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The Unstable Macroeconomic Factors and Bank Profitability in FCC Area: A Conceptual Framework

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ABSTRACT

The aim of this paper is to discuss at a conceptual level the relationships between the important macroeconomic factors and banks' profitability in the troublous Fertile Crescent Countries (FCC). The instability in the macroeconomic environment is dominating FCC area, especially in the last two decades affecting banking industry. The variables proposed under examination are interest rate, exchange rate, economic growth, inflation rate, and money growth. The model of this study if validated would have significance important policy implications to the governments of FCC and other stakeholders. Thus, the proposed conceptual framework which is drawn upon the existing literature has examined the effect of unstable macroeconomic factors on banks' profitability in FCC countries such as Palestine, Jordan, and Lebanon. The previous studies showed mix and inconclusive results on the effect of macroeconomic factors and banks' profitability. This paper contributes to the existing literature by providing a conceptual arguments that allow for better understanding of the impact of the unstable macroeconomic environment on the profitability of banking industry.

1. Introduction

Banking industry in the unstable area of Fertile Crescent Countries (FCC) have a crucial situation due to the uneven stability in the area. The macroeconomic factors might have influence on banking sectors' profitability, particularly in the unstable FCC area. Belousova, Karminsky and Kozyr [39] argue in their study on Russian banks that the macroeconomic environment is crucial in determining the profits of banks. Almazari [1] used in his study on Saudi and Jordanian banks a selection of internal and external macroeconomic factors for the purpose of predicting the profitability of a bank, and found it having positive correlation with banks' profitability. Ben Naceur and Goaied [5] in their study on the Tunisian banking industry found that macroeconomic variables such as inflation and economic growth have no impact on Tunisian bank's profitability. This paper examines whether a selective macroeconomic factors have an impact on FCC's banks' profitability. Given the importance of banks'

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profitability for the stability of the banking industry due to the huge effect of banks on the capital markets as well as the whole economy. The world bank reports during 2016-2017 indicated that the unstable Fertile Crescent area -which is part of the huge MENA countries- is in turmoil since the last decade, and that situation has influence on the economy especially the banking sector.

The annual reports of banks in the FCC unstable area such as Palestine, Jordan, and Lebanon showed that the level of profitability during 2006-2014 was 0.92%, which is low compared to their counterparts in GCC and eastern Europe. García-Herrero, Gavilá and Santabárbara [9] stated that the international return on assets (ROA) ratio in similar countries such as eastern European countries is 1.8%. Also, the average ROA to GDP and ROE to GDP in GCC countries during 2010-2014 was 0.36% and 2.77% respectively, whereas these ratios in FCC countries during the same period were 0.23% and 2.1% respectively. Thus, the profitability of banks is low in the unstable Fertile Crescent area compared to the eastern European and neighboring countries. Therefore, the main objective of the study is to review the literature of macroeconomic factors in unstable regions in order to draw a relationship between them and banks' profitability through the development of a conceptual framework. As banks are the most leading financial institutions in the FCC area due to the highest dependency on them by both individuals and the governments. Also, the aim of this study is to discover the research gap in the context of FCC's banking sector, as this sector existing in an unstable circumstances since quite a long time.

2. Literature Review

2.1 Banks' Profitability

The arguments on the determinants of banks' profitability is remarkable in the previous literature especially on US and European banks due to the importance of banks' profitability on the stability of the financial system and the economy as a whole. But few studies have been done on developing and unstable economies such as FCC. Khasawneh [28] argue that banks profitability and stability are determined through some bank’s characteristics and macroeconomic variables. Also, the previous studies are having inconsistent results regarding the effect of the macroeconomic factors on banking sectors' profitability. Growe, DeBruine, Lee, and Maldonado [10] in their study of profitability measurements on U.S. regional banks during 1994-2011 found that the macroeconomic factors are not related to profitability through the covered period. They added that the generalizing of results of previous banks' profitability studies is challenging due to the differences in the regulatory standards, periods covered, sample size, and economic environment in each country. Previous studies such as Athanasoglou, Brissimis and Delis [3], Khasawneh and Al-Khadash [24], Flamini, Schumacher and McDonald [25], and Hoffmann [26] investigated the determinants of banks' profitability by testing the effect of bank-specific, industry-specific, and macroeconomic factors on the profitability of a bank with less concentration on unstable areas. Different macroeconomic factors were tested in banks' profitability literature, with few studies on unstable areas such as FCC. The impact of several macroeconomic factors on banks' profitability were discussed and found inconsistent results using different sample sizes. Prabhakaran and Karthika [37] in their study on Omani banks during the period of 2010-2016 found that the bank specific variables and macroeconomic variables such as inflation, GDP, and interest rate are significantly related to the profitability of a bank. Anbar and Alper [2] argue in their study on Turkish banks through 2002-2010 that the real interest rate is the only macroeconomic factor that positively affect banks' profitability. However, Sufian [18] in his study of the Malaysian banking sector after the Asian financial crisis 1997, indicated that bank profitability is sensitive to macroeconomic conditions, and found economic growth having a negative effect on profitability, while the higher inflation rate has a positive effect on the Malaysian banks' profitability during the sample period. In the same vein, Vong and Chan [21] in their study on Macao banks indicated that out of all macroeconomic variables, only the rate of inflation is having a significant relationship with banks' profitability. Sufian and Habibullah [20] indicated in their study on Chinese banking sector during 2000-2005 that the macroeconomic variables are economically not significantly related to banks' profitability.

