



THE LEBANESE PEOPLE'S PERCEPTION OF THE BANKING SECTORS IN LEBANON, ISRAEL, AND THE UNITED ARAB EMIRATES: IMPLICATION FOR REGIONAL COMPETITION

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Abstract

The financial sector, particularly banks, is the lifeblood of an economy. This is particularly portrayed in the role the banking sector currently holds in Lebanon; it is the country's strongest economic asset. As such, it is crucial to understand and analyze the financial institutions to safeguard their stability and performance, and in turn protect and potentially boost the economy. Therefore, the objective of this paper is to analyze the stability of the strongest banking sectors in the Middle East; the Lebanese, the Israeli and the Emirati; and then assess the Lebanese people's perception of the three banking sectors. The analysis is conducted based on retrieved data from the World Bank, the IMF, and Central Banks of the countries under consideration. Moreover, the perception is drawn from a questionnaire utilized by the paper to shed light on the Lebanese confidence vis-à-vis the banking sectors of the three countries considered above. Accordingly, results showed that the strengths of the Lebanese banking sector lie in its thorough regulations and supervision, its liquidity, and its resilience to political instability. On the other hand, its weaknesses include asset quality, high sovereign exposure, and the fluctuating economy. Israel's banking sector showed specific strengths in its capital adequacy and liquidity levels, its sturdy banking regulations, and its resilient economy. However, its weaknesses are



specific to its extensive exposure to the sensitive housing market, unstable geopolitics, and high wealth inequality. The UAE's banking sector has strong capital and profitability, however, its non-performing loans remain high, and the economy remains, although decreasing, tied to oil demand and prices. Finally, the questionnaire revealed that the majority of the Lebanese people do not have enough prior knowledge about neither Israel's nor the UAE's banking sector, and their perception of the Lebanese banking sector falls slightly out of line.

Keywords: Lebanon, Israel, UAE, banking sector, regional competition, people's perception

INTRODUCTION

The banking sector is the section of the economy that holds other's financial assets and invests those assets as leverage to generate profit. In simpler terms, banks distribute and guard liquid capital. Its activities are regulated by government agencies such as the Central Bank as they are the life-blood of the commercial and industrial activities in the local economy. This sector has a hand in fueling economic growth by financing investment, and its activities ease the process of production, exchange, and distribution of wealth.

History of the Banking Sectors

Lebanon

The Lebanese banking sector dates back to the First World War when Lebanon was under French rule. Foreign institutions dominated, and their activities mainly focused on discounting of short-term bills of exchange, providing collateral loans and advances against goods or in the form of current accounts, and foreign exchange operations. They also accepted deposits. On the other hand, most domestic financing was in the hands of local banks. They heavily depended on deposits which lead them to offer higher interest rates. Foreign banks, unlike local commercial banks, relied on their own funds to finance their activities, and retained the majority of funds abroad, while local banks' activities were restricted to the region of their establishment (Essays, UK, 2018).

The banking sector remained unchanged till the independence of Lebanon in 1943 and the founding of Banque Du Liban (BDL, the Central Bank of Lebanon) in 1964. The marked difference between foreign and domestic banks in Lebanon had been reduced as the former no longer monopolized Lebanon's foreign financing; on the contrary, these banks started to contribute to domestic financing, and competed for local deposits. In fact, the Lebanese banking system witnessed the entry of 13 foreign banks– from Jordan, Great Britain, Iraq, Saudi Arabia,

Netherlands, USA, Tunisia and Pakistan—and more than 40 Lebanese banks. From the 1950s till the start of the civil war in 1975, Beirut was the region's financial services hub. At the onset of the oil boom starting in the 1960s, Lebanon-based banks were the main recipients of the region's petrodollars (ibid.).

Previously, banks merely abided by the Code of Commerce which regulated commercial business. Regulations, supervision, and control were introduced with the enactment of the Code of Money and Credit and the founding of BDL during the same year. The Central bank's role is to safeguard the banking sector's soundness. Thus, it was granted regulatory and supervisory authority over the banking system (BDL, 1973-1993). Today, the BDL maintains the fixed exchange rate, purchases government debt, keeps interest rates steady at moderate levels, maintains high gross international reserves, provides economic stimulus, and addresses weak banks. The main financial services offered in Lebanon are commercial banking, investment banking and insurance. The country borders the Mediterranean Sea to the west, Israel to the south and Syria to the east and north (BDL, 2017).

Israel

The history of the Bank of Israel is intertwined with the history of the state. Israel, as well as much of the Middle East, was under the Ottoman Empire which ruled from 1517 to 1917. However, the geopolitical landscape in the Middle East was reformed during World War I. When the Allies won the war, the 400-year Ottoman Empire governance ended, and Great Britain colonized Palestine (modern-day Israel, Palestine and Jordan). During that era, operating banks were under the governance of the colonizer. After the independence of Israel in 1947, the ministry of finance deliberated the creation of a central bank as an immediate solution for the problem of issuing a currency for the state. Thus, the Bank Notes Ordinance was introduced, and effective from August 17, 1948 onwards. The decree defined the authority of the Bank of Israel to issue banknotes in a charter between the government and the Anglo-Palestine Bank, later Bank Leumi Le-Israel B.M. (Bank of Israel, n.d.).

The Anglo-Palestine Bank was established during 1902 in Jaffa as subsidiary of the Jewish Colonial Trust previously formed in London by members of the Zionist movement to encourage the industry, construction, agriculture, and infrastructure of the land hoped to become Israel. The Anglo-Palestine Bank offered farmers long-term loans and provided loans to the Ahuzat Bay it association which built the first neighborhood in Tel Aviv (Hoke 2015).

In March 1954 the Bank of Israel Law, which dictated the organization of the bank, its relationship with the government, and its independence, was introduced. The establishment of the central bank was coordinated by the first Director-General of the Ministry of Finance at the

time, who was later appointed as the first Governor of the Bank of Israel. The law gave the Bank of Israel authority to control the Issue Department of Bank Leumi Le-Israel B.M. and the Banking Supervision Department of the Ministry of Finance, and then in 1978 the foreign exchange controls (ibid.).

Today, Israel borders Egypt to the south, Jordan and Syria to the east, Lebanon to the north, and the Mediterranean Sea to the west.

