sample data and four variables are represented in Table 3-2 below. Both ADF and PP have been applied with the trend and intercept model because the variables have shown trend in the graphs.

**TABLE 3-2: Unit Root Test Results**

| <b>Variable</b> |                                      | <b>ADF</b>    | <b>PP</b>       |
|-----------------|--------------------------------------|---------------|-----------------|
| <b>IDV</b>      | <b>Level</b>                         | -1.623429(1)  | -1.615665 (3)   |
| <b>MDV</b>      |                                      | -5.025790(0)* | -4.871296 (3)*  |
| <b>FGV</b>      |                                      | -0.534582(7)  | -4.549377 (7)*  |
| <b>NFGV</b>     |                                      | -0.445381(0)  | 0.522482 (18)   |
| <b>IDV</b>      | <b>1<sup>st</sup><br/>Difference</b> | -7.944365(0)* | -7.944365 (0)*  |
| <b>MDV</b>      |                                      | -             | -               |
| <b>FGV</b>      |                                      | -4.354388(6)* | -               |
| <b>NFGV</b>     |                                      | -12.48611(0)* | -14.27086 (17)* |

Note: MacKinnon critical values at %1, %5, and %10 significance levels for ADF test are orderly in the model with trend and intercept are: -4.043609, -3.451184 and -3.150986. \* denotes significance at the 1% level. The Figure in the parenthesis is the optimal lag structure for ADF determined by the SIC and for PP determined by Newey-West.

As displayed in Table 3-2, we are unable to reject the null of unit root for all the series except MDV according to the ADF Test results when their level forms are examined since the absolute value of the test statistic is below the absolute of the critical values. These three variables, which are IDV, FGV, NFGV, have become stationary at the first difference, and we can reject the null at first difference. The null hypothesis is rejected for the MDV at the level according to the ADF results. When we examine the PP Test Results, it is seen that we can reject the null hypothesis of unit root for the variables MDV and FGV at the level and for IDV and NFGV at first difference. In summary, IDV, FGV, and NFGV are integrated order one while MDV is integrated order zero according to the ADF test results. On the other hand, MDV and FGV are integrated order zero, and IDV and NFGV are integrated order one with respect to the PP test results. In both cases, any of the variables is not integrated order 2, and the variables are not integrated into the same orders. Hence, we can confidently use the ARDL bounds test for co-integration.

### 3.2.2.2. ARDL Bounds Test and Long Run Coefficients

After observing that the variables are not integrated order 2, we can implement the ARDL Bounds test. The ARDL process includes two principal steps, which are determining the existence of long-run relationships between the variables and estimating the long-run and short-run coefficients of the same variables (Pesaran, Shin, & Smith, 2001). The ARDL Bounds test, which is reported in Table 3-3, indicates that the F statistics (11.60341) is above the critical values at a 1% significance level (5.15) when the independent variables are FGV and NFGV and the dependent variable is MDV between the years 1992Q1-2001Q4. On the other hand, in the same years, there is no cointegration when the dependent variable is IDV since the F statistics (1.544992) is below the critical values at 10% significance level critical values (3.17).

**TABLE 3-3: ARDL Bounds Test Results (1)**

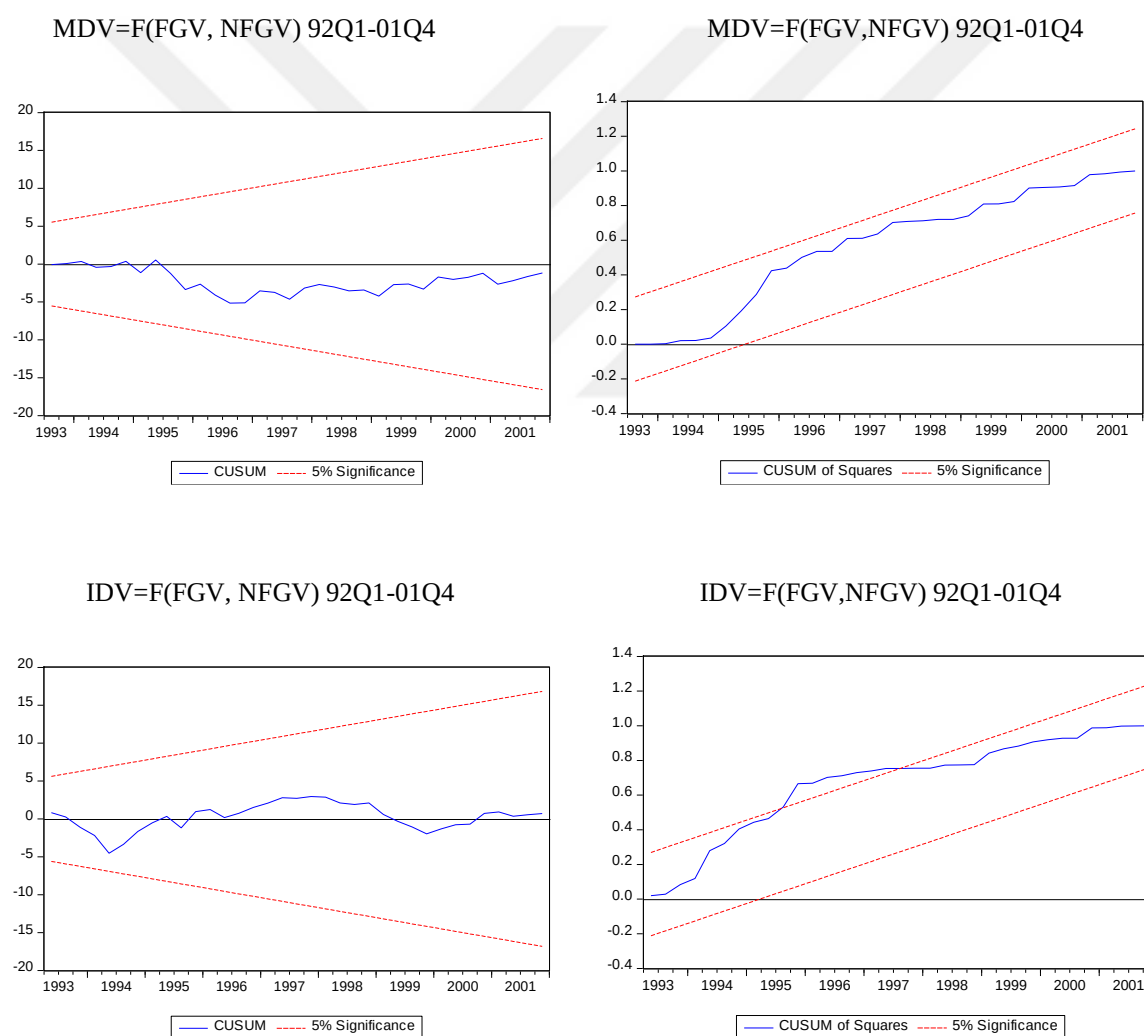
| Period                | 1992Q1-2001Q4    |                   | 2002Q1-2019Q4     |                   |
|-----------------------|------------------|-------------------|-------------------|-------------------|
| Estimated Equation    | MDV=F(FGV,NFGV)  | IDV=F(FGV,NFGV)   | MDV=F(FGV, NFGV)  | IDV=F(FGV , NFGV) |
| Optimal Lag Length    | (1,1,0)          | (1,0,0)           | (1,0,0)           | (1,0,1)           |
| F- Bounds Test        | 11.60341**       | 1.544992          | 13.94512**        | 7.677268**        |
| Significance level    | Lower Bound I(0) |                   | Upper Bound I(1)  |                   |
| 10%                   | 3.17             |                   | 4.14              |                   |
| 5%                    | 3.79             |                   | 4.85              |                   |
| 1%                    | 5.15             |                   | 6.36              |                   |
| Diagnostics Test      |                  |                   |                   |                   |
| R2                    | 0.422134         | 0.851121          | 0.886532          | 0.997723          |
| Adjusted R2           | 0.354149         | 0.838360          | 0.881451          | 0.997585          |
| LM                    | 0.242060[0.7864] | 1.621526 [0.2129] | 2.341942 [0.1307] | 0.076254 [0.7833] |
| Breusch-Pagan-Godfrey | 0.452080[0.7702] | 1.615410 [0.2034] | 0.994031 [0.4011] | 1.337258 [0.2654] |

**Note:** Optimal lags are determined according to the Schwartz Information Criteria.

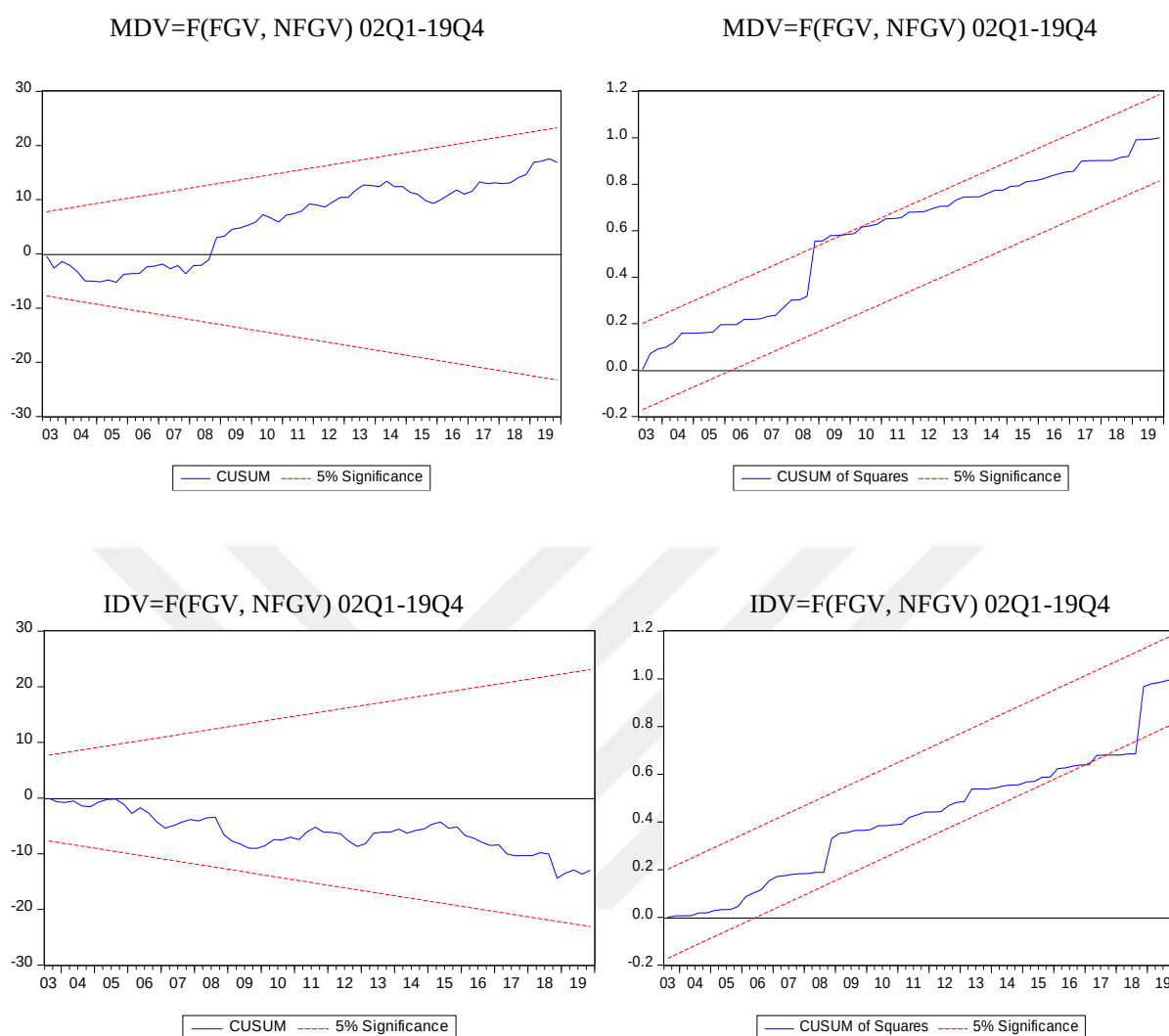
When we look at the second period which is 2002Q1-2019Q4, it is seen that there is cointegration among the variables in both cases that MDV and IDV are dependent variables since the F statistics (respectively: 13.94512 and 7.677268) are above the critical values at 1%

significance level (5.15). When we check the diagnostics, it is seen that the models are free from the autocorrelation and heteroscedasticity problems since the probabilities of F values of LM serial correlation and Breusch-Pagan-Godfrey heteroscedasticity tests are higher than 0.05. However, when we look at the figure 3-2 which indicates the CUSUM and CUSUMSQ test results for all models, it is seen that there is structural breaks and instabilities in all models except the model with depended variable MDV at the first period since some point of cited models' lines are beyond 5% level lines which forces us to reject the null hypothesis of stable parameters.

**FIGURE 3-2: Plots of the CUSUM and CUSUMSQ Stability Tests Statistics**



**(FIGURE 3-2 Continued)**



Since all of the models except the model  $MDV=F(FGV, FGV)$  92Q1-01Q4 are unstable, we have added dummy variables, having based the breakpoint dates in the dependent variables, to each of three models. The breakpoints have been determined according to the CUSUMSQ test graphs and according to the results, the breakpoint in the model  $IDV=F(FGV, NFGV)$  for the period 1992Q1-2001Q4 is 1995Q3, the breakpoint in the model  $MDV=F(FGV, NFGV)$  for the period 2002Q1-2019Q4 is 2008Q4, and the breakpoint in the model  $IDV=F(FGV, NFGV)$  for the period 2002Q1-2019Q4 is 2017Q2.

Following the creation of the dummy variables for each model, we have applied the ARDL Bounds Test by including dummy variables as fixed regressors to cited three models and the results are shown in the Table 3-4 below:

**TABLE 3-4:** ARDL Bounds Test Results after Dummy

| Period                | 1992Q1-2001Q4    |                  | 2002Q1-2019Q4        |                      |
|-----------------------|------------------|------------------|----------------------|----------------------|
| Estimated Equation    | MDV=F(FGV,NFGV)  | IDV=F(FGV,NFGV)  | MDV=F(FGV, NFGV)     | IDV=F(FGV, NFGV)     |
| Optimal Lag Length    | (1,1,0)          | (1,0,0)          | (2,0,0)              | (1,0,1)              |
| F- Bounds Test        | 11.60341**       | 1.035487         | 10.13459**           | 8.506904**           |
| Significance level    | Lower Bound I(0) |                  | Upper Bound I(1)     |                      |
| 10%                   |                  | 3.17             |                      | 4.14                 |
| 5%                    |                  | 3.79             |                      | 4.85                 |
| 1%                    |                  | 5.15             |                      | 6.36                 |
| Test                  |                  |                  |                      |                      |
| R2                    | 0.422134         | 0.858234         | 0.922221             | 0.997842             |
| Adjusted R2           | 0.354149         | 0.831653         | 0.913439             | 0.997602             |
| LM                    | 0.242060[0.7864] | 1.031961[0.3686] | 0.404064<br>[0.5274] | 6.10E-05<br>[0.9938] |
| Breusch-Pagan-Godfrey | 0.452080[0.7702] | 1.235303[0.3146] | 1.777130<br>[0.1080] | 0.987165<br>[0.4487] |

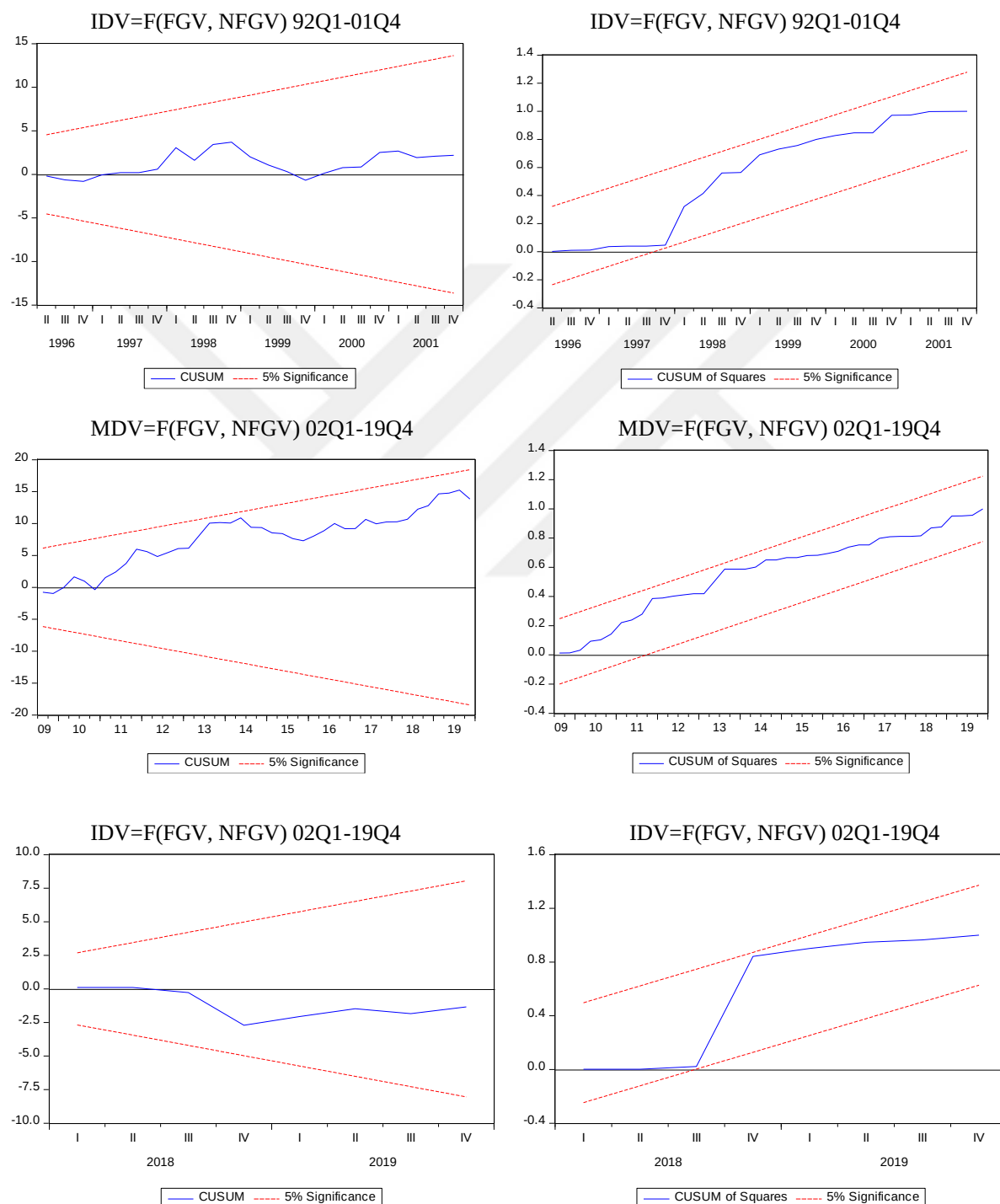
**Note:** Optimal lags are determined according to the Schwartz Information Criteria.

Since we did not add dummy to the first model [MDV=F(FGV, NFGV), 1992Q1-2002Q4], the test results represented in Table 3-3 have been written again in Table 3-4. On the other hand, in the case we have added dummy to the other three models, the results of the cointegration test have not changed much. As before, for the second model [IDV=F(FGV, NFGV), 1992Q1-2002Q4], we are unable to reject the null hypothesis of no-cointegration since the F statistics(1.035487) is lower than the 10% upper bound (4.14) which indicates that there is no long-run relationship among the variables IDV, FGV and NFGV in between the years 1992Q1-2001Q4. When it comes to the second period, it is seen that for both models of MDV=F(FGV, NFGV) and IDV=F(FGV, NFGV), there is cointegration among the variables since the F

statistics for each equation are above the 1% critical value.

When we interpret the diagnostics for the models with dummies, there is no autocorrelation and heteroscedasticity problem in any of the models.

**FIGURE 3-3:** Plots of the CUSUM and CUSUMSQ Stability Tests Statistics After Dummy



On the other hand, the CUSUM and CUSUMSQ test graphs in Figure 3-3 show that the instabilities in three models have been eliminated, and CUSUM and CUSUM of Square lines are between the %5 critical lines after the involvement of dummies in the models. As having confirmed the stabilities of each four models, we can say that the results of the cointegrations test are reliable.

**TABLE 3-5:** Estimated Long-Run Coefficients for the ARDL Model

| Estimated Model                   | Variable | Coefficient | Probability |
|-----------------------------------|----------|-------------|-------------|
| MDV=F(FGV, NFGV)<br>1992Q1-2000Q4 | FGV      | -10.97589*  | 0.0040      |
|                                   | NFGV     | 9.436720    | 0.0013      |
| MDV=F(FGV,NFGV)<br>2002Q1-2019Q4  | FGV      | -1.088565*  | 0.0002      |
|                                   | NFGV     | 0. .220900  | 0.1692      |
| IDV=F(FGV,NFGV)<br>2002Q1-2019Q4  | FGV      | -1.481811   | 0.1168      |
|                                   | NFGV     | 1.721543*   | 0.0074      |

NOTE: \* denotes significance at 1% level.

Following the determination of cointegration among the variables for each of the models, we have shown the long-run coefficients of the variables for each of the three models, having exhibited long-run causality in Table 3-5. According to the results, while MDV is negatively affected by FGV and positively affected by NFGV in the period 1992Q1-2001Q4, the impact of NFGV on FGV has disappeared in the period 2002Q1-2019Q4 despite the continuity of the negative effect of FDV. Besides, Table 3-5 indicates that the coefficient of NFGV is statistically significant at a 1% level and negatively affects IDV in the period 2002Q1-2019Q4.

In conclusion, according to the ARDL Bounds test results, there is cointegration between the stock market development, financial governance, and non-financial governance for two periods. Additionally, there is cointegration among the banking sector development, financial governance, and non-financial governance between the years 2002Q1 and 2019Q4, while no cointegration has been detected between the same variables in the period 1992Q1-2001Q4.

### 3.2.2.3. Error Correction Model

Having found that there is a cointegration relationship between the variables for three models, we have estimated the ARDL model within an error correction model (ECM) framework to confirm the long-term relationship. To verify the robustness of the cointegrated relationship, we have tested whether the co-act between the cointegrated variables adjusts in the long-run to the dynamic equilibrium using the Error Correction Mechanism. Error correction term, having been represented with CointEq(-1) in the tables below, is derived from the long-run equations of the models, and it is involved only when the variables are cointegrated (Liang & Cao, 2007). The absolute value of the error correction term gives the speed of adjustment in years, how long it takes to return deviations from disequilibrium back to the equilibrium (Gessesse & He, 2020). The error correction term is expected to be negatively significant to be able to illustrate the adjustment speed of short-run deviations to the long-run equilibrium. In the case that the ECT is positively significant, it is not possible to talk about long-run convergence. Instead, it is expected to exhibit an explosion from the equilibrium. We have applied the Error Correction Mechanism to each of three models, having been detected to have cointegration. Firstly, when we look at the ECM results for the model MDV=F(FGV, NFGV) in the period 1992Q1-2001Q4 in Table 3-6, it is seen that the CointEq(-1) is negatively significant which indicates that the deviations from the equilibrium are adjusted to the equilibrium in the long-run with 0.07 speed. Thus, for the model with dependent variable MDV and independent FGV and NFGV in the first period, it can be said that there is a long-run causal relationship among the variables.

**TABLE 3-6:** Error Correction Model Results: MDV=F(FGV, NFGV) 1992Q1-2000Q4

| Variable    | Coefficient | Probability |
|-------------|-------------|-------------|
| C           | 2.972587    | 0.0000      |
| D(FGV)      | -2.934307   | 0.1224      |
| CointEq(-1) | -0.773125*  | 0.0000      |

NOTE: \*denotes significance at 1% level

On the other hand, when we look at the results of the same model for the period 2002Q1-2019Q4 in Table 3-7, similarly, it is seen that the ECT has a negative sign, and it is significant at 1% level. It can be said that the divergences are adjusted to the equilibrium in the long-run

with 0.35 speed in the model with dependent variable MDV and independent variables FGV and NFGV in 2002Q1-2019Q4.

**TABLE 3-7:** Error Correction Model Results: MDV=F(FGV, NFGV) 2002Q1-2019Q4

| Variable     | Coefficient | Probability |
|--------------|-------------|-------------|
| C            | -0.087432   | 0.0135      |
| D(MDV (-1))  | -0.239659   | 0.0127      |
| B_MDUMMY     | 1.498304    | 0.0021      |
| F_MDUMMY     | -0.390690   | 0.7125      |
| N_MDUMMY     | 5.863319    | 0.0087      |
| CointEq(-1)* | -0.353604*  | 0.0000      |

NOTE: \*denotes significance at 1% level

Finally, the ECM results for the model with dependent variable IDV, independent variables FGV and NFGV in the period 2002Q1-2019Q4 (Table 3-8) show that the coefficient of the CointEq(-1) is significant at 1% level. However, the coefficient is positively significant, which enables us to state that there is a long-run relationship between the variables.

**TABLE 3-8:** Error Correction Model Results: IDV= F(FGV, NFGV) 2002Q1-2019Q4

| Variable    | Coefficient | Probability |
|-------------|-------------|-------------|
| C           | 0.055936    | 0.0000      |
| D(NFGV)     | -0.003042   | 0.9129      |
| B_IDUMMY    | -0.276131   | 0.8007      |
| F_IDUMMY    | -0.0190987  | 0.9094      |
| N_IDUMMY    | 0.090987    | 0.5851      |
| CointEq(-1) | 0.046259*   | 0.0000      |

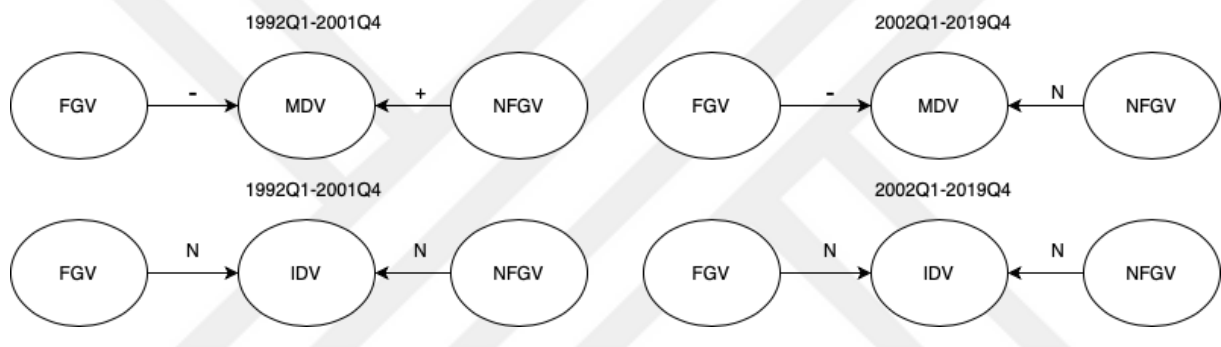
NOTE: \*denotes significance at 1% level

Since the error correction term is not negative, there is no convergence to the equilibrium in the long-run; instead, there is an explosion from the balance. Thus, even though the ARDL Bounds test detected a cointegration among the variables of the model IDV= F(FGV, NFGV) 2002Q1-2019Q4, the ECM results indicate that cointegrated relationship is not robust.

### 3.2.3. Evaluation of Empirical Results

By implementing the ARDL Bounds Test and Error Correction Mechanism, the long-run relationships between the governance variables and the banking sector and stock market development for two separate periods have been tested. The results of the ARDL process have been represented in Figure 3-4. According to the results, firstly, the development of the stock market has been negatively affected by the financial governance in both periods. In contrast, the positive effect of non-financial governance on stock market development in the first period has been disappeared in the second period.

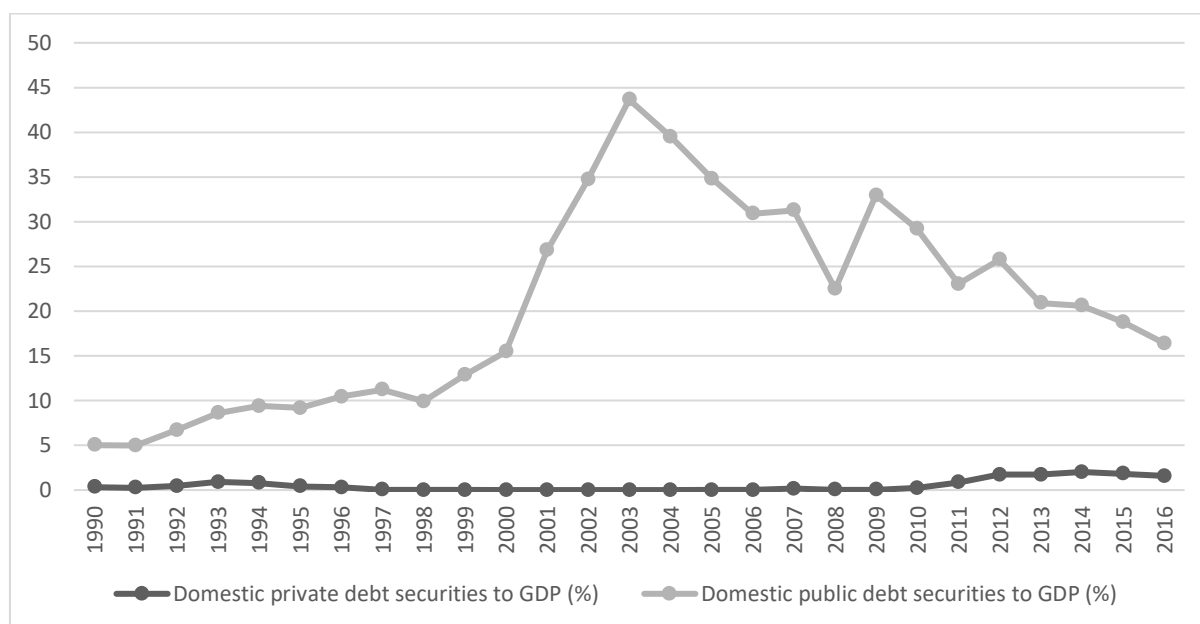
**FIGURE 3-4:** Representations of Long-Run Relationships Between the Variables for Each Model



On the other hand, the empirical results have shown that there has never been a long-run relationship between banking sector development and financial and non-financial governance. The cointegration and ECM results have indicated that financial and non-financial governance have no positive or negative casual effect on the banking sector development. The interpretations of the results from theoretical and historical frameworks are presented below:

Firstly, according to the results of the model which has tested the long-run relationship of financial markets development with financial governance and non-financial governance for the years between 1992-2001, it has been detected that non-financial governance has a positive effect on financial markets development. The results indicate that during the period, real economic activities such as tendencies of governments to invest, households to consume, firms to make investments have prompted the development of financial markets by increasing demand for debt securities. It can be easily said that the debt securities have been demanded for real economic activity during the era.

**FIGURE 3-5:** Domestic Private and Public Debt Securities to GDP in Turkey: 1990-2016



Source: World Bank, 2020

As it is shown in FIGURE 3-5, increase in the public debt ratio was dominated by the public sector. Even though private debt securities increased too, their rise was cut off by the 94 Crisis. Thus, the positive effect of non-financial governance on financial markets development can be said to be realized mostly through the major contribution of public sector debt securities. Even though this positive impact of real sector activities on financial markets can be read as financialization whose definition is the increasing dominance of the financial sector in the operation on economies (Palley, 2013, p.1), this is not valid for Turkey since the size of financial markets is relatively small.

On the other hand, during the same era, a negative impact from financial governance towards financial markets development has been detected, which indicates that financial flows such as money stock and portfolio investments were not transferred to the financial markets. Firstly, during the era, the introduced monetary policy program targeted tight monetary policy, even though they could not be realized. On the other hand, any of these programs were not a sustainable and applicable monetary policy program (Sarı, 2007). The economy was depended on the incentive of short-term capital inflows, and reform and stability in the economy were overlooked, which caused the state to lose its directory role (Eroğlu, 2009). In such a framework, it is comprehensible that financial governance negatively affected financial markets' development, and financial flows were not transferred to financial markets.

As a summary, during the years between 1992-2001, real economic activities contributed to the development of Turkish Financial Markets throughout the increase of demand for debt securities mostly by the public sector, while financial flows such as M2 and portfolio investments were not transferred to the financial markets as financial investments. When it comes to the banking sector development and its relationship with governance variables during the same era, it has been detected that there is no cointegration among the banking sector development, financial governance, and non-financial governance. It means that in the long run, the distance between the development of the banking sector, financial flows, and real economic activities has not kept constant in time, and they have experienced a development or throwback process fragmentedly and independently from each other. One of the main characteristics of the era was the use of the banking sector, which could not achieve its mediatory role, for closing the huge budget deficits by the public sector. Throughout the era, the transfer of the bank credits to private investment and consumption has been obstructed, and at this point, a disconnection has occurred between the real sector and the banking sector (Uluyol, 2019). On the other hand, the disconnection between financial flows and the banking sector was the result of the unstable monetary policies, extreme volatility and uncertainty, tremendous deregulation, and lack of coordination.

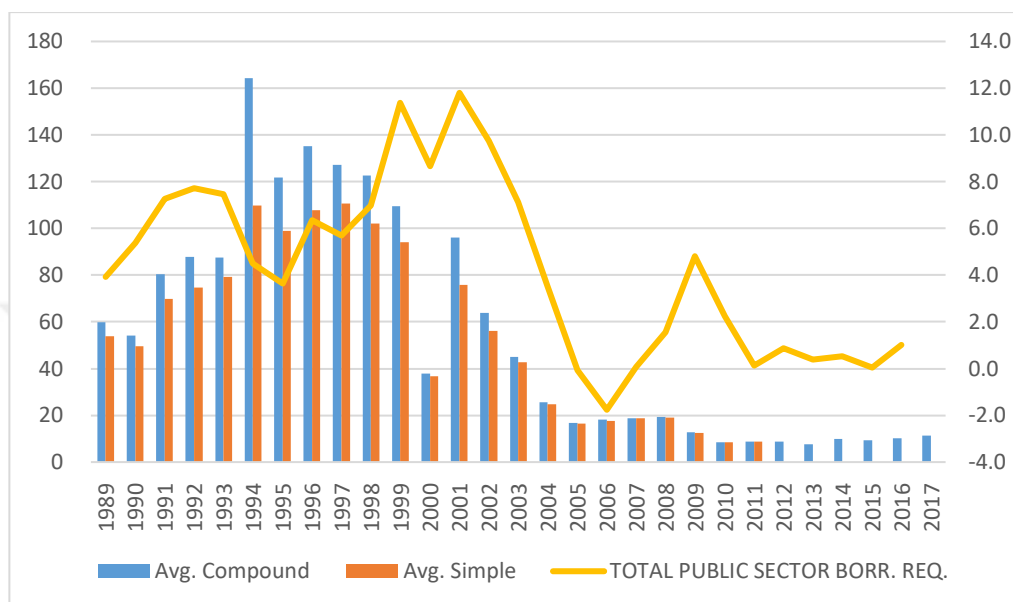
Under all these circumstances, it is understandable that the banking sector, which was dominated by public sector and could not achieve its mediatory role, financial flows, and real economic activities are independent of each other. In this framework, this disconnection and fragmentation can be named as a lack of governance. Namely, the lack of governance, having blocked the banking sector to develop in a way it will be able to feed financial and real economic activities and will be fed by them, has resulted in disconnection in their long-run relationship.

In conclusion, the development of the banking system could not be directed in a way pre-determined economic targets are realized, and real economic activities are stimulated. And this process has ended with the most devastating crisis of Turkish Economic History, having been caused by political instabilities, uncertainties, extreme deregulation, high volatility, and lack of coordination, in 2001.

When we look at the years between 2001 and 2019, it is seen that there is cointegration between financial markets development, financial governance, and non-financial governance. It has been detected that the negative effect of financial governance on financial market development continues to exist, while the positive effect of non-financial governance has disappeared. Firstly, the positive impact of non-financial governance, having indicated that debt securities have been demanded by real economic activities, have evanesced, and the long-term

relationship between the real sector and financial markets has been neutral. As said before, the big part of the demanded debt securities was issued by the public sector during the previous era.

**FIGURE 3-6 : Domestic Borrowing Interest Rates and Public Sector Borrowing Requirement: 1989-2017**



Source: SBB, 2020

After the 2001 Financial Crisis, the problems that caused instability and inefficiency in the financial system have been tried to be solved, and the financial system has been strengthened. Despite the continuing dominance and crowding-out effect of public sector debt securities in the financial markets (see Figure 3-5), it is seen that the public sector borrowing requirement ratio had started to decrease, while the borrowing interest rates also started to decline (see Figure 3-6). The disappearance of the positive impact of non-financial governance, having indicated that the relationship between demand for debt securities and the real sector activities does not continue, is understandable in an environment where the public sector borrowing requirement and domestic borrowing interest rates have decreased. Thus, the real sector activities such as consumption, investment, or government expenditure do not feed financial markets' development anymore.

Finally, when we interpret the results for the banking sector development during the period between 2001-2019, it is seen that there is still no cointegration between banking sector development, financial governance, and non-financial governance. Thus, it is clear that the regulations and improvements in both macroeconomic conditions and financial system (until

2016) have not been able to govern in a way that will lead a sustainable economic development through coordinative and systemic management of the financial and non-financial flows. The regulations have strengthened the banking system, increased its stability, efficiency, and depth, but this development has not been realized systemically and sustainably. The abundance of global liquidity and the stability in the political sphere have contributed to the establishment of the trust, stability, and an increase in capital inflows. As said before, the importance of financial development for sustainable economic growth has been realized relatively late, and the development of the banking sector was not managed coordinatively with the real economic activities' and financial flows' development. The entrepreneurs have not been received long-term investment credits because of the high collateral rates and banking sectors' low aggregate credit, having been caused by decreasing saving rates, until the last three years. Instead, the policymakers have preferred to increase consumer credits and to take the advantage of high-interest incomes (Akan, 2019). Thus, the connection between real economic activities, financial flows and investments, and the banking sector could not be established. The banking sector could not spur investments and economic growth, as well as it could not reach a stable development that will not be affected by international or domestic challenges.

In summary, despite the regulations by international standards in the banking sector and macroeconomic improvements during the era, a management system, which will transfer the macro-financial and non-financial flows to the banking sector, having been expected to be stimulated by these funds and create new fundings for further economic and financial activities, could not be established. In such a framework it is considerable that there is not a stable relationship between banking sector development and financial and non-financial governance.

As a summary, according to our empirical analysis, it has been detected that there is not an institutional governance mechanism in the management of financial development in Turkey. Even though Turkey has recorded significant progress in the macroeconomic conditions and the banking sector stability after 2001, it could not establish systemic and coordinative management of the macro-financial and non-financial flows to achieve pre-determined macroeconomic plans and long-term economic progress. Turkey has formulated reactionary solutions to economic problems instead of finding structural solutions. The existing structural problems, having come from the past, have not been solved, but passed over by temporary short-term solutions.

Turkey entered a long-term recession in 2018, and it continues to struggle with the economic crisis, which has started then. It could not prevent itself from entering such a long-term recession since it could not establish a stable economic system that has been structured by

institutional reforms. Macro financial and non-financial flows/institutions have not been formulated in a way that they will serve the aim of sustainable economic growth; instead, each of these institutions has served a different purpose, which indicates a fragmented management mechanism in the macro-financial system (Akan, 2018). The banking sector and financial markets have not been stimulated by the real sector activities and financial investments, which has prevented the financial system from prompting macroeconomic development. The separate developments in financial and real sectors have not lasted much, and the fragile and volatile structure of the economic system has been easily affected by the adverse global and domestic conditions.

The importance of coordination among the financial sector and real economic activities has been realized, and several organizations and special programs such as Program for Increasing Domestic Savings and Preventing Waste have been established to achieve this coordination, but it was too late to prevent an overall economic recession. Even today, Turkey has not been able to create a stable economic program that has specific and achievable targets, and what has been done as a problem- solving effort is not more than stimulating the macroeconomic flows for short-term improvements by encouraging consumer credits.

## CONCLUSION

The study has hypothesized that institutional governance with respect to the strategic and coordinative management of the economic institutions that mediate between the actors and markets is a key determinant of financial development, which is crucial for sustainable economic growth. To test this hypothesis, firstly, the theoretical framework has been drawn in the first chapter. The terms institutional, macroeconomic, and financial governance have been examined deeply from three institutionalist schools' perspectives. Following definitions of institutions and their extent for each school, their approaches to the macroeconomic and financial governance have been analyzed comparatively. It has been concluded that the governance interpretation of New Institutionalism and Rational Choice Institutionalism has a non-interventionalist nature and is referred to as a management mechanism that provides the rule of law, democracy, and protection of property rights and enforcement of contracts. In contrast, Historical Institutionalism, having accepted the importance of legal framework, interprets governance as collective and strategic management that will decrease inequality in the distribution of income and inefficiency, which is resulted by the income inequality. In the second part of the chapter, financial development, its indicator and determinants have been investigated, and it has been handled as a sum of stability, efficiency and depth. At the end of the chapter, a short review that brings all of the terms together has been made.

In the second chapter, the historical evolution of the Turkish financial system and the macroeconomic conditions belonging to the periods have been explored in three periods that have different characteristics in the manner of economic policy. After the periodic investigation of financial sector development in Turkey for the years 1960-2019, the institutions, developments, regulations, and organizations related to the macro-financial governance have been explained shortly. It has been seen that the Turkish financial system is not developed enough, the regulations after the 2001 crisis have not brought permanent solutions, structural problems have continued, and the institutions are not governed in a coordinative and strategic way despite the organizations that are significant for the collective action. It has been understood that the fragmented structure of governance and the lack of permanent solutions have resulted in a long-term recession, which starts in 2018.

In the last chapter, an empirical study has been carried out to determine the nexus between financial development and institutional governance in Turkey. Institutional governance has been handled in two sub-components as macro-financial and macro non-financial governance.

In this context, the effect of macro-financial and non-financial governance on the banking sector and stock market development has been investigated by considering Turkey for the periods 1992-2001 and 2002-2019. For testing these relationships, following the construction of variables through PCA, the analysis has been realized with quarterly data by implementing the ARDL Bounds Test for determining cointegration. The stabilities of the models have been measured by CUSUM and CUSUMSQ tests, while the robustness of the detected cointegrating relations has been tested with Error Correction Model. The results indicate that the banking sector development has no long-run relationship with macro-financial and non-financial governance, and stock market development has been negatively affected by the financial governance in both periods. On the other hand, it has been detected that stock market development is positively influenced by macro non-financial governance in the first period and this positive causality disappears in the second period.

In the process of carrying out the study, there have been some constraints, such as unavailability of some of the data, and the limited literature in the field of the empirical framework. Firstly, the lack of some financial data has prevented us from involving financial efficiency as a component of financial development. On the other hand, aggregate savings, which are an essential institution of macro non-financial governance, could not be included in the macro-financial governance due to the lack of quarterly data for savings. The study contributes to the literature by testing the relationship of macro-financial governance and non-financial governance, having been developed by Akan, with financial development variables for Turkey.

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