2.2 Macroeconomic Factors and Banks' Profitability
2.2.1 Interest rate

The interest rate is an important macroeconomic variable that has an influence on the profitability of a financial institution. Thus, the international and local fluctuations of the interest rates due to government's conservative policies and the adverse effect of several financial crises have an influence on banks' profitability. Sufian [19] in his study on a selected south Asian countries argued that large banks that have many branches may attract more deposits and loans, and thus during the wide spread of a large interest rate, they can achieve higher levels of profitability. Jamal, Abdul Karim, and Hamidi [12] found a significant relationship between interest rate and ROA. Therefore, the changes and the fluctuations in the interest rates causing banks' earnings to fluctuate violently [27]. Ben Naceur and Goaied [29] indicated that a complete liberalization in the economy strengthens the ability of banks to generate profitability by increasing the net interest margin, because the interest rate liberalization has an effect on net interest margins.

2.2.2 Exchange rate

The macroeconomic factors such as exchange rates has an influence on the profitability of banks [13]. For instance, Peters, Raad and Sinkey [15] indicate that the severe depreciation in the value of the currency in FCC area such as lebanon led to the decline in loans values which decreases banks' profitability. Obamuyi [33] indicate that the exchange rate regime is a significant macroeconomic factor that determines banks' profitability. Belousova, Karminsky and Kozyr [39] found that exchange rate has a positive relationship with Russian banks' profitability. On the other hand, Soares, Silva, Garbatov, Sutulo, and Luo [30] argue in their study on some EU countries that the exchange rate does not have any impact on net interest margins and profitability. Also, Deltuvaite [31] indicate that the exchange rate and banks’ profitability indicators are not statistically significant. However, the depreciation of the exchange rates during the currency crisis decreases the liquidity needs of banking system which affects negatively banks' profitability [32]. Banks that were exposed more to foreign exchange losses risk in the event of domestic currency depreciation were found less profitable [18].

2.2.3 Economic activity

The macroeconomic factors may have influence on banks' profitability, but this influence might be more in the unstable areas. Forster and Shaffer [8] indicated that previous studies showed a strong relationship between macroeconomic factors such as economic growth and the financial sector. Lee and Hsieh [14], Dietrich and Wanzenried [7] argue that GDP growth is significant in effecting the profitability of a bank in middle and high-income countries, as banks' profitability increases during prosperous economic times. Also, Devarajan [38] argue in his study on public and private banks in India that GDP growth is having a significant and positive effect in all banks' profitability measures. Albertazzi and Gambacorta [11] indicated that if GDP increases by 1%, net interest income increases by 0.6%. As this increase might be connected with the presence of long-term contracts, and that this effect is more stable in the long run reaching 1.8%, which increases the profitability level of a bank. In the same vein, Petria, Capraru, and Ihnatov [16] in their study of 27 banks in EU region over the period 2004-2011 argue that the GDP growth is positively related to banks' profitability. Zopounidis and Kosmidou [23] argue that the GDP growth rate increases ROA, and thus it has a positive and significant effect on banks' profitability. Whereas, Ayadi and Boujelbene [4] indicated that the GDP growth and inflation rate are having insignificant relationship with bank profitability. However, Dietrich and Wanzenried [6] found that GDP is significant in explaining banks' profitability because the demand for lending increases during cyclical upturns.

2.2.4 Inflation rate

The effect of the changes in the inflation rate (CPI) index has been discussed tremendously in previous studies. Ramadan, Kilani and Kaddumi [17] in their study on Jordanian banks during 2001-2010 found that the only macroeconomic factor that is related to profitability is the inflation rate. Also, Athanasoglou, Brissimis and Delis [3] found that inflation is having positive significant relationship with profitability. Petria *et al*., [16] in their study of profitability determinants in 27 European Unions' banking sectors over the period 2004-2011 found that banks' financial performance is positively affected by inflation rate. The authors indicate that an increase in inflation rate might determine the increase of the loans interest rates, and thus, the bank's profitability. Moreover, Naceur and Omran [34], Ayaydin and Karakaya [35] argued that high inflation rate is always linked with high interest rate and thus high income which leads to higher profitability levels in banks.

2.2.5 Money growth

The growth of money supply depends on the monetary policy followed by the central bank of a country. It refers to the quantity of money available for circulation. The changes in money supply may lead to a changes in the GDP and the price level, and might affect banks' profitability. Sufian and Habibullah [20] argue that the growth in money supply is negatively related to the profitability of a bank. However, Aburime [36] indicated that the change in the level of required reserves changes the size of money supply, and hence bank profitability. Nevertheless, the FCC countries such as Jordan and Lebanon have conservative policies regarding money supply due to the instability in the region and the frequent governments' fiscal deficit. Thus, this macroeconomic variable would have an important influence on FCC banks' profitability.

3. Conceptual Framework

The current study's conceptual framework is shown in figure 1. Thus, a set of macroeconomic variables namely: interest rate, exchange rate, economic activity, inflation rate, and money growth are proposed as a proxy of unstable macroeconomic environment. Whereas, the dependent variable is banks' profitability, which is measured by using the return on assets (ROA) and the return on equity (ROE). The previous studies on the relationship between macroeconomic variables and bank profitability produced inconclusive results. Many studies found that interest rate, GDP, and inflation rate have a positive influence on the profitability of a bank, but with little attention on FCC area such as Jordan, Palestine, and Lebanon. While, other studies did not support the effect of these variables on bank profitability. Therefore, by considering the macroeconomic variables of the unstable countries, this study would conceptualize the relationship between macroeconomic factors and banks' profitability. Because a thorough empirical analysis is essential to generalize this concept since these relationships has not been generally proved earlier in such countries.

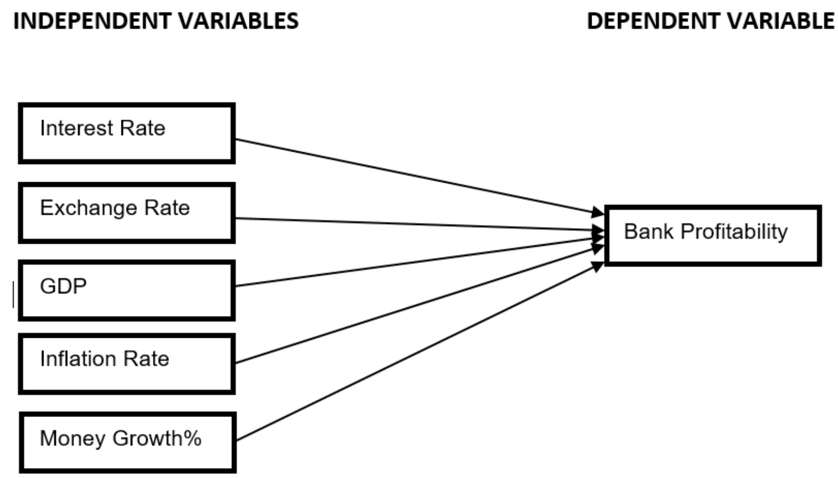

Fig. 1. Proposed Conceptual Framework

4. Methodology

This study has been conducted based on the previous literatures of macroeconomic factors and bank profitability. The relevant related literatures have been reviewed to draw a relationship between the important macroeconomic factors and banks' profitability. Additionally, the relationship has been considered in the contest of the unstable developing countries such as the case of FCC. A secondary data related to the scenario of FCC banking sector were used to determine the present existing situation in the banking industry of FCC area. Finally, a conceptual model has been proposed based on the existing literature. Also, this study is including the future direction of the research.

5. Discussion

This study suggests the relationship between the important macroeconomic variables and banks' profitability in unstable FCC area. After reviewing the previous literature of banks' profitability, the results indicate that the relationships between macroeconomic factors and bank profitability have mixed results. The first group found a positive and significant relationship between GDP and the inflation rate and the profitability of banking sector. Where, an increase in the GDP growth leads to an increase in the net interest income, as it is connected with the presence of long-term contracts. Similarly, the interest rate has positive influence on banks' profitability. Hence, the profitability of a bank can be enhanced in the times of high interest rates imposed by different governments and legislative bodies. Also, the depreciation in the value of money due to the decrease and fluctuations of the exchange rates decreases the value of loans, which affects negatively the profitability of banking sector. In the context of FCC the relationship may be more important because banks are facing many challenges related to the macroeconomic factors and banks' profitability. More specifically, the FCC banking industry have been suffering from instability in their environment due to the occupation and several local wars, and conflicts that dominates their macroeconomic situation especially in the last two decades.

6. Conclusion

This paper serves as a proposed model on the effect of the unstable macroeconomic factors on banks' profitability. The profitability of banking sector have a great impact on the stability of the financial system and the economic growth of a country. As illustrated in figure 1, once the model is empirically validated, policy recommendations will be provided to the governments of FCC countries, legislative authorities, and other relevant stakeholders. These recommendations may increase banks' supervision which might increase the profitability levels of banking sector, in order to enable banks to survive in the unstable circumstances, and play their role in the economic growth by financing several economic sectors, individuals, and the governments of the unstable areas such as the case of FCC. Moreover, academia will also benefit from this study as it will provide additional evidence on the effect of unstable macroeconomic factors on banks' profitability especially from the troublous FCC region. It will also benefit from the survey methodology as the research design, focus, scope and the analysis tools will be different from the previous researches that conducted studies on the macroeconomic factors and banks' profitability.

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