FINANCIAL STABILITY REPORT 2021

FINANCIAL STABILITY DEPARTMENT

PREFACE

The Financial Stability Report 2021 (JFSR 2021) reflects the Central Bank of Jordan's (CBJ) continuous endeavors to strengthen the stability of the financial and banking sector in the Kingdom, as well as to avail sufficient data about different aspects of Jordan's economy and financial sector. Under the CBJ's amended Law of 2016, the CBJ's objectives were broadened to explicitly include preserving financial stability as a main objective alongside achieving monetary stability. Financial stability is intended to enhance the capacity of banks and other financial institutions to withstand risks and to limit any structural imbalances as well.

In 2021, the global economy was on a gradual recovery path from the repercussions of COVID-19 pandemic, thanks to the exceptional measures taken by most countries worldwide to contain the COVID-19 crisis and its economic ramifications, which fueled positive economic growth rates in developed and emerging economies. The global economy improved strongly with a growth rate of 6.1% in 2021, compared to a contraction of 3.1% in 2020. This positive growth is mainly due to loosening restrictions and lifting lockdowns, as well as shifting to new ways of working and the widespread vaccinations against COVID-19.

As for Jordan's economy, a recovery is underway; the growth strengthened to 2.2% in 2021, compared to a contraction of -1.6% in 2020, supported by the stability of the epidemiological situation in Jordan, as well as the precautionary and overarching measures conducted by the government and the CBJ to support households and various economic sectors and alleviate the implications of COVID-19 pandemic. According to the CBJ and International Monetary Fund (IMF) forecasts, the growth is expected to reach 2.7% in 2022 as well as in 2023, revised up from 2.4% in the last IMF's forecasts to 2.7%. This favorable outlook reflects a great confidence in the national economy and Jordan's financial and economic reforms as well.

The banking and financial sector in Jordan remained stable in 2021 and the first half of 2022, despite the adversities in Jordan and globally which were shaped by COVID-19 pandemic and subsequent supply chain disruptions, as well as the global geopolitical tensions in particular the Russian-Ukrainian crisis, which added significant headwinds to the economic and financial conditions in Jordan and worldwide. The banking sector in Jordan is sound and robust, and broadly resilient to shocks and high risks, as banks enjoy high levels of capital and comfortable levels of liquidity and profitability.

The CBJ will keep improving this Report taking into consideration the developments of the domestic, regional, and international risks to enhance the pillars of the financial stability in the Kingdom. This report is published online on the CBJ's website http://www.cbj.gov.jo.

The Governor

Dr. Adel Al-Sharkas

EXECUTIVE SUMMARY

GLOBAL FINANCIAL STABILITY:

The global economy remained resilient amid the COVID-19 crisis, thanks to the exceptional measures taken by most countries worldwide, in terms of their fiscal and monetary policies. This contributed to warding off the risks of the pandemic on global economic activity and on financial stability.

In 2021, the global economy was on gradual recovery path from the implications of covid-19 pandemic, thanks to exceptional measures conducted by most countries worldwide, to contain the pandemic and its economic ramifications

The global growth improved markedly at 6.1% in 2021, compared to a contraction of -3.1% in 2020, supported by easing restrictions and lifting lockdowns, as well as economies being adapted to new patterns of working conditions and the widespread vaccinations.

However, after two years and a half since the onset of the COVID-19 pandemic, the uncertainty weighs on the world economic outlook, due to global supply chain disruptions as well as the negative repercussions of the Russian-Ukrainian crisis. The war and resulted humanitarian implications contributed to severe setback of the global recovery from the repercussions of COVID-19 pandemic, slowdown of economic growth, and the push of inflation rates to high records. The war also led to shortages in the supply of primary commodities, as Russia and Ukraine are the world's largest exporters of wheat and grain, and Russia is one of the world's largest exporters of oil and gas.

The global geopolitical tensions severely set back the global recovery from the COVID-19 pandemic

JORDAN ECONOMY:

The growth strengthened to 2.2% in 2021, compared to a contraction of -1.6% in 2020, supported by the stability of the epidemiological situation in Jordan, as well as the precautionary and overarching measures conducted by the government and the CBJ to support households and various economic sectors. According to the CBJ and IMF forecasts, the growth is expected to reach 2.7% in 2022 as well as in 2023, revised up from 2.4% in the last IMF's forecasts. This favorable outlook reflects a great confidence in the national economy and Jordan's financial and economic reforms as well.

The government and the CBJ proactive and overarching measures substantially contributed to mitigating the repercussions of the covid-19 pandemic on the Jordanian economy

The financial stability in Jordan remained steady, supported by sound economic policies, in particular

Despite of adversities, the financial stability in Jordan remained steady supported by sound economic policies

the monetary and macro- and micro-prudential policies, which continued to support the attractiveness of the Jordanian dinar and to maintain a sound and robust financial sector amid significant adversities.

THE BANKING SECTOR IN JORDAN:

Despite the unprecedented headwinds that hit Jordan, the region, and the world due to COVID-19 pandemic as well as subsequent crises afterwards, the banking sector in Jordan remained sound and resilient in terms of financial and administrative positions. The financial ratios and indicators for banks improved markedly in 2021 and the first half of 2022 compared to 2020, as indicated below:

A remarkable improvement in bank's financial ratios and indicators

- **CAPITAL ADEQUACY:**

The banking system in Jordan enjoys a high capital adequacy ratio (CAR) that ranged between 17% and 21% during the period (2007- June 2022), with a comfortable margin well above the CBJ's minimum requirement of 12% and Basel Committee's minimum requirement of 10.5%. However, the CAR declined slightly from 18.3% at the end of 2020, to reach 18% at the end of 2021, and 17.1% at the end of June 2022, owing to the significant increase in credit during that period; the CAR is still sufficiently higher than the minimum requirement of 12%.

The CAR of the banking sector in Jordan recorded 18% at the end of 2021, and 17.1% at the end of June 2022; sufficiently higher than the minimum requirement

- **QUALITY OF ASSETS:**

The non-performing loans (NPLs) to total loans declined to 5% at the end of 2021, compared to 5.5% at the end of 2020, and declined further to 4.6% at the end of June 2022, which validates that banks' assets are of high quality. As for the provisions coverage ratio of NPLs, it increased to 79.9% at the end of 2021, compared to 71.5% at the end of 2020, and increased further to reach 83.4% at the end of June 2022; the provisions sufficiently cover almost 83.4% of banks' NPLs.

The NPLs of banks are on a downward track, while the provisions coverage ratio is increasing

- **LIQUIDITY:**

The liquidity level of the Jordanian banking sector is comfortable and adequate as evident by the liquidity ratios recorded at the end of 2021. The high-liquid assets accounted for 47.7% of total assets at the end of 2021 against 46.3% at the end of 2020. Legal liquidity increased to 141.5% at the end of 2021, compared to 136.5% at the end of 2020. However, it declined slightly to 136.7% at the end of June 2022, yet it is sufficiently

The liquidity levels of the Jordanian banking sector is safe and higher than the regulations' minimum requirements

higher than the CBJ's minimum requirement of 100%. This slight decline was mainly due to the remarkable credit growth during the first half of 2022, which reflects the increasing demand for credit, as the Jordanian economy started its path for gradual recovery from the repercussions of COVID-19 pandemic.

- **PROFITABILITY:**

In 2021 and the first half of 2022, banks' profits bounced back to their pre-pandemic levels; net profits after tax of banks operating in Jordan reached JD 550.1 million, compared to JD 328.2 million in 2020, increasing by JD 221.9 million, or 67.6%. As banks' profits increased, the Return on Assets (ROA) reached to 1.0% in 2021 as well as in the first half of 2022, against 0.6% in 2020. In addition, the Return on Equity (ROE) increased significantly to 8.3% in 2021 and the first half of 2022, up from 5.1% in 2020.

Banks' profits improved significantly in 2021 and the first half of 2022 bouncing back to their pre-pandemic levels

- **CONCENTRATION IN THE BANKING SECTOR:**

In 2021, the concentration ratio in the banking sector in Jordan continued to decline, while the competitiveness levels kept their upward trending. The assets of the largest five banks out of 23 banks accounted for 54.9% of licensed banks' total assets at the end of 2021, compared to 60% at the end of 2006. This is due to banks endeavors to develop their businesses and products to boost their competitiveness.

The concentration in the banking sector in Jordan continued to decline, while competition levels kept their upward trend

- **CREDIT GROWTH:**

Direct credit facilities grew by 5% at the end of 2021 to reach JD 29.3 billion, compared to a growth of 5.4% in 2020. It is noteworthy, that total credit facilities accounted for 91.2% of GDP at the end of 2021, compared to 90% at the end of 2020. Jordan ranked fourth out of ten Arab countries in terms of credit to GDP ratio, which reflects the vital role of the banking sector in the national economy.