United Arab Emirates

Similar to Lebanon and Israel, banking in the UAE dates back to years prior to the country's independence, more specifically, during the Trucial States period. Numerous international banks set their operations in the region during that era starting with Standard Chartered during 1958, and the first local bank was established in 1963.

On the 2nd of December 1971, the United Arab Emirates (UAE) was declared as an independent, sovereign and federal state. The UAE comprises seven emirates: Abu Dhabi, Dubai, Sharjah, Ras Al Khaimah, Ajman, Umm Al Quwain and Fujairah (Bey, 1996).

The first steps made towards establishing a monetary authority began during 1973 with the creation of the UAE Currency Board. Before the formation of the UAE, the currencies used in the region were the Bahraini Dinar and the Qatari and Dubai Riyal. The currency board launched its first task, the creation of the UAE Dirham, almost two years after independence. As the economy developed, it became clear that the country needed to establish a Central Bank. "The board was found to lack the authority to regulate the increasingly complicated and diverse monetary scene, particularly after the quadrupling of the oil price in 1974, which had caused a big increase in the number of foreign and local banks and in the scope of financial transactions" (Frauke Heard-Bey 1982). Consequently, the Currency Board became the Central Bank of the UAE on December 10, 1980.

Since its independence till date, the UAE borders the Gulf of Oman and the Persian Gulf between Oman and Saudi Arabia.

The Need for this Study

The banking sector is the lifeblood of the economy; thus, it is crucial to understand its strengths, weaknesses, and risks to safeguard its stability and spot opportunities of improvements. Insights from top banking sectors in the region may help weigh the sectors' stance and stability in the respective economy. Hence, it is crucial to know whether the Lebanese people, specifically, the future generation in universities, and the current generation in the business,

banking or other fields are aware of the present situation of the local banking sector as compared to regional peers.

Problem Definition

This paper will focus on the analysis of the performance, stability and risks of the top banking sectors in the Middle East; Lebanon, Israel and the UAE to prove Lebanon's strong stance and favorable investment environment in banking. The gathered information will be compared to the Lebanese people's perception of the three banking sectors.

Scope of the Study

This research project aims to analyze the banking sectors of Lebanon, Israel and United Arab Emirates in terms of operating environment, performance (which includes deposit and lending activities, liquidity, capitalization, asset quality, and profitability), regulatory supervision, contribution to the respective economies, and risks. The current financial systems of each country will be thoroughly discussed and weighed improve and better safeguard local banks. Furthermore, the current situation will be compared to the Lebanese people's perception of the three banking sectors in terms of quality of assets, transparency, liquidity & capital adequacy, risk, profitability, and regulatory supervision.

LITERATURE REVIEW

Understanding the importance of financial institutions is crucial for both developed and developing economies. Economists hold different opinions regarding the importance of the financial system for economic growth. John Hicks (1969) argued that the financial system played a critical role in igniting industrialization in England by facilitating the mobilization of capital for "immense works." Joseph Schumpeter (1912) contended that well-functioning banks spurred technological innovation by identifying and funding those entrepreneurs with the best chances of successfully implementing innovative products and production processes. Rajan and Zingales (1998) showed that industries with greater need of external finance grew faster in countries with more developed financial markets. Levin (1997) asserted that banks do have a crucial role in the economic growth of countries. Guiso, Sapienza, and Zingales (2004) found that local financial institutions aid growth. Moreover, Benfratello, Schiantarelli, and Sembenelli (2008) showed that banks matter for process innovation but have little impact on product innovation.

The financial development theory focuses mostly on how financial institutions fund new investments. Recent empirical work has also suggested the importance of working capital and

the availability of liquidity for small enterprises in urban areas of developing countries which financial institutions provide (Banerjee et al., 2013; De Mel McKenzie, and Woodruff, 2008).

On the other hand, some economists neglect the importance of the financial sector. As such, Robert Lucas (1988) asserted that economists "badly over-stress" the role of financial factors in economic growth, while development economists frequently express their skepticism about the role of the financial system by ignoring its role in economic growth and development (Chandavarkar,1992). However, in the case of Israel, UAE, and especially Lebanon, the financial institutions, precisely banks, have shown effective contribution to economic growth.

Lebanon emphasizes on its healthy banking sector which acts as the country's backbone. In line with the previous years, Lebanese banks preserved their role as buffers against the recurring headwinds of an uncertain economy.

For Israel, one of its Central Bank's functions is "managing monetary policy", the Bank's major area of responsibility and the focus of its influence on the economy (Bank of Israel, n.d.).

In the UAE, Hassan and Al-Mazrooei (2007) examined the UAE bank's risk management practices and techniques. Al Zaabi (2011) studied the emerging market (EM) by using a Z-score model (Z-scores are used to predict corporate distress status of financial companies) to predict bankruptcy of major Islamic banks in the UAE.

Zaki, Bah, and Rao (2011) explored the probability of financial distress of UAE financial institutions. Al-Tamimi (2012) examined the relationship between corporate governance practices of UAE national banks and performance level. However, the emphasis of this research paper is the analysis of the general performance and stability of the aggregation of banks in Lebanon, Israel and the United Arab Emirates.

Factors Affecting Banks' Performance and Efficacy

Several recent studies have attempted to determine the factors affecting banks' performance and efficacy, as well as to predict them. Recent research on the prediction of Turkish banks defaults by Ozkan-Gunay and Ozkan (2007) with the help of neural networks indicates that the majority of defaults could be foretold and it could be used to find special signals of possible problems. Contrary to the research of Ravi et al. (2008), Ozkan-Gunay and Ozkan (2007) predicted not the efficiency or performance of a bank, but default. Naturally, default prediction would be more accurate, because a number of output variables are determined more clearly. Shih et al. (2007) used 112 commercial banks' 10 financial ratios, which represent a technical efficiency of Chinese banks to obtain four performance indicators ,and found significant dependence of political and economic factors on the performance of Chinese banks rather than peculiar banks' attributes (e.g. size).

Olson and Zoubi (2011) run a comparison of performance indicators, calculated with the help of accounting and economic data of 527 banks in 10 Middle East and North Africa (MENA) countries for 2000-2008. Analyzing MENA banks, it was found that banks in developing countries are efficient alike. It is stated that MENA banks are relatively profit-efficient and most of them are below the optimal size. As opposed to the research of Ravi et al. (2008) and Shih et al. (2007), a current dataset was used, and the time period was more extensive. More importantly an attempt to estimate indicators efficiency was made which supported their results that concentration on profit efficiency is more important than cost. Fethi and Pasiouras (2010) argued that commonly used bank specific factors which determine efficiency and performance of banks are size, profitability, capitalization and loans to assets.

Analyzing Banks' Performance and Stability

To analyze a bank's performance and stability, the CAMELS approach is a widely used approach which considers the bank's Capital adequacy, Asset quality, Management capabilities, Earning sufficiency (profitability), Liquidity position, and Sensitivity to market risk.

By definition, the capital adequacy described in terms of the proportion of the bank's assets that is funded with capital, indicates that a bank has enough capital to absorb potential losses without severely damaging its financial position.

Asset quality includes the concept of quality of the bank's assets—credit quality and diversification—and the concept of overall sound risk management.

Management capabilities refer to the bank management's ability to identify and exploit appropriate business opportunities and to simultaneously manage associated risks.

Earnings refer to the bank's return on capital relative to cost of capital and also include the concept of earnings quality.

Liquidity refers to the amount of liquid assets held by bank relative to its near-term expected cash flows. Under Basel III, liquidity also refers to the stability of bank's funding sources.

Sensitivity to market risk pertains to how adverse changes in markets (including interest rate, exchange rate, equity, and commodity markets) could affect the bank's earnings and capital position (CFA Institute, 2019).

RESEARCH METHODOLOGY

Secondary data solicited from published reports and other external sources of information (mainly the World Bank, IMF, and the Central Banks of the concerned countries in the paper) act as the basis of the analysis of the Lebanese, the Israeli, and the Emirati banking sectors. Information about the operating environments, their performance in details, regulatory

supervision, stress tests, and their contribution to the respective economies is presented. The gathered data represent

The current situation of the banking sectors under study. After gathering data, a survey is conducted to evaluate the Lebanese people's perception of the three banking sectors in terms of quality of assets, transparency, liquidity & capital adequacy, risk, profitability, and regulatory supervision. It is important to note that factual answers are not expected in the survey, especially concerning Israel and the UAE; responses are merely opinionated ratings. The questionnaire in this paper is used as a main instrument to collect data.

The survey targets the future generation embodied as university students, and the current generation of Lebanese citizens in the business, banking and other fields. Data is solicited via 500 questionnaires (the questionnaire was designed by the researchers of this paper) with respondents within the targeted criteria selected at random.

ANALYSIS AND FINDINGS

Banks' Operating Environment

The banking sectors of Lebanon, Israel and the UAE are open to foreign markets and thus affected by global considerations and regional conditions. This demands an analysis of the regional environment before examining domestic market considerations.

Global Environment

There has been tightening global financial conditions despite slight improvement during the year 2018 due to "rising policy uncertainties and deepening country-specific vulnerabilities that generated bouts of heightened financial market volatility in 2018. Investor sentiments were affected by escalating trade tensions, high levels of debt, elevated geopolitical risks, oil market developments, and a faster than anticipated rise in FED policy rates in the United States" (UN World Economic Situation and Prospects, 2019).

On a more positive note, global economic growth appears firm as it accelerated in more than half of the world's economies. Large tax cuts and increased public spending resulted in an improvement in investment and consumer confidence in the US, while continued accommodative monetary policy efforts lifted Japan's and the Euro area's growth. Steps towards monetary policy normalization took place in the US resulting in a rise in policy interest rates to the range of 1.25 – 1.5% during 2017. This resulted in increasing divergence in monetary policies among the developed economies, with the European Central Bank and the Bank of Japan upholding the policies of negative interest rates and quantitative easing.

Furthermore, as commodity prices recovered, and with OPEC's production cuts, growth prospects in resource-rich emerging economies was boosted. (World Bank, 2018)

Lebanon

Lebanon has a private and liberal economic activity as the private sector covers the totality of economic sectors and contributes to almost 75% of aggregate demand. Furthermore, the Lebanese economy has a large and solid banking sector that provides an important support to aggregate demand. The Lebanese economy is service-oriented and its main growth sectors include banking and tourism (BDL, 2017). .

Israel

Israel has a technologically advanced free market economy. It is an industrialized country with most of its manufacturing, including many traditional fields, based on intensive and sophisticated research and development, as well as high-tech processes, tools, and machinery. Its economy is growing strongly and continues to record remarkable macroeconomic and fiscal performance (Bank of Israel, 2018).

UAE

The UAE currently has an open economy with a high per capita income and a sizable annual trade surplus. Successful efforts at economic diversification have reduced the portion of GDP from the oil and gas sector to 30%. The government has also increased spending on job creation and infrastructure expansion and is opening utilities to greater private sector involvement. The country's free trade zones - offering 100% foreign ownership and zero taxes - are helping to attract foreign investors (CBUAE, 2018).

Performance Analysis

Banks' Activity

Lebanon has 65 banks (16 of which are investment banks), while the UAE has 60, and Israel has 12 banks. The banking system of the countries concerned includes both foreign and domestic banks.

Deposits

Lebanese banks' growth activity remained on track for the past eight years. Deposit growth has been consistently growing as shown in the following graph (figure 1).

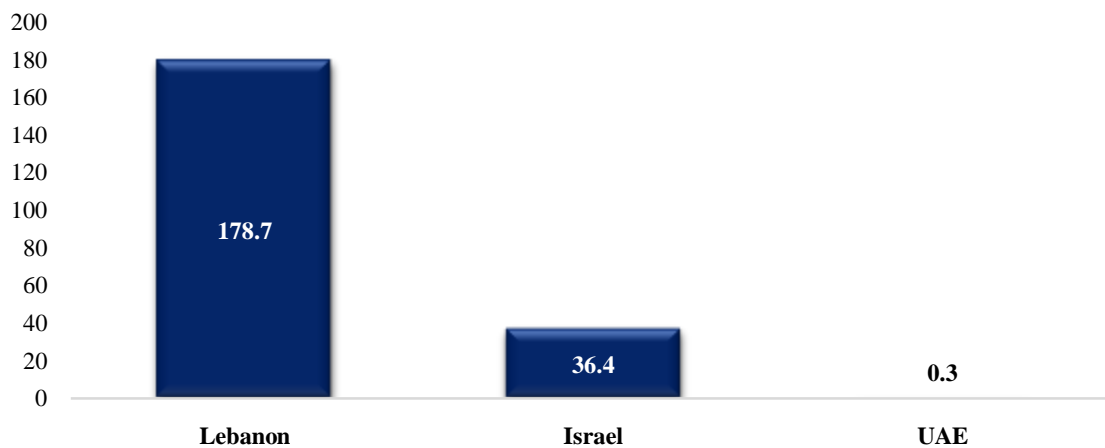
Figure 1: Lebanon's Deposit Growth



Source: Retrieved from Economena Analytics

In fact, banks' main activity driver, consumer deposits, had a YOY (Year Over Year) (16/17) growth of 3.3% which is lower than the previous year's growth, yet, still a solid improvement despite the tightening economic conditions especially affected by the Prime Minister's resignation crisis by the end of the year. Lebanon's consolidated deposits (USD 178.7 bn) are 5 times Israel's (USD 36.4 bn), and 596 times UAE's (USD 0.3 bn), (see figure 2).

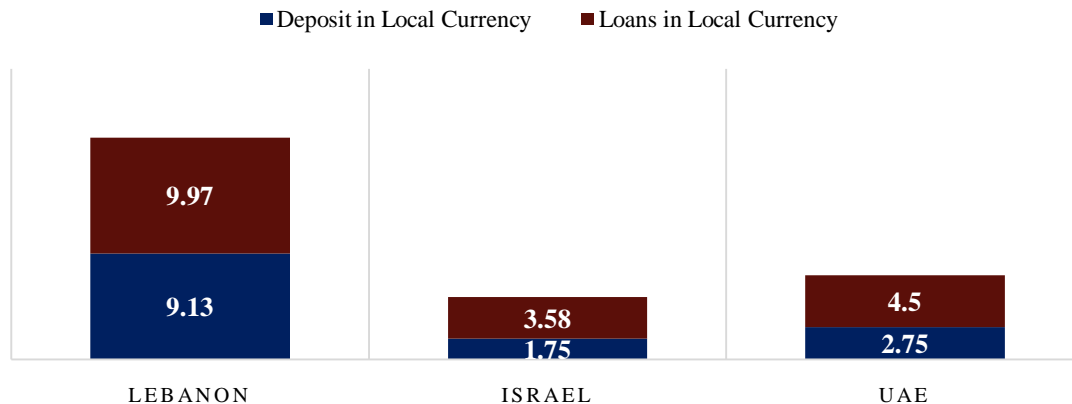
Figure 2: Lebanon's Banking Sector's Deposits in USD Billion 2018



Source: Data retrieved from the respective Central Banks of each country

The continuous success of the Lebanese banks in attracting deposits is namely due to high interest rates and sound reputation. There is a considerable difference among Lebanon's, Israel's and the UAE's rates. As shown below, Lebanon's deposit interest rate is 9.13% as opposed to Israel's 1.75% and UAE's 2.75%. Similarly, the loans interest rates are 9.97% compared to 3.58% and 4.5 % (see figure 3).

Figure 3: Interest Rates



Source: Data retrieved from the respective Central Banks of each country

It is worth mentioning that Israel's banking sector is conservatively funded by domestic deposits. Regardless of low interest rates, banks benefit from a solid core customer deposits which grew by 3.8% during 2017; they amounted to 72.3% of GDP in 2016 (Bank of Israel, 2018).

As for the UAE, its banking sector's overall funding conditions remained solid as shown in the most recent CBUAE 2017 report calculations. This is portrayed by an on-going increase of deposit growth rates which is the banking sector's predominant funding base. In fact, deposits grew by 5.5% in 2017 showing a slight slowdown in growth rate from 2016, while corporate and retail categories continue to account for the largest share. Its bank deposits to GDP ratio was 90.1% in 2016 (CBUAE, 2018).

Foreign Reserves

Foreign reserve is defined by the IMF as external assets that a country's monetary authority can use to meet the balance of payments financing needs, affect currency exchange rates in currency exchange markets, and other related purposes. In the same context, foreign funds act as a hedge against Lebanon's high public debt as well as a shield for the Lebanese Pound peg¹

¹A dollar **peg** is when a country maintains its currency's value at a fixed exchange rate to the U.S. dollar.

against the US Dollars. As such, international reserves of the BDL have increased to reach USD 43.9 bn as of December 2018 (BDL, 2019).

On the other hand, Israel's strategy to increase foreign exchange (forex) reserves slightly differs. The Bank of Israel reported that the country's foreign exchange reserves at the end of December 2018 stood at USD 115 bn, an increase of USD 223 million from their level at the end of the previous month. The increase was the result of:

- a. Foreign exchange purchases by the Bank of Israel totaling USD 226 million, all of which were part of the purchase program planned to balance the effects of natural gas production on the exchange rate.
- b. Government transfers from abroad totaling USD 338 million.
- c. Private sector transfers of USD 17 million. (Bank of Israel, 2018)

As for the UAE, net international reserves touched USD 94 bn by end-November 2018. The CBUAE holds large stocks of foreign assets held in sovereign wealth funds (SWFs) such as precious metals, hedge funds etc., to ensure adequate external buffers for external stability.

Lending Activity

Lending activity has been rising in Lebanon, countering the slowdown of economic activity. The 2017 consolidated figures show a net increase of USD 1.7 bn in issued loans. Its decomposition includes a USD 2.7 bn increase in LP loans along with a USD 975 million (Bank Audi, 2018).

Israel's consumer lending showed strong growth in 2018, after lower growth figures in 2016 and 2017. It is important to note that the lion's share of credit belongs to the households and more specifically, housing loans or mortgages at an average of 26.5% of GDP during 2017 (IMF, 2018).

The UAE's lending activity is still on the rise; however, it marked a slowdown in growth during the year 2017 (1.7% increase as compared to 6% in 2016). Although lending to the corporate sector grew slower during 2017 than the previous year, it still chiefly contributed to the consolidated loan growth. It expanded by 5.5% as opposed to 11.2% previously (ibid).

Liquidity and Capital Adequacy

Lebanon

Considering the high-risk profile of Lebanon, banks have traditionally upheld high liquidity ratios, mostly as a safe practice to remain afloat in crises and absorb rushes and liquidity flights. Under the same logic, BDL imposes high rates of legal reserves (15% and 10% respectively for USD and LP deposits). In fact, banks' liquid assets to total assets rose from 26.49% in 2016 to

31.93% in 2017. Furthermore, part of Lebanon's regulations dictate that common equity Tier 1 ratio, which is the ratio of the banks' common equity capital and disclosed reserves to its total risk-weighted assets, and the Tier 1 capital ratio should read 10% and 13% respectively by the end of 2018. The Capital conservation buffer must reach 4.5% as well. Banks are required to abide by the regulations dictated by the central bank which aim to improve the solvency and protect the banking sector from shocks (Bank Audi, 2018).

Israel

The recent favorable macroeconomic conditions have boosted the banking sector's ability to absorb losses and contributed to the decline in credit risks. Moreover, Israeli banks' liquidity standpoint exceeded the Banking Supervision Department directive of implementing a minimum threshold requirement of 100% coverage ratio by January 2017, which mirrors Basel II's requirement. Furthermore, Israel's capital adequacy ratio of 14.5% also exceeds Basel II and III requirements (8%) The Common Equity Tier 1 capital ratio reached 11.1% in 2017.(The Economist Intelligence Unit, 2018).

UAE

The UAE's banking system asset allocation shifted toward liquid assets due to the slowdown in lending and sustained funding conditions during 2017 which in turn improved liquidity conditions. This is shown in the rise in liquidity buffers above the 10% regulatory requirements. The Eligible Liquid Asset Ratio (ELAR) which is the ratio of the stock of eligible liquid assets to total liabilities (excluding liabilities allowed in the regulatory capital base) also increased to 18.2% at the end of 2017 (2016: 16.2%). Liquid assets to total assets amounted to 14.2% during the first half of 2018 and the capital adequacy ratio is securely above Basel II requirements (8%) settling at 17.9%. The Common Equity Tier 1 Capital Ratio was recorded at 14.6% by end-2017 (CBUAE, 2018).

Table 1: Loan to Deposit Ratios 2017

Lebanon	Israel	UAE
38%	85%	89.2%

A final comparison on liquidity is through the loan to deposit ratios of each banking sector. Lebanon scored the highest in liquidity as deposits exceeded loans as shown in the ratios below (table, 1) retrieved from the respective Central Banks.

Assets Quality

Lebanon

Lebanon's banking assets amount to USD 221 bn. These assets are 426% of GDP. The consolidated gross doubtful loans² which are loans for which fuller payment is questionable and uncertain continued to represent 6.7% only of gross loans at end-December 2017, (Bank Audi, 2018). In short, Lebanon's asset quality reported a relative stability during 2017. The IMF reported in 2016 that the non-performing loans (NPL) to gross loans reached 10.4% and loan-loss reserves covered 86% (IMF, 2017).

Israel

Total assets in the hands of the banking sector of Israel amounted to USD 431.2 bn in 2017 occupying 123.1% of GDP. Its asset quality remains solid as the NPL continued to represent 1.4% during end-December 2017, similar to the ratio of 1.4% during 2016. The non-performing loans net of provisions to gross loans approximates at 1.1% during the same year (IMF, 2018).

UAE

The banking sector holds USD 734 bn of total assets which constitutes 191% of GDP. The UAE's banks' NPL ratio slightly rose in 2017 to 6.7% compared to 6.4% in 2016 reflecting both the increase in the outstanding amount of NPLs and the slower loan growth during the year. Asset quality of retail lending has gradually declined, especially in mortgage lending and credit card segments. NPL ratio for retail sector weakened to 4.6% in 2017 (CBUAE, 2018).

Profitability

It is important to portray the following equations to better understand the collected information.

$$\text{Return on average assets} = \frac{\text{Net income after taxes}}{\text{Total Average Assets}}$$

$$\text{Total average assets} = \frac{\text{Total Assets (at the beginning of period)} + \text{total assets (at the end of the period)}}{2}$$

$$\text{Return on Equity} = \frac{\text{Net Income}}{\text{Total Equity}}$$

$$\text{Cost to Income Ratio} = \frac{\text{Operating Costs}^3}{\text{Operating Income}}$$

$$\text{Net Interest Margin}^4 = \frac{\text{Earning from loans and other assets} - \text{Interest paid on borrowed funds}}{\text{Average Earning Assets}}$$

$$\frac{\text{Net Interest Income}}{\text{Average Earning Assets}}$$

²Doubtful loans are nonperforming loans on which interest is overdue and the full collection of the principal is in jeopardy.

³Include administrative and fixed costs but not bad debts that have been written off

Lebanon

The Lebanese banking sector's consolidated net profits had an annual growth of 4.4% to reach USD 2.6 bn in 2017. The return on average assets stabilized at 1.04% in 2017 (1.06% in 2016), while the return on average common equity dropped from 12.18% to 11.76% and return on average equity reported 10.84%. The interest margin reported a slight decline from 2.56 in 2016 to 2.0% in 2017, and the non-interest income to average assets declined from 1.66% to 0.93% generating a retreat in asset utilization from 3.58% to 2.87%. This was yet offset by a noticeable rise in the net operating margin from 29.52% to 36.11% mainly tied to the drop in the credit cost from 14.71% to 6.65%, while cost to income rose from 44.3% to 49.06% over the same period (Bank Audi, 2018).

Israel

Israel's banking sector's profitability continued to improve in the year 2017. The interest margin to gross income marked a noticeable increase to 61.9% in 2017 from 58.6% previously. Return on average assets remained constant at 1.0% and the return on average equity relatively stable at 13.7% compared to 13.9% previously. Non-interest expenses to gross income are gradually decreasing to 64.9% compared to 67.1% end-2016 (Bank of Israel, 2018).

UAE

The main contributor of the banking system's 10% increase in profitability was the sharp 13% increase of non-interest income. The consolidated net profits of 2017 reached USD 10.5 bn. The net interest income grew by 0.6% compared to -1.3% in 2016, however, it was less of a contributor to the overall profitability. As a result, the return on assets (ROA) improved to 1.5%. Nonetheless, the cost-to-income ratio edged higher to 39.1% because of the higher growth rate in operating expenses compared to total operating income. Furthermore, return on equity (ROE) recorded a slight improvement of 1.5% reaching 12.2% (CBUAE, 2018).

Soundness of Banks Index

The World Bank through the world economic forum assesses the soundness of banks through the Soundness of Banks Index. Examiners evaluate the nature of the banks' operations, the adequacy of internal controls and their internal audit function, as well as their compliance with laws and regulations.

⁴This ratio calculates how much money banks are making on its investing operations

The Soundness of Banks Index is measured by a 1-7 margin as: 1 = extremely low-banks may require recapitalization; 7 = extremely high-banks are generally healthy with sound balance sheets (The World Bank, n.d.)

Israel shows the highest among Lebanon and UAE with an index of 6.05 out of 7 and Lebanon, the lowest, 5.4 during 2017 (table, 2).

Table 2: Soundness of Banks Index

Lebanon	Israel	UAE
5.4	6.05	5.78

Regulatory Supervision

A bank is a risky business with the possibility of default. A failure in the system is likely to have a severe impact on the functioning of the economy and those who deposited their money in the banks. Banking regulation and supervision play an important and leading role on the stability of the banking system, especially after the financial crisis. Lebanon, Israel, and the UAE follow similar internationally recognized laws as well as some tailored regulations.

Lebanon

Lebanon established the Banking Control Commission (BCC) during 1967. The BCC is the bank supervisory authority responsible for supervising banking activities and ensuring compliance with the various financial and banking rules and regulations. Banking activities are also subject to both the Code of Commerce which was established in 1942 and the Code of Money and Credit (1963). Moreover, the Higher Banking Commission (HBC) is a quasi-judicial body forming part of the BDL. The HBC can impose administrative sanctions (ranging from a warning to the revocation of a bank's license), should it determine—based on reports presented by the BCC to the governor—that a bank has violated provisions of the Code of Money and Credit (IMF, 2017).

Israel

Israel established a Banking Supervision Department to supervise the stability of the banking corporations – avoiding excess risks to their stability and protecting depositors' money; to ensure that the banking corporations are managed properly; and finally, to maintain fairness in bank/customer relations. The Israeli banking system also abides by the Prohibition on Money Laundering Order since 2001, several laws on proper conduct of banking business, reporting to the supervision department, regulatory accounting standards as well as liquidity and reserve ratios (Bank of Israel, 2018.).

UAE

The UAE Central Bank is primarily responsible for overseeing banks in the United Arab Emirates, except in the Dubai International Financial Centre (DIFC), where the regulatory authority is the Dubai Financial Services Authority and, in the Abu Dhabi, Global Market, where the regulatory authority is the Financial Services Regulatory Authority (CBUAE, 2018).

Contribution to the Economy

Lebanon, Israel, and the UAE have their own unique way of boosting the economy through the banking sector.

Lebanon

The Central Bank of Lebanon is not only devoted to ensuring the soundness of the banking sector but also has proven to be dedicated to promoting economic and social stability. In fact, it has taken a leading role in stimulating the Lebanese economy by fostering growth and combating unemployment by providing credit incentives to the private sector offered through commercial banks. Furthermore, with BDL's support to the knowledge economy, Lebanon has ranked second among 54 world economies in the Entrepreneurship Spirit Index, and fourth in both Total Early Stage Entrepreneurial Activity and in Entrepreneurial Impact in Innovation, according to the GEM (Global Entrepreneurship Monitor and annual Global Report 2017/2018).

Israel

The largest contributor in the development of the Israeli economy is the high-tech sector which combines the industrial sectors in the electronics, pharmaceuticals and aircraft sectors alongside services – software and research and development. The start-ups that have been added in recent decades are in fact financed by venture capital funds as well as research and development centers of multinational companies, and not from banks. Israeli commercial banks mostly finance housing loans and mortgages. The Bank of Israel's role in managing monetary policy is focused on regulating inflation and maintaining price stability. The central bank sets an inflation target and the objective of the monetary policy is to attain that target. The stability of prices creates a business environment that supports sustainable economic growth which is the bank's major area of responsibility (Bank of Israel, 2018).

UAE

The UAE's banking sector's plays a dynamic role in the country's economic development through the mobilization of financial resources and offering the needed financing of investments.

The lion's share of lending belongs to corporate businesses. In Dubai, SMEs constitute to 95% of businesses and only 25% of those businesses have accessed bank finance. The numbers are similar in the rest of the emirates. However, corporate firms contribute to GDP more than the SMEs (CBUAE, 2018).

Risk and Stress Testing

Lebanon

The IMF has conducted stress tests to estimate the impact of severe shocks on the banks. The test bases and compares its results with a scenario which reflects the current estimated IMF projections as of March 2016, with a weak economic environment, GDP growth of 1 percent in 2016 that increases modestly to 3 percent in 2019. No fiscal or macroeconomic policy changes are assumed.

The test examines results under three different scenarios. The first assumes that the Syrian war and domestic political difficulties further undermine investment and confidence, with growth falling further and staying low. The second scenario compounds the first scenario with a fall in real estate prices of -23.5% over two years, leading to an additional impact on growth from lower construction activity and consumption, and lower values of loan collateral. The third and final scenario starts from the current IMF growth projections and assumes a stronger than expected rise in USD interest rates, and an increase in risk aversion among global emerging market investors, leading to a rise in the country risk spread over one year across the yield curve.

The results emphasize on the capital needs emerging under the three tested scenarios driven by credit and interest rate risks, as well as real estate price. The banks use their capital conservation buffers, reducing the CAR from 12% to 9.5% which is still above the Basel capital requirements. Lower growth in the scenarios leads to loan losses that would require additional provisions, with the real estate price shock in second scenario having additional effects on growth through construction sector output and consumption, as well as lowering collateral values (IMF, 2017).

Israel

According to the results of a 2014 stress test conducted by the Bank of Israel, there is no threat on the stability of the local banking system in case the economy undergoes a severe recession. The scenario included a domestic recession with a great impact on the housing and real estate sector as a result of deterioration in the geopolitical situation. This scenario revealed that a

significant impact on the banking system is expected on the level of credit and market risk, but not on its overall stability (ibid.).

UAE

The CBUAE conducted a stress test in 2017 with a scenario reflecting stressed economic and financial conditions and addressing two potential threats to financial stability. The test mainly focused on the assessment of the impact of risk drivers – credit risk, market risk, and counterparty risk – on the solvency of banks as well as their pre-impairment profits. The first threat is a more significant than anticipated monetary tightening in the United States, augmented by capital outflows in the UAE which triggers severe negative effects on banks' asset prices; and the second is a prolonged low oil price which affects oil and non-oil GDP growth in the UAE (CBUAE, 2018).

Strengths and Weaknesses

Lebanon

Strengths

- Resilient to the volatile political and constrained economic environment
- Strong liquidity and deposit base
- Supportive authorities with a good track record of crisis management
- Effective banking regulation and supervision

Weaknesses

- High sovereign exposure
- Weak, although improving, asset quality at the system level
- Sensitive to geopolitical stability and Syria's instability
- Fluctuating macroeconomy and political stability
- Deposits are ultimately sensitive to a deterioration in confidence

Israel

Strengths

- Strong capital adequacy and liquidity levels
- Adequate banking regulation and supervision
- Stable funding from a sound core customer deposit base
- Resilient Israeli economy

Weaknesses

- Heavy exposure to the residential property market leaves Israeli banks vulnerable to a sharp correction in house prices
- Sensitive to risks stemming from geopolitics and wealth inequality
- Stagnant bank lending to the business sector may impair profitability

UAE

Strengths

- Strong capital, resilient profitability and solid funding
- Promising macroeconomic conditions
- Effective regulations

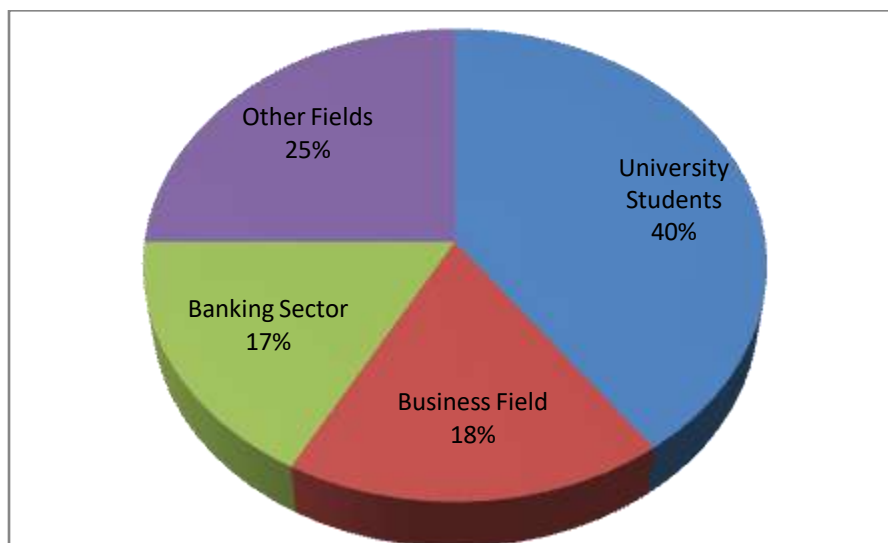
Weaknesses

- Affected by geopolitical stability
- Tied economically by oil demand and prices, though decreasing with non-oil sectors
- Impaired lending to SMEs and individual borrowers
- High NPL levels though expected to decrease as economy improves

Analysis of the survey responses

The survey of 500 respondents included 40% university students, 18% employees from the business field, 17% employees from the banking sector and 25% employees from other fields (figure 4).

Figure 4: Respondents of the Survey



The majority of the respondents believe that the Lebanese banking sector

- Has average quality of services (48%)
- Has average asset quality (62%)
- Has average transparency (37%)
- Has average liquidity (54%)
- Has government debt as the major risk factor (55%)
- Is very profitable (56%)
- Is excellently supervised and regulated by the central bank (40%)

They are also unsure about the questions asked in the survey concerning Israel and the UAE. It is important to note that “unsure” means the respondent does not have an opinion or prior knowledge about the questions asked.

The rest of the respondents answered the following concerning Lebanon: Quality of Services: High 37%, Low: 7%; Quality of Assets: High: 15%, Low: 12%; Transparency: Limited: 36%, High: 18%; Liquidity: High: 18%, Low: 12%, Major risk: Geopolitical risk: 38%, Recession: 9%; Profitability: Average: 27%, Limited: 11%; Supervision: Average: 33%, Unsatisfactory: 16%. The remainders were “unsure”.

Concerning Israel: Quality of Assets: High: 18%, Average: 6%, Low: 3%; Transparency: High: 3%, Average: 10%, Limited: 5%; Liquidity: High: 5%, Average: 12%, Low: 1%, Major risk: Geopolitical risk: 22%, Recession: 3%; Profitability: High: 10%, Average: 8%, Limited: 2%; Supervision: High: 10%, Average: 5%, Unsatisfactory: 2%. The remainders were “unsure”.

Concerning the UAE: Quality of Assets: High: 25%, Average: 10%; Transparency: High: 13%, Average: 17%, Limited: 8%; Liquidity: High: 23%, Average: 15%, Low: 1%, Major risk: Geopolitical risk: 13%, Government Debt: 4%, Recession: 17%; Profitability: High: 29%, Average: 12%, Limited: 4%; Supervision: High: 23%, Average: 17%, Unsatisfactory: 1%. The remainders were “unsure”.

If the answers are aggregated, the future generation (below 20 and 20-30 year of age university students) views the Lebanese banking sector as follows (figure 5):

- Has average quality of services
- Has average asset quality
- Has limited transparency
- Has average liquidity
- Has the government debt as the major risk factor
- Is very profitable
- Has average regulatory supervision

As for the UAE and Israel, most of the respondents responded with “unsure”.

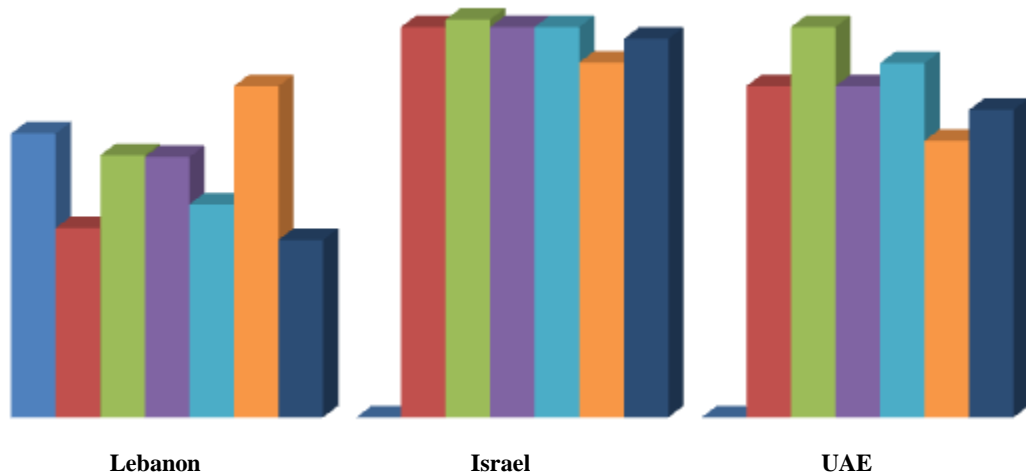
The current generation (employees in the business field, banking sector, and other fields) view the three banking sectors as follows (figure 6):

Lebanon-

- High quality services
- Average quality of assets
- Average transparency
- Average liquidity
- Government debt is the major risk factor
- High profitability
- Excellent supervision

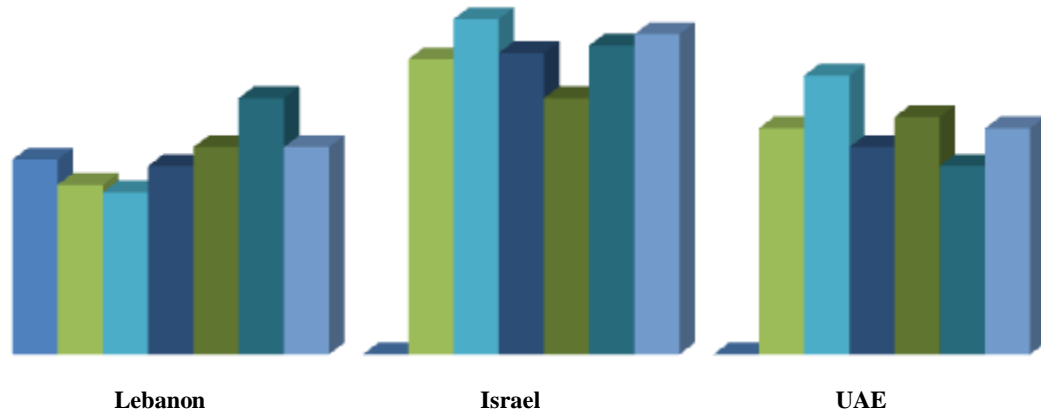
As for the UAE and Israel, most of the respondents responded with “unsure”.

Figure 5: Majority of Future Generation Responses



- Average Quality of Service: 62%
- Lebanon: Limited Transparency (41%); Israel (85%) & UAE (72%): Not Sure
- Lebanon: Average Quality of Assets (57%); Israel (86%) & UAE (84%): Not Sure
- Lebanon: Average Liquidity (56.41%); Israel (84.61%) & UAE (71.79%): Not Sure
- Lebanon Major Risk Factor: Government Debt (46%); Israel (85%) & UAE (77%): Not Sure
- Lebanon: High Profitability (72%); Israel (77%) & UAE (60%): Not Sure
- Lebanon: Average Supervision (39%); Israel (82%) & UAE (67%): Not Sure

Figure 6: Majority of Current Generation Responses



- High Quality of Service: 52%
- Lebanon: Average Transparency (41%); Israel (85%) & UAE (72%): Not Sure
- Lebanon: Average Quality of Assets (43%); Israel (89%) & UAE (74%): Not Sure
- Lebanon: Average Liquidity (50%); Israel (80%) & UAE (55%): Not Sure
- Lebanon Major Risk Factor: Government Debt (55%); Israel (68%) & UAE (63%): Not Sure
- Lebanon: High Profitability (68%); Israel (82%) & UAE (50%): Not Sure
- Lebanon: Excellent Supervision (55%); Israel (85%) & UAE (60%): Not Sure

CONCLUSION

The banking sector in Lebanon acts as a key pillar to economic growth and its toughest concern lies in the country's fluctuating macro- economy and geopolitical risks. Nevertheless, the banking sector has shown exceptional resiliency and no signs of instability. The sector has stable profitability, sound liquidity, a more than comfortable capital adequacy position, sturdy and effective regulations, and is expected to remain strong in the near future. The Lebanese people's perception of the Lebanese banking sector falls slightly out of line from reality. The only differences are that it has above average strong liquidity, and profitability is relatively average. Also, the Lebanese people are not informed well enough to compare Lebanon to the top banking sectors in the region i.e., Israel and UAE. This paper proves that Lebanon is in fact among the most stable banking sectors in the region, and is performing better than what the Lebanese perceive, and could sustain its regional competitiveness in the future.

Recommendations for Lebanon

- The burden held by the BDL and the dependence on deposits to cover financing needs must be reduced through the improvement of the budget deficit and the public debt

- There are no legal limits on sovereign risk where there is a large concentration, thus, it is recommended to follow the Basel committee's principle of limiting sovereign risk exposure
- The BDL must require banks to periodically submit multi-factor stress tests
- Improve regulations on asset quality provisions
- Improve awareness about top banking sectors in the region and how Lebanon's banking sector is doing compared to regional benchmarks

Limitations of the Study

Information utilized by this paper as displayed to the public is limited and chosen by authorities; some detailed information may not be disclosed which limits the accuracy of the study. Authorities should be more transparent in the dissemination of data to assist in the accuracy of future researches.

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