Credit continued to grow reflecting the gradual recovery of the national economy

- **STRESS TESTING:**

Stress testing results, which are used to measure banks' ability to withstand shocks, revealed that the Jordanian banking system is broadly capable to withstand shocks and high risks. A hypothetical scenario was suggested, assuming the negative repercussions of COVID-19 pandemic as well as the ramifications of the Russian-Ukrainian crisis and the challenges they impose on the national economy. This includes increasing prices of energy and primary commodities due to supply chain disruptions, which will set back the growth to less than

Stress testing results revealed that the Jordanian banking sector is broadly capable to withstand shocks and high risks arising from the repercussions of covid-19 pandemic and the Russian-Ukrainian crisis as banks enjoy high levels of capital and sufficient levels of liquidity and profitability

anticipated, as well as increase the unemployment rate, and lead to stock market deterioration. It was also assumed that interest rates will continue to increase to curb inflationary pressures and maintain the attractiveness of the JD as a saving currency. The results of these tests revealed that the CAR of the banking sector in Jordan after assuming the abovementioned scenario is expected to reach 16.9%, 14.7% and 12% for the years 2022, 2023, and 2024, respectively. Accordingly, under the severe scenario, the CAR will fulfill the minimum requirement of 12% applied in Jordan, and the minimum requirement determined by the Basel Committee of 10.5%.

- **THE FINANCIAL STABILITY INDEX IN JORDAN (JFSI):**

This index was developed in 2016, supported by the practices of several countries in building their own indices. The index increased from 0.44 in 2020 to 0.47 in 2021, which indicates that the financial system in Jordan is adequately stable despite the unprecedented adversities that hit Jordan and the world due to COVID-19 pandemic, as well as subsequent crises afterwards. The banking stability index in particular indicates that the banking sector in Jordan is highly sound, resilient, and stable; Jordan ranked first among (23) countries using the same methodology of JFSI.

The JFSI revealed that the banking sector in Jordan is highly stable, despite the unprecedented adversities in Jordan and the world due to COVID-19 pandemic

THE HOUSEHOLD SECTOR:

The household indebtedness increased to reach JD 11.8 billion at the end of 2021, compared to JD 10.9 billion at the end of 2020, increasing by 8.6%. A large part of the increase in households' indebtedness in 2020 and 2021 is explained by the postponements of debt installments due on stressed clients affected by the COVID-19 pandemic, thus it is not a real growth.

The NPLs for the households' loans portfolio declined from 4.9% at the end of 2020 to 4.1% as of end 2021, and declined further to 4% at the end of June 2022, which is a positive indicator that strengthens the financial stability in the kingdom.

The NPLs for the households' loans portfolio continued to decline

THE CORPORATE SECTOR:

The performance of non-financial corporates in all sectors improved significantly in 2021, driven by growing operational performance of these companies as the COVID-19 pandemic ramifications were receding gradually, as well as the notable improvement in most economic indicators in the Kingdom.

The profits of non-financial corporates sector increased markedly to JD 712.9 million in 2021, compared to JD 117.3 million in 2020, as the national economy started its gradual recovery from the implications of COVID-19 pandemic. However, several challenges still weigh on the

A remarkable improvement in the performance of the corporate sector in 2021 compared to 2020, as covid-19 pandemic repercussions started to recede, and most economic indicators in the kingdom were improved. However, several adversities are looming large including supply chain disruptions, and the repercussions of the Russian-Ukrainian Crisis

corporate sector and the national economy in general, especially those related to the increase in prices of energy and primary commodities arising from the supply chain disruptions subsequent to COVID-19 pandemic, and the implications of the Russian-Ukrainian crisis.

THE REAL ESTATE SECTOR:

In 2021, the real estate trading volume increased by 46.9% compared to its level in 2020. The real estate price index (REPI) decreased slightly by 0.5% due to the easing lockdowns especially in the second half of 2021, as well as the reopening of economic sectors, which improved economic conditions, and started the recovery path from the ramifications of COVID-19 pandemic, which had a toll on most sectors including the real estate sector.

The credit facilities extended to the real estate sector totaled JD 5.9 billion, accounting for 20% of total credit extended by banks

It is worth mentioning that credit facilities extended to the real estate sector for residential and commercial purposes grew by 5.8% to reach JD 5.91 billion at the end of 2021 (accounting for 20% of total credit facilities extended by banks), compared to JD 5.59 billion, a growth of 2.8% at the end of 2020.

THE FINANCIAL INCLUSION:

On 4/12/2017, the CBJ launched the National Financial Inclusion Strategy (NFIS) for (2018-2020) under the patronage of his Majesty King Abdullah II and in the presence of the Prime Minister. The Strategy aims at enhancing the access of all segments in the society to the financial services provided by the formal financial sector, in a fair, transparent, and responsible manner. The strategy is intended to achieve two main goals; the first is to raise the level of financial inclusion, measured by the number of adults owning accounts in financial institutions, from 33.1% in 2017 to 41.5% by 2020. The second goal is to reduce the gender gap in terms of access to finance from 53% to 35%.

The NFIs (2018-2020) achievements outperformed targeted levels in the strategy

It is worth mentioning that in 2020, the achievements outperformed their targeted levels in the strategy; as the financial inclusion increased to around 43.1% exceeding the targeted 41.5%, while the gender gap decreased to 22% below the targeted 35%. This validates the tremendous success of implementing the NFIS.

On March 30, 2021, the CBJ issued its first Financial Inclusion Report (2018-2020). The report highlights the continuous endeavors of the CBJ and other stakeholders to achieve financial inclusion objectives according to a set of priority policies and enablers on which the NFIS was built. The report also illustrates the CBJ's main initiatives and projects conducted in collaboration with related stakeholders during the years (2018-2020) to promote financial inclusion in the Kingdom, in addition to the CBJ's

The CBJ started to formulate a new NFIs for the years (2023-2027) which will promote responsible and sustainable access to financial services and products by different segments of society in the kingdom

key measures to warding off the impact of the COVID-19 pandemic on the national economy.
During the last quarter in 2021, the CBJ initiated the formulation of the NFIS for the years (2023-2027), which will emphasize promoting the responsible and sustainable access to financial services and products by different segments of society in the Kingdom. The new NFIS covers new pillars including saving and insurance, to promote inclusiveness of the new strategy and ensure the coverage of all financial services and products provided by banks and other financial institutions.

WOMEN EMPOWEREMENT:

The CBJ adopted further policies and procedures to support and empower women in the economy in general, and in the banking sector in particular. As mentioned above, on the national level, these policies led the financial inclusion to exceed 43.1%, and the gender gap in terms of access to finance to shrink from 53% to 22%, outperforming its envisioned level in the NFIS (2018-2020). However, enabling women's access to financial and banking services and products, and warding off the obstacles deterring her access, will enhance her ability to exercise her rights in a fair financial environment. Accordingly, women's participation will be more vibrant in supporting economic growth, as her ability to save and invest, her management of financial resources, and the success opportunities of her businesses are strengthened, which reflects positively on women, and their families and communities.

The CBJ continued to adopt the policies and measures to support and empower women to access financial and banking services and products tailored to their needs.

Women accounting for 35% of total depositors at banks, and 19% of total borrowers

To support and empower women's participation in the Jordanian banking sector, the CBJ directed a memo to licensed banks on 29/4/2021, through the Association of Banks in Jordan, dedicated to enable women's access to financial and banking services and products tailored to their needs, removing any obstacles deterring their access, and promoting women's participation in banks' boards of directors and senior managements. This will enhance women's ability to exercise their rights in a fair financial environment, which mirrors on positive performance of banks by increasing diversity and efficiency in decision-making, expanding customers base, and increasing banks' market share. This memo suggested a number of proposals and recommendations for banks to address, namely; banks are advised to specify a quota of not less than 20% of representation in their board of directors, and a quota of not less than 25% of women representation in senior management by the year 2024. This is in addition to offering women-friendly financial services and strengthening the institutional culture that support women in banks through: the foundation of a women-friendly and supportive institutional culture and human resources management, putting in place policies that ensure non-discrimination, equal opportunities, and gender equality, as well as building capacity of banks' employees in terms of gender, and preparing and publishing detailed data by gender. It is noteworthy that women represent 35% of total depositors at banks and 19% of total borrowers.

LEGISLATIVE FRAMEWORK:

The CBJ officially brought the insurance sector under its supervision and oversight

In 2021, the CBJ continued its comprehensive review of the legislative framework governing the practices of the banking and financial institutions under its supervision. Chapter Two of this Report illustrates major supervisory amendments conducted by the CBJ in 2021, namely: Insurance Regulatory Law No. (12) of 2021, and the Anti Money Laundering and Counter Terrorist Financing Law No. (20) of 2021, in addition to several significant banking regulations, which were issued to keep up with latest developments and international best practices and experiences regarding the role of central banks in maintaining monetary and financial stability.

The new insurance regulatory law reflects the CBJ's vision and endeavors to strengthen the regulatory and supervisory frameworks for the insurance businesses in line with international standards and best practices, as the CBJ is intending to develop and enhance the stability and soundness of the insurance sector, thus enabling it to perform its envisioned role in serving the national economy. The provisions of this law shall apply to all insurance companies, reinsurance companies, insurance services providers, and all relevant parties, aiming to regulate and supervise the insurance sector, in a manner that ensures the rights of the insured and the beneficiaries, as well as the soundness of the financial positions of insurance and reinsurance companies.

On 27/10/2021, a new bylaw was enacted for finance companies (Finance Companies Bylaw) No. (107) of 2021. The provisions of this bylaw apply to companies practicing the financing business including (microfinance, financial leasing, factoring, mortgage finance, mortgage refinancing, and lending-based crowdfunding), in accordance with the provisions of this bylaw. The bylaw constitutes a legislative framework for financing companies under the CBJ's supervision in terms of licensing requirements and the financial activities they are allowed to practice, including *inter alia* capital requirements, this ensures providing an institutional framework, and setting clear and objective standards for licensing these companies. It is noteworthy that the new bylaw repeals the microfinance bylaw No. (5) of 2015.

The law includes the general policy for combating money laundering, terrorist financing, and proliferation of weapons of mass destruction

As for the Anti Money Laundering and Counter Terrorist Financing Law, it includes a set of articles that outline the general policy to combat money laundering, terrorist financing, and the proliferation of weapons of mass destruction. The law identifies the perpetrators of the money laundering and terrorist financing offenses as any person that commits, assists, abets, or conceals a money laundering and terrorist financing offense, or has the intention to commit, involve in, or try to commit that offense which is penalized according to legislations in force. This will help competent authorities to recover direct or indirect proceeds generated from these offenses.

CLIMATE CHANGE RISKS AND IMPLICATIONS FOR FINANCIAL STABILITY:

The climate change is a major international concern as it entails social, economic, and environmental risks. Early at the beginning, this topic was closely attended, and several efforts were made to ward off the implications of climate change, and adapting to its potential effects on the ecosystems and economic sectors.

The climate change is defined as a long-term shift in temperatures and weather patterns, as well as a significant change in the natural phenomena, with an accelerating deterioration in the environmental degradation and vegetation cover

The IMF classified the climate-related risks into two main categories: the Physical risk, which is associated with climate changes that lead to natural disasters thus adversely affecting properties, assets, and infrastructures, and weigh on public finances, individuals, companies, banks, financial institutions, and insurance companies. The second category, is the Transition Risk, which is associated with losses incurred when shifting from a carbon-intensive economy to a low-carbon economy or more Eco-sustainable economy.

In the early stages, the CBJ realized the importance of preserving the environment and encouraging the use of renewable energy, as the Jordanian economy is challenged by the scarcity of natural resources and demographic imbalances. The CBJ included the renewable energy sector (which includes solar energy, wind energy, and energy saving projects) to its JD 1.3 billion program to support and finance the economic sectors in 2013. This program aims to provide the necessary financing for renewable energy projects at affordable costs and terms, as the CBJ believes in the importance of this sector in preserving the environment and expanding the use of clean energy in Jordan, which will contribute to the reduction of gas emissions, and pave the way to a better future for renewable energy, as part of the strategy to confront climate change.

The CBJ initiated the formulation of a comprehensive strategy to promote green finance and mitigate the risks of climate change in the kingdom, in coordination and partnership with the banking and financial sector and other stakeholders in the public and private sectors, supported and sponsored by the World Bank group

The CBJ also initiated the formulation of a strategy to promote green finance in coordination and partnership with the banking and financial sector and other stakeholders in the public and private sectors, supported and sponsored by the World Bank Group, and in an integrated framework with other national efforts thereof, in particular the Green Growth National Action Plan in Jordan (2021-2025). This strategy will serve as a roadmap to enable the CBJ and the financial sector to strengthen green finance and reduce the risks of climate change.

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CHAPTER ONE: GLOBAL AND DOMESTIC ECONOMIC AND FINANCIAL DEVELOPMENTS AND PROSPECTS

1-1 GLOBAL ECONOMIC DEVELOPMENTS AND GROWTH

The global economy remained resilient amid the COVID-19 crisis, thanks to the proactive and exceptional measures taken by most countries worldwide, in terms of their fiscal and monetary policies. This contributed to warding off the risks of the pandemic on global economic activity and the financial stability.

However, after two years and a half since the onset of the COVID-19 pandemic, the uncertainty weighs on the world economic outlook. The IMF's World Economic Outlook (WEO) report of April 2022, indicated that the global growth outlook is slowing down significantly, due to global supply chain disruptions, as well as the adversities of the Russian-Ukrainian crisis. The crisis and resulted humanitarian implications contributed to the severe set back in the global recovery from the repercussions of COVID-19 pandemic; slow down of economic growth, and to shortages in the supply of primary commodities. As Russia and Ukraine are the world's largest exporters of wheat and grain, and Russia is one of the world's largest exporters of oil and gas. This in turn fueled the inflationary pressures as the prices of oil, gas, and primary commodities increased markedly, hence, countries tightened their monetary policies accordingly.

The global economic growth improved strongly at 6.1% in 2021; compared to a contraction of -3.1% in 2020, owing to easing of restrictions and lifting lockdowns, as well as economies being adapted to new ways of working, and the widespread vaccinations.

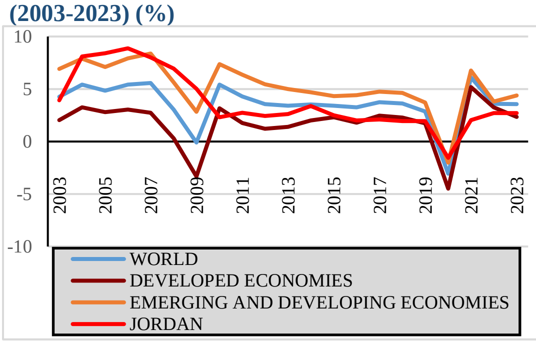
The IMF's forecasts of April 2022, revised down the global growth in 2022 and 2023, compared to forecasts of January 2022. The global economy is set to grow by 3.6% in 2022 as well as in 2023, revised down by 0.8% and 0.2% than January's forecasts for 2022 and 2023, respectively. This slowdown largely reflects the direct impacts of the Russian-Ukrainian Crisis and its repercussions. (Table 1-1 and Figure 1-1).

TABLE 1-1: WORLD ECONOMIC OUTLOOK 2022 AT A GLANCE

	Year	The World	Developed Economies	Emerging Economies
Actual Data	2020	-3.1	-4.5	-2.0
	2021	6.1	5.2	6.8
Latest Estimates April 2022	2022	3.6	3.3	3.8
	2023	3.6	2.4	4.4
Estimates of January 2022	2022	4.4	3.9	4.8
	2023	3.8	2.6	4.7

Source: IMF, WEO Database, January 2022 and April 2022.

FIGURE 1-1: REAL GDP GROWTH TRENDS AND PROSPECTS FOR JORDAN AND THE WORLD (2003-2023) (%)

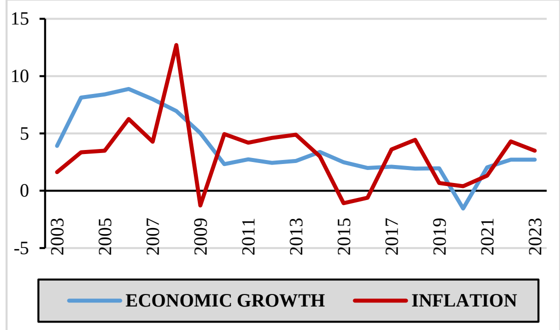


Source: IMF, World Economic Outlook Report Database, April 2022

Meanwhile, Jordan's economic growth, strengthened to 2.2% in 2021, compared to a contraction of -1.6% in 2020, supported by the stability of the epidemiological situation in Jordan, as well as the precautionary and overarching measures conducted by the government and the CBJ to support various economic sectors. According to the CBJ estimates, the growth is expected at 2.7% in 2022 as well as in 2023. (Figure 1-2).

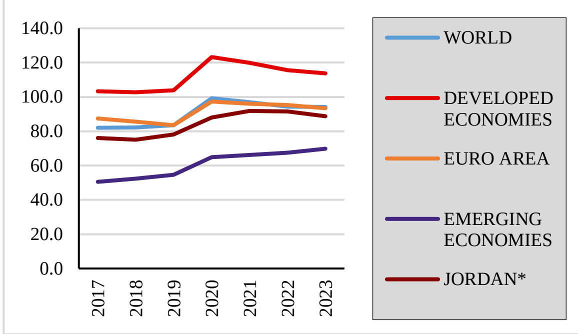
The domestic financial stability remained steady, propelled by prudent economic policies, in particular the monetary and the macro- and micro-prudential policies, which continued to support the Jordanian dinar and maintain its attractiveness, and to ensure a robust and sound financial sector despite the tremendous headwinds ahead.

FIGURE 1-2: THE REAL GDP GROWTH AND INFLATION RATE DEVELOPMENTS AND PROSPECTS IN JORDAN (2003-2023) (%)



Source: IMF, WEO Database, April 2022 and the CBJ's Estimates

FIGURE 1-3: PUBLIC DEBT (% OF GDP) (2017-2023)



Source: IMF, Fiscal Monitor Database, April 2022.
*: Jordan, IMF, WEO Database, and April 2022.

1-1-1 PUBLIC FINANCE DEVELOPMENTS

The uncertainty substantially weighs on global growth outlook; just as the repercussions of COVID-19 pandemic was subsiding, Russia invaded Ukraine. In addition to losses of human capital and the destruction of the infrastructure, the war fueled the turmoil in the primary commodities markets and led inflation rates to spike. This high unprecedented uncertainty affects countries differently; emerging economies and low-income developing energy and food importers are more vulnerable to price increases, which imposes pressures on their growth and their public resources as well. Therefore, amid high uncertainty and notable divergence among countries, fiscal policies have to respond expediently. Fiscal policies are intended to remedy the humanitarian crisis, and the economic activity turbulence to support stressed economies mostly impacted by the war.

1-1-2 PUBLIC DEBT

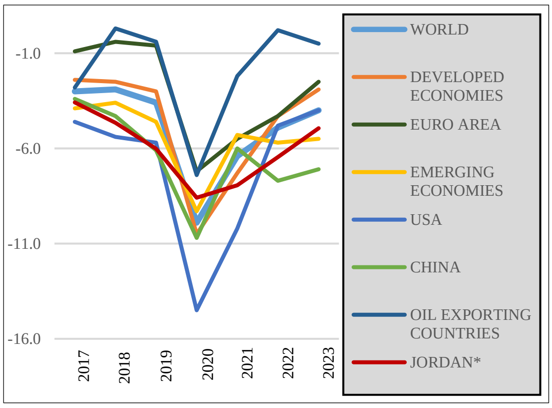
The IMF's Fiscal Monitor report of April 2022 revealed that the average global public debt will improve in coming years as it recorded around 97% of GDP in 2021, and is set to decline to reach 94.4% in 2022, and 94.1% in 2023. (Figure 1-3).

In advanced economies, the public debt to GDP ratio declined to 119.8% in 2021, down from 123.2% in 2020. As for emerging markets, the public debt to GDP ratio increased from 64.9% in 2020, to reach 66.1% in 2021, and is projected to rise to 69.8% by the end of 2023. The report indicated that fiscal policy priorities shall continue to address the ramifications of COVID-19 pandemic, to protect stressed segments, as well as to address divergences across countries amid high inflation rates and interest rates. This is in addition to confront climate change and put in place medium-term strategies for the risk management of public finances and financing, and strengthening the efforts to achieve the goals of sustainable development.

1-1-3 FISCAL DEFICIT

According to the IMF's Fiscal Monitor report of April 2022, the public finances were divergent across major countries and economies worldwide. The global fiscal deficit as a percentage of GDP decreased to reach 6.4% in 2021, compared, to 9.9% in 2020. Furthermore, it is expected to improve to 4.9% and 4% in 2022 and 2023, respectively. (Figure 1-4).

FIGURE 1-4: FISCAL DEFICIT FOR JORDAN AND SELECTED MAJOR ECONOMIES AND COUNTRIES (2017-2023) (% OF GDP)



Source: IMF, Fiscal Monitor Database, April 2022
*: Jordan IMF, WEO Database, April 2022

In addition, the fiscal deficit in percent of GDP declined to 7.3% by the end of 2021 in advanced economies, compared to 10.5% in 2020, and is set to decline notably to reach around 2.9% by the end of 2023. As for emerging markets, the fiscal deficit declined from 9.3% in 2020 to 5.3% in 2021, yet it is projected to increase to 5.7% in 2022, and to decline again in 2023 to 5.5%. The oil exporting countries fiscal deficit to GDP ratio improved markedly to 2.2% in 2021, down from 7.4% in 2020, and is projected to improve in 2022 to reach 0.2%, due to the increase in energy prices. In US, the projections indicate a speedy recovery from the sharp increase in fiscal deficit to reach 4% by 2023. However, China still facing new pressures to control the pandemic after recording new cases of the new variant "Omicron", and the resulting lockdowns. In addition, the global high inflation and slowing demand for Chinese commodities led the economy to grow at a slower pace than in the US; the fiscal deficit in China is expected to reach 7.1% by the end of 2023.

1-2 FINANCIAL SYSTEM STABILITY

1-2-1 GLOBAL FINANCIAL STABILITY

The IMF's Global Financial Stability Report of April 2022 indicated that central banks are challenged by trade-offs between combating inflation, which hit high records -impacted by the war on Ukraine, and the accompanying increasing headwinds threatening the global economy outlook- and maintaining the recovery aftermath the COVID-19 pandemic. However, countries need to be careful when retracting from the easing of monetary policies conducted amid the pandemic.

The Report highlighted that the mid-term vulnerabilities threatening the global financial stability were somewhat mitigated in most sectors in several systemically important countries. As for the corporate sector, non-financial companies' earnings grew at a higher pace than their debts; the financial leverage ratio for the corporate sector declined in developed and emerging markets economies, and the liquidity was improved for countries in the sample.[1]

In the public sector, vulnerabilities increased in systemically important economies, which represent about 80% of the GDP of countries in the sample. The debt recorded high levels at a faster rate than emerging economies, which conducted tight fiscal policies to reduce debt levels.

As for the household sector, vulnerabilities declined in developed economies in particular the Euro area and US. The household debt to GDP ratio in US increased, yet it is lower than its pre global financial crisis level.

In the financial sector, nearly half of banks in developed economies fall in the low category in terms of the magnitude of vulnerabilities. Banks enjoy high levels of capital buffers and liquidity, owing to regulatory reforms conducted after the global financial crisis in 2007-2008, which allows banks to remain resilient in front of the pandemic and its global ramifications.

Meanwhile, in other financial institutions sector, vulnerabilities in general ranged from low to medium. However, in the insurance sector, vulnerabilities have risen in some advanced economies to high category, while the

[1] Countries in the sample are developed economies including (US, Euro area, and other countries), and emerging economies and countries include (China and other countries).

vulnerabilities of the mutual investment funds declined significantly.

1-3 DOMESTIC ECONOMIC AND FINANCIAL TRENDS AND PROSPECTS

1-3-1 OVERVIEW

The Middle East during the period 2012-2019 was challenged by political and security instability. At that time, the deepening of political and security unrest, and resulting economic ramifications led the national economy to slow down; economic growth was slowing down and recorded modest rates not exceeding 2%.

The COVID-19 crisis added new economic and social burdens to the already existing challenges, yet the government measures and the CBJ's monetary and banking measures helped to subdue the crisis and to maintain the monetary and financial stability.

1-3-2 ECONOMIC GROWTH

The GDP at constant prices grew by 2.2% in 2021, compared to a contraction of -1.6% in 2020, as the proactive and overarching measures taken by the CBJ, the government, and the social security alleviated the impact of the pandemic on the national economy. The growth was also supported by stability of epidemiological situation in Jordan, which allowed for gradual reopening of economic sectors during the second half of 2021. As for the GDP at current market prices, it grew by 3.5% in 2021, against a contraction of -1.8% in 2020. (Table 1-2).

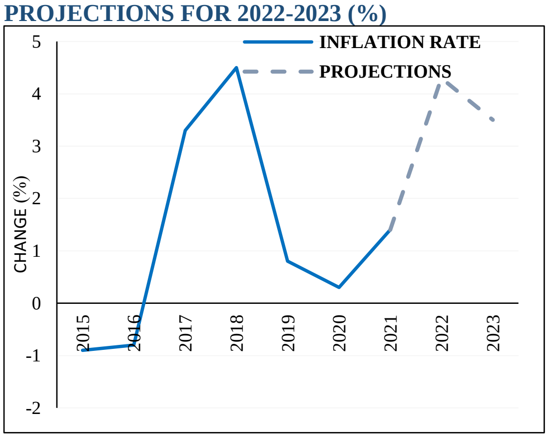
1-3-3 UNEMPLOYMENT

The COVID-19 pandemic has a toll on the labor market. The unemployment rate increased to 24.1% at the end of 2021, increasing by 0.9 percentage points compared to its level of 23.2% in 2020. The unemployment rate peaked during the first quarter of 2021 to reach 25% (24.2% for males, and 28.5% for females). The unemployment rate during the first quarter of 2022 declined to record 22.8% supported by the stability of epidemiological situation and reopening of economic sectors. However, the unemployment rate is still high and remains one of the major challenges facing the national economy.

1-3-4 INFLATION

The general prices level, measured by the consumer price index increased by 1.4% in 2021, compared to 0.3% in 2020. During the first nine months of 2022, the inflation rate increased to 4%, due to the supply chain disruptions as well as the repercussions of the Russian-Ukrainian crisis which fueled the hikes of energy and primary commodities prices. (Figure 1-5).

FIGURE 1-5: INFLATION RATE IN JORDAN (END OF PERIOD) FOR THE YEARS 2015-2021, AND PROJECTIONS FOR 2022-2023 (%)



Source: CBJ Statistical Database, March 2022
The CBJ's Forecasts

1-3-5 PUBLIC FINANCE DEVELOPMENTS

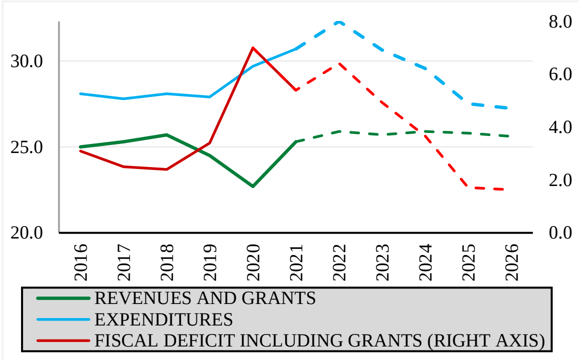
The overall fiscal deficit including grants declined by JD 451.8 million to reach JD 1,730.6 million in 2021 (5.4% of GDP) compared to a deficit of JD 2,182.4 million (7% of GDP) in 2020.

The increase in domestic revenues in 2021 by JD 1,086.8 million to record JD 7,324.9 million, compared to JD 6,238 million in 2020, contributed to the reduction in the fiscal deficit.

With respect to public expenditures, they increased at a slower rate than revenues, they grew by JD 647.5 million in 2021 to reach JD 9,858.8 million compared to JD 9,211.3 million in 2020. (Figure 1-6).

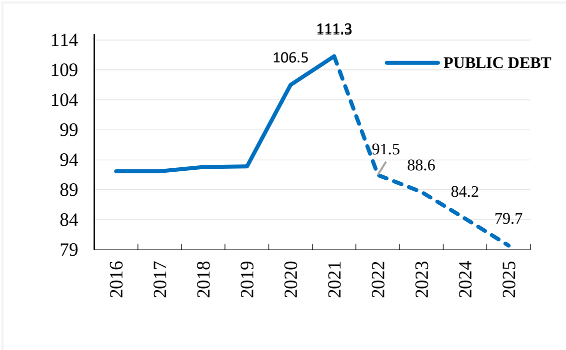
Total public debt reached to JD 35,767 million at the end of 2021, or 111.3% of GDP, compared to JD 33,032 million, or 106.5% of GDP at the end of 2020. (Figure 1-7).

FIGURE 1-6: PUBLIC FINANCE TRENDS IN JORDAN (2016-2021) AND PROSPECTS (2022- 2026) (% of GDP)



Source: Ministry of Finance Monthly bulletin, January 2022
IMF estimates, WEO database April 2022

FIGURE 1-7: TOTAL PUBLIC DEBT IN JORDAN (2016- 2021) AND OUTLOOK (2022-2025) (% of GDP)

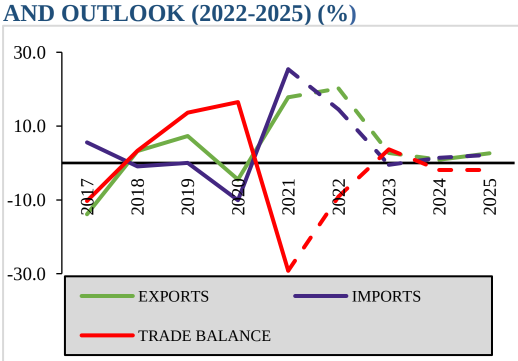


Source: Ministry of Finance Monthly bulletin, January 2022
IMF Projections for public debt in Jordan, WEO database April 2022

1-3-6 EXTERNAL SECTOR

In 2021, total exports increased by 17.8% to reach JD 6,643.8 million, while imports increased by 25.4% to reach JD 15,345.1 million. Accordingly, the Kingdom's trade balance deficit widened by 29.2% compared to its level in 2020 to reach JD -8,701.3 million. (Figure 1-8) and (Figure 1-9).

FIGURE 1-8: SUMMARY OF EXTERNAL TRADE STATISTICS IN JORDAN (2017- 2021) AND OUTLOOK (2022-2025) (%)



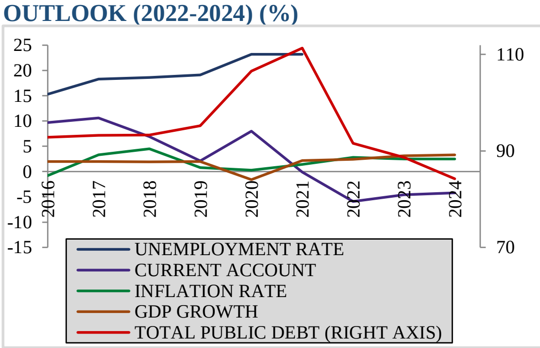
Source: CBJ Monthly Statistical Bulletin, April 2022
IMF Projections, June 2022

TABLE 1-2: SELECTED MAJOR ECONOMIC INDICATORS FOR JORDAN & THEIR PROSPECTS (2005-2024)

Year	GDP Growth Rate in constant market prices (%)	Inflation Rate (End of Period) (%)	Unemployment Rate (% of Labor Force)	Population (Growth Rate)	Total Public Debt (% of GDP at constant market prices)	Current Account (%of GDP)
2005	8.1	3.5	14.8	2.8	84.3	-18.1
2006	8.1	6.3	14.0	2.9	76.3	-11.5
2007	8.2	4.7	13.1	3.0	73.8	-16.8
2008	7.2	14.0	12.7	3.0	59.6	-9.1
2009	2.0	-0.7	12.9	3.1	64.4	-5.1
2010	3.5	4.8	12.5	3.2	66.9	-6.9
2011	3.3	4.2	12.9	4.3	70.6	-10.0
2012	2.0	4.5	12.2	6.0	80.2	-14.9
2013	2.2	4.8	12.6	8.8	86.6	-10.2
2014	3.5	2.9	11.9	8.2	88.5	-7.1
2015	2.8	-0.9	13.0	7.9	92.4	-9.0
2016	2.0	-0.8	15.3	2.8	92.1	-9.7
2017	2.0	3.3	18.3	2.6	92.8	-10.6
2018	1.9	4.5	18.6	2.5	92.9	-6.9
2019	2.0	0.8	19.1	2.3	95.2	-1.7
2020	-1.6	0.3	23.2	2.4	106.5	-5.7
2021	2.2	1.4	24.1	2.3	111.3	-8.8
2022	2.7	4.3	-	0.11	91.5	-5.93
2023	2.7	3.5	-	0.09	88.6	-4.63
2024	3.3	2.5	-	0.18	84.2	-4.25

Source: CBJ, Monthly statistical Bulletin, the calculation of current account has been changed since 2008.
CBJ and IMF projections, IMF WEO Database, April 2022.

FIGURE 1-9: SELECTED ECONOMIC INDICATORS FOR JORDAN (2016-2021) AND OUTLOOK (2022-2024) (%)



Source: CBJ Monthly Statistical Bulletin, April 2022

1-3-7 MONETARY DEVELOPMENTS

During the period (March 17 - November 6) 2022, the CBJ raised the interest rates on all monetary policy instruments for six times by 350 basis points, except the overnight window rate which was increased by 375 basis points. Raising interest rates is intended to maintain the monetary stability in the kingdom and to ensure the attractiveness of assets denominated in Jordanian dinar. These hikes came in light of the domestic, regional, and global economic developments, the increase in interest rates in international and regional financial markets, as well as the increase in inflation rates globally.

Furthermore, to support vital economic sectors and to provide the necessary financing for these sectors with facilitated terms and preferential rates, the CBJ has kept the preferential interest rates charged on its JD 1.3 billion program to support vital economic sectors unchanged at 1.00% for projects inside Amman, and 0.50% for projects in other governorates, with maturities up to ten years. The financing currently available for lending under this program exceeds JD 600 million. The preferential interest rate for the JD 700 million program to support and provide financing for SMEs, remained unchanged at a rate not exceeding 2% for borrowers.

With regard to the CBJ's total foreign reserves, including gold and SDRs, they reached approximately to USD 16 billion by the end of October 2022. The CBJ's reserves level is comfortable and sufficiently covers 8.3 months of imports, which is safe and exceeds the acceptable period set by international standards.

1-4 THE RECOVERY: BOUNCING BACK TO ECONOMIC GROWTH IN 2021

The Jordanian economy, like others worldwide was impacted by the COVID-19 pandemic, which sparked instability in the national economy and Jordanian society. In the midst of uncertainty, the government conducted response measures that take into account the priorities of preserving the health and safety of citizens and achieving development. The crisis added new economic and social burdens to the already existing challenges, however the measures taken by the government as well as the CBJ's monetary and banking measures contributed to alleviating the impact of the novel crisis on Jordanian society and the national economy, and preserving the pillars of monetary, financial, and economic stability as well. The domestic economic indicators in 2022 indicate that the economy has grew, and the impact of the pandemic on economic sectors has abated. Tourism income increased during the first three quarters of 2022 to record USD 3.0 billion, compared to USD 1.2 billion during the same period last year, growing nearly by 140.8%. Meanwhile, domestic exports increased by 45.6% during the first eight months in 2022, while remittances of Jordanians working abroad increased by 0.6% during the same period. In addition, foreign investment increased by 96.9% during the first half of 2022.

The domestic economy grew by 2.9% during the second quarter of 2022 compared to 1.8% during the same period in 2021. As mentioned earlier, the economic growth is projected at around 2.7% in 2022 and in 2023 as well.

The CBJ's monetary and banking measures that amounted to JD 2.7 billion (8.6% of GDP), which were listed in detail in JFSR 2020, as well as the government and social security measures, had mitigated the severity of the economic downturn, as compared to the global contraction recorded worldwide and in the region.

The banking sector in Jordan also played a significant role in handling the pandemic. Banks proved their high flexibility and responsibility towards customers' needs of individual and businesses, especially those stressed in terms of cash flows and income, in accordance with the requirements of prudent banking supervision.

1-5 JORDAN IN SELECTED INTERNATIONAL INDICATORS

1-5-1 TRANSPARENCY AND CORRUPTION PERCEPTION INDEX

The 2021 Corruption Perception Index addressed the civil rights, civil liberties, and democracy as part of anti-corruption efforts to ensure an approach that puts in place independent controls required to bring authority under accountability, and reduce corruption in society.

The 2021 annual report, indicated that most countries worldwide did not show any improvement in terms of anti-corruption practices. Two thirds of the countries included recorded less than 50 points.

In 2021, Jordan ranking improved to (58) with a (49) score, compared with ranking (60) with a score of (49) in 2020. (Table 1-3).

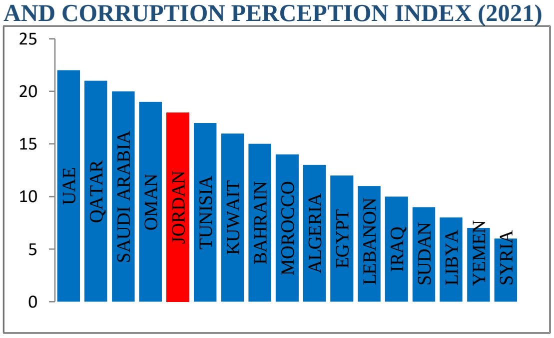
TABLE 1-3: JORDAN'S RANKING IN TRANSPARENCY AND CORRUPTION PERCEPTION INDEX

Rank*			Score**					
2019	2020	2021	2016	2017	2018	2019	2020	2021
60	60	58	48	48	49	48	49	49

Source: Transparency International, Corruption perception Index, 2021
* Rank: The closer the rank is to one, then it is better
** Score: Ranges from zero to 100. The higher the score and closer to 100 then the better it is.

As compared to Arab countries, Jordan ranked fifth out of 17 Arab countries in terms of transparency and corruption perception index for the second year in a row, preceded by the United Arab Emirates and Qatar which came in first and recorded 69 and 63 points, respectively, whereas, Libya recorded 17, Yemen 16, and Syria 13. (Figure 1-10).

FIGURE 1-10: JORDAN AND SELECTED ARAB COUNTRIES RANKINGS IN TRANSPARENCY AND CORRUPTION PERCEPTION INDEX (2021)



Source: Corruption perception Index. 2021.

1-5-2 HUMAN DEVELOPMENT INDEX

The United Nations Development Program (UNDP) issues an annual report that summarizes the achievements and trends in three key dimensions of human development: healthy life and high life expectancy rate, being knowledgeable and educated, and having a decent standard of living.

In 2019 Report, Jordan ranked (102) out of (189) countries in terms of the HDI, which classifies Jordan among the highest human development countries. (Table 1-4).

TABLE 1-4: JORDAN'S RANKING IN THE HDI DIMENSIONS 2019*

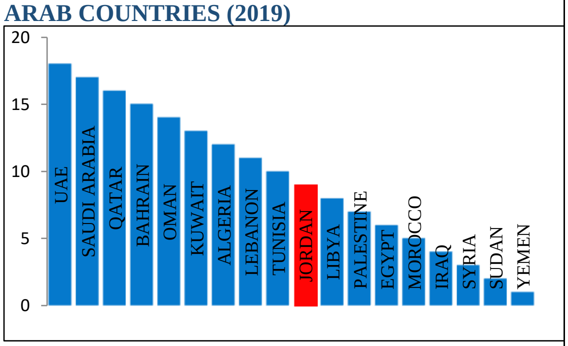
Rank	HDI Ranking	HDI (net)	Inequality Adjusted HDI (IHDI)	Gender Development Index* (GDI)	Gender Inequality Index** (GII)	Multidimensional Poverty Index (2008-
		Value				
102	High Human Development	0.729	0.622	0.875	0.450	0.002

Source: UNDP, Human development Report 2020.

Latest data available for 2019 as indicated in the table.
*Jordan is classified in group 5 in terms of the HDI gender equality index.
** Jordan ranked 109 out of 189 countries in Gender Inequality Index.

Compared to 18 Arab countries included in the Report, Jordan ranked in the middle, outperforming a number of Arab countries including Libya, Palestine, Egypt, Morocco, Iraq, Syria, Sudan, and Yemen. (Figure 1-11).

FIGURE 1-11: HDI RANKING OF JORDAN AND ARAB COUNTRIES (2019)



Source: UNDP, HDI 2020.

1-5-3 THE COMPETITIVENESS INDEX

The Global Competitiveness Index Report of 2020, explained that the COVID-19 crisis was a global health and economic crisis, that spread and affected business activities as well as health care and social protection schemes. In the 2020 edition "How countries are performing on the road to recovery", the index exceptionally did not address any ranking scale for countries and regions, rather the report provided a methodology that helps countries to reshape their own economic systems to cope with their future needs. It also provides a foundation to support a deep-seated shift towards prosperity, productivity, and sustainable economic growth in terms of several priorities that increase the chances for recovery from the repercussions of COVID-19. The report also analyses historical trends on factors of competitiveness, as well as the latest thinking on future recovery priorities. It provides recommendations against three timelines: for periods prior to the crisis (historical stability), during the crisis (emergency response), and after the crisis (economic recovery). These recommendations addressed the following issues:

- Provide an enabling environment: transforming towards an appropriate infrastructure for information technology to digitize public services.

- Enhance the intellectual capital: the shift towards knowledgeable human resource through reviving market opportunities based on investing in skills and education.
- Improve market conditions: by increasing the financial incentives to private companies to experience a comprehensive and sustainable investment in the local market.
- Transformation towards innovation and creativity: shift towards innovation through reviving public and private investment opportunities in scientific research and development.
- Enhance the Economic Infrastructure: assessing the economic transformation readiness and setting recommendations for achieving productivity, prosperity, and sustainability.
- Assess the investment and business conditions: assessing the impact of the crisis on entrepreneurs in terms of competition and cooperation in the market and other business-related factors.

1-6 CONCLUSION

Despite the headwinds in Jordan and worldwide due to the COVID-19 pandemic, and the global geopolitical tensions afterwards, especially the Russian-Ukrainian crisis, and the resulting adversities that affected the economic and financial conditions in Jordan, Jordan continued to maintain monetary, banking, and financial stability. This is owing to the government and the CBJ's policies that helped to mitigate the effects of these headwinds. Jordan also enjoys a sound and resilient banking sector that is generally capable to withstand shocks and high risks.

CHAPTER TWO: THE FINANCIAL SYSTEM INFRASTRUCTURE AND LEGISLATIVE FRAMEWORK

2-1 INTRODUCTION

A proper infrastructure and regulatory structure are essential elements and factors to achieve financial stability. In the last period, the CBJ continued its efforts to enhance the financial system's infrastructure and respective financial legislations. The CBJ endeavors emphasized two main aspects: promoting a sound and responsible financial inclusion, and strengthening the legislative framework of the financial system.

2-2 PROMOTING FINANCIAL INCLUSION

2-2-1 THE CONCEPT OF FINANCIAL INCLUSION

Financial inclusion is "the state wherein individuals and businesses have convenient access to different affordable financial services and products (payment transactions, saving, credit, money transfer, and insurance) in a manner that meets their needs and helps them in improving their lives, delivered in a responsible and sustainable way". In this context, the fiscal and monetary policy makers in developing and emerging markets countries prioritized financial inclusion in their policies and objectives to achieve the inclusive and sustainable growth.

Jordan recognizes the financial inclusion as an essential pillar to achieve inclusive and sustainable growth in the Kingdom. The Jordanian government embarked on building a robust and sound financial infrastructure, in addition to putting in place legislative and legal frameworks necessary to achieve an inclusive financial system. The CBJ has assumed the leading role in this process, supported by stakeholders from the public and private sectors, in order to ensure the coordination and cooperation in formulating and implementing several key initiatives thereof.

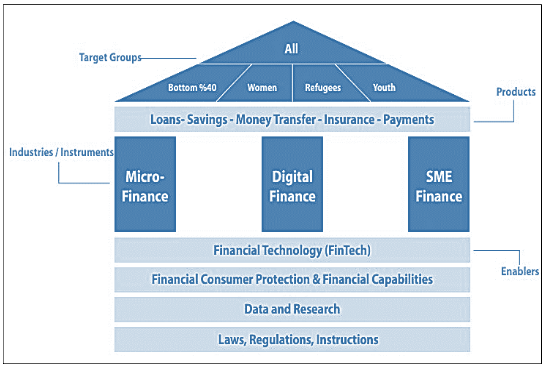
Since 2012, the CBJ has been focusing on promoting financial inclusion in the Kingdom, by keeping up with latest regional and international developments in the policies intended to promote financial inclusion. In 2015, the CBJ started to guide and oversee the formulation of the NFIS in the Kingdom, according to the Prime Minister's decision to form the National Financial Inclusion Steering Committee chaired by the CBJ's Governor. The strategy is particularly directed towards achieving financial inclusion for low-income segments, youth, women, refugees, and Micro, Small, and Medium Enterprises (MSMEs).

2-2-2 THE VISION AND GENERAL FRAMEWORK OF FINANCIAL INCLUSION IN JORDAN

As mentioned in the JFSR 2020, the NFIS builds on a set of priority areas, three of which form the core pillars of financial inclusion: microfinance, digital financial services, and SMEs financing. On another front, four areas are considered as cross-cutting enablers, which facilitate the success of the NFIS and contribute to achieving its objectives. These enablers include the use of financial technology (Fintech), financial consumer protection and enhancing financial capabilities of all segments in the society, data and research, and laws and legislations.

The NFIS targets all segments of the population and MSMEs; yet it focuses particularly on the empowerment of vulnerable groups excluded from the financial services, especially vulnerable low-income groups of the bottom 40% households in Jordan, women, youth (15-18 years old), and refugees.

IGURE 2-1: THE NFIS GENERAL FRAMEWORK



Source: the NFIS for Jordan (2018-2020)

The NFIS has two high-level goals:

1- To increase the financial inclusion, in terms of the number of adult accounts in financial institutions, from 33.1% in 2017, to 41.5% by 2020.
2- To reduce the gender gap from 53% to 35%.

It is worth mentioning that in 2020, actual figures outperformed their envisioned levels in the strategy; the financial inclusion approached 43.1% up from the targeted level of 41.5%, while the gender gap decreased to 22% below the targeted 35%, which validates the huge success of implementing the NFIS in Jordan.
As the NFIS (2018-2020) implementation was finalized, the CBJ issued its first Financial Inclusion Report (2018-2020) on March 30, 2021. The report highlights the continuous endeavors of the CBJ and other stakeholders to achieve financial inclusion objectives according to a set of priority policies and enablers on which the NFIS was built. The report also illustrates the CBJ's most prominent initiatives and projects conducted in collaboration with stakeholders during the years (2018-2020) to enhance financial inclusion in the Kingdom, in addition to the CBJ's key measures to contain the impact of the COVID-19 pandemic on the national economy.

During the last quarter in 2021, the CBJ proceeded with the formulation of the NFIS for the years (2023-2027), which shall emphasize increasing and promoting the responsible and sustainable access to financial services and products by different segments of society in the Kingdom. On 21/11/2021, the Cabinet issued its decision number 56/10/6/52355 to form the NationalFinancial Inclusion Steering Committee chaired by the CBJ's Governor and representative members from the public and private sectors to formulate the NFIS 2023-2027.

The CBJ conducted a supply and demand survey for financial inclusion in 2021, aiming at building a national strategy based on accurate quantitative and qualitative measurement and analysis of the financial inclusion level in the Kingdom. The study aims to address and identify the latest variations and developments in financial inclusion in the Kingdom since the launch of the NFIS (2018-2020), and to determine the weaknesses and strengths on the supply and demand sides by measuring the indicators of the national goals of financial inclusion and ensuring their achievement; the results of this study will constitute as a cornerstone to formulate the NFIS (2023-2027).

On the occasion of World Saving Day, the CBJ rolled out a national saving initiative titled "Save to prosper" in collaboration with several official financial institutions as well as governmental and non-government entities. This initiative came in light of the CBJ's endeavors to improve individuals lives and to develop the national economy, as well as the CBJ's strategic vision to enhance financial inclusion in the Kingdom. The initiative is intended to enhance financial education in general, and to promote saving culture in particular, to all individuals at different ages, especially low-income individuals, youth (15-24), women, and students of schools, as saving is essential to strengthen the financial solvency for individuals, and to enable them in conducting a convenient financial planning for a safe future. In cooperation with key stakeholders, a detailed action plan was formulated to unify all extended efforts and bring them under one umbrella, so that many actions are included to implant, strengthen, and improve the saving culture.

2-2-2-1 SMEs

The SMEs are essential cornerstones in most economies worldwide, and one of the most main job creators; they account for around 70% of total corporates, and create more than 50% of jobs worldwide. According to the World Bank data, these figures are higher if the SMEs operating in the unofficial sector were included. Therefore, providing a proper support for these enterprises is crucial to support sustainable and comprehensive recovery from the pandemic.

The CBJ is keen on supporting MSMEs and believes in their essential role in stimulating economic growth, reducing unemployment, and fighting poverty, therefore; and aiming at enabling these companies to access the financing needed with medium or long maturities and at competitive interest rates, the CBJ formulated an internal committee for managing projects intended to strengthen financial inclusion, including increasing the SMEs access to finance. To this end, the CBJ during the past period cooperated with the Ministry of planning and international cooperation, as well as international and regional financing institutions to attract around USD 425 million funding for the SMEs sector, at competitive interest rates and suitable tenors. The funds transferred to Jordan amounted to USD 260 million, which were provided as loans to more than 17 thousand MSMEs, of which more than 64% are located outside Amman. The financing contributed to creating around 7,000 new jobs, and the CBJ intends to withdraw the remaining balance in 2022 and 2023. This is in addition to the credit line of USD 120 million provided directly to banks by the European Bank for Reconstruction and Development (EBRD) to support MSMEs; the CBJ supports and facilitates banks' access to the credit line. The EBRD has signed USD 90 million agreements with three banks.

In 2021, the CBJ proceeded with supporting vital targeted economic sectors under its JD 1.3 billion program of financing and supporting economic sectors of (manufacturing, renewable energy, tourism, agriculture, information technology, engineering consulting, health, education (vocational and technical training), transportation, and exporting), including SMEs. The financing is offered at an interest rate of 0.5% for projects located in governorates outside Amman, and at 1% for projects inside Amman. The funding limit for the tourism sector was topped up from JD 3 million to JD 4 million, as the tourism sector was one of the stressed sectors affected by the adversities of the pandemic. However, the financing limits were kept unchanged at JD 4 million for the renewable energy and transportation sectors, and at JD 3 million for other sectors included in the program.

The loans provided for banks under this program amounted to JD 223.2 million in 2021, bringing the program's total outstanding loans to around JD 1,089.4 million, an around 1,537 projects have benefited from these loans. These loans were provided to the sectors of manufacturing, renewable energy, tourism, agriculture, information technology, engineering consulting, health, education (vocational and technical training), and transportation amounting to JD 579.9 million, JD 226.4 million, JD 103.3 million, JD 81.6 million, JD 22.2 million, JD 5 million, JD 29.9 million, JD 13.5 million, and JD 27.7 million, respectively. In addition, JD 62 million were provided to cover the salaries for around 49 thousand workers (since the onset of the pandemic). The number of projects benefited from the financing provided were around 234 projects in 2021, whereas the program contributed since its launching to the creation of 14,167 new jobs as of end 2021 in different governorates in the Kingdom.

In the context of promoting startups and combating unemployment, the CBJ in 2021 continued to provide financing through the National Self-Employment Program "INHAD" launched in 2019, in the amount of JD 100 million to lend banks at a fixed interest rate of 1% up to a maximum of 7 years. This is in line with the royal vision to reduce unemployment, and provide job opportunities for the youth by promoting self-employment rather than being employed, and enabling the youth to establish development projects that offer them job opportunities and a permanent source of income. The number of benefited projects from the program in 2021 approximated (140) projects, in the amount of JD 4.5 million. In addition, the supporting program to SMEs to withstand the ramifications of COVID-19 pandemic was extended, aiming at financing operating expenses and capital expenditures including salaries and wages; funds are provided for banks at zero interest rate so banks could in turn re-lend these funds at an interest rate not exceeding 2%. In 2021, the program was amended and extended until the end of September 2022, the amendments include:

- The limit of financing was topped up by JD

(200) million to become JD (700) million.

- Top up the financing limits for the stressed sectors mostly affected by the pandemic (education, wholesale, tourism except hotels, and retail).
- Increase the tenure for the financing to reach 54 months up from 42 months, including a grace period of 12 months if requested.
- As end of 2021, total financing provided amounted to JD 506.6 million; of which 38% of these amounts were used to cover the salaries and wages. These financings benefited 5,793 projects serving 93,012 active workers.

With respect to developments in loans provided for the Agricultural Credit Corporation, they were as follows:

- Top up the financing provided to the Agricultural Credit Corporation by JD 30 million in 2021, to reach JD 100 million.
- Postpone the installments due on advances provided to the corporation during the period 1/1/2021 to 30/6/2021, and reschedule JD 19,099,000 postponed installments for the next (8) years.
- In 2021, the advances provided to the corporation reached to JD 31.2 million, while total repayments were around JD 8.1 million. Accordingly, the balance of advances granted to the corporation amounted to JD 99.9 million at the end of 2021, an increase approaching JD 23 million.

With regard to advances provided to the Jordan Loan Guarantee Corporation (JLGC), they reached to JD 650 million by the end of 2021, compared to JD 661.2 million as of end 2020. These advances are intended to serve the following programs:

- Export credit guarantee program, with an amount of JD 100 million.
- Small startups loans guarantee program in the amount of JD 50 million.
- Supporting bank guarantees for contractors outside Jordan program (JD 100 million).
- Housing loans guarantee program- facilitated housing (JD 100 million).
- SMEs loans guarantee program to withstand COVID-19 crisis (JD 300 million).

2-2-2-2 MICROFINANCE

The microfinance sector which joined the formal financial system in 2018 comprises of (9) licensed Microfinance Institutions (MFIs), of which two MFIs are providing financing in accordance with the provisions of Islamic Sharia.

During the past years, the CBJ issued a set of instructions governing the microfinance business, to lay down the institutional governance foundations, as well as enhancing the supervisory role of the companies' board of directors, strengthening the internal control and risk management, and emphasizing the financial consumer protection according to international best practices and guidelines.

As part of the CBJ's endeavors to expand its supervisory umbrella- which started in 2015 by subjecting the MFIs to its supervision and oversight- to include all financing companies, The Finance Companies Bylaw No. (107) of 2021 was enacted, and entered into force on 30/5/2022, whereby all companies practicing financing activities will subject to the CBJ's licensing and supervision. This aims to integrate these companies into the financial sector, and ensuring their compliance with international standards, to strengthen the consumer protection scheme and to provide an institutional framework for these companies in a way that supports economic growth and financial stability.

2-2-2-3 FINANCIAL CAPABILITIES AND FINANCIAL EDUCATION

Promoting financial and banking education is a major enabler to strengthen the financial inclusion and enhance the financial consumer protection. Several studies indicated that raising individuals' financial literacy is a key factor to increase their savings, thus, supporting economic growth through providing the liquidity needed for investments. In turn, this enhances countries capability to withstand financial and economic crises. In Jordan, the CBJ highly prioritizes the financial education, given its importance in strengthening the financial, economic, and social stability in the Kingdom.

The CBJ believes in the importance of financial education to the Kingdom; accordingly, it initiated a project to promote and strengthen financial education in the Kingdom intended to raise Jordanian's capabilities in terms of the following:

- Comprehend the fundamental principles and concepts in the financial and banking sphere.
- The management and optimal investment of savings and personal properties.
- Increase the chances to access financial services offered by banks and financial institutions.

The project deploys several programs that target key sectors in the society. The main financial education program at schools was rolled out in cooperation with the Ministry of Education and INJAZ (a Jordanian non-profit organization). Financial education at schools started for the 7th grade curriculum in the academic year 2015/2016, for the 8th and 11th grades curricula in 2016/2017, for the 9th and 12th grades curricula in 2017/2018, and for 10th grade curriculum in 2018/2019.

In addition to the financial education program at schools, the project will include several other programs in the future as follows:

a- Financial education in higher education institutions.
b- Promoting financial education through media.
c- Financial education for startups.
d- Financial education at workplaces.
e- Financial education for women and rural areas.
f- Electronic financial education.

2-2-2-4 FINANCIAL CONSUMER PROTECTION

In light of economic headwinds imposed by the COVID-19 pandemic in Jordan and worldwide, as well as its direct and indirect implications on financial conditions of many individuals and corporates, the CBJ through the Financial Consumer Protection Department has initiated several actions and measures thereof:

On the legislative side, a number of regulations and circulars were issued to provide sufficient protection for the users of financial and banking services. The Instructions of financial consumer protection for licensed exchange companies were enacted, as well as the Instructions of financial consumer protection for payments and electronic money transfer companies. These instructions aim at laying the ground for a clear legislative framework that identifies the relationship between clients and the exchange and payments companies. In addition, a circular was disseminated to banks whereby they are permitted to offer prizes on saving accounts until the end of 2023, which are governed by quantitative and qualitative controls stipulated thereto, to regulate offering prizes at banks, and to avoid concentrating these prizes to a limited number of consumers. Furthermore, a circular was disseminated to banks and payment and electronic transfer companies, whereby they are required to review their websites, and to ensure their efficiency and commitment to the instructions and circulars related to the financial consumer protection. Another circular was also enacted to warn citizens against dealing with companies pretending to facilitate loans from banks and financial institutions by providing nonrefundable commissions paid by the applicant to these companies, the circular also urges citizens to seek safe and regulated channels to access loans.

With regard to reports, the financial consumer protection department issued the report of clients' complaints against banks and non-banking financial institutions for 2020, and the first half of 2021. The report analyzes clients' complaints against banks and financial institutions under the CBJ's supervision. This report is particularly significant as it analyzes clients' complaints, highlights the causes of main complaints, and sets the priorities needed to reduce these complaints, as well as focusing on banks and financial institutions efficiency in handling complaints. The report provides a thematic classification of complaints, and the channels used to file these complaints.

Furthermore, the Financial Consumer Protection Department conducted a survey to measure the customer satisfaction of clients with disabilities regarding the financial services and products of banks operating in the Kingdom, and to assess whether banks' services are accessible by customers with disabilities. Another market study was conducted to assess the financial health for Jordanians using one of the best international approaches approved by Financial Health Network.

On the front of the on-site and off-site supervision, the Department conducted the off-site supervision on banks and non-banking financial institutions through reviewing their websites, to ensure their compliance with the CBJ's regulations in terms of contents included such as (advertisements and marketing campaigns, the products and services terms and conditions, commissions and fees, and consumers' complaints issues), as well as reviewing the design of their websites and information published. This is in addition to follow up with the postponement of loans' installments due on clients affected by the COVID-19 pandemic through periodic reports provided by banks. As for the on-site supervision, several inspection visits were conducted for banks and non-banking financial institutions, to ensure their compliance with the financial consumer protection regulations, and check on banks and non-banking financial institutions actual calculation of commissions and fees on accounts and services provided to retail customers, as well as banks adherence to send SMS notices for customers regarding transactions on their account (credit or debit transactions including commissions). The inspection visits also involved mystery shopping visits to a number of exchange companies.

With regard to promoting the financial awareness and literacy, the CBJ initiated several on-site campaigns through visiting targeted segments, in tandem with electronic campaigns through disseminating a variety of educational material on the CBJ's website and the CBJ's page on Facebook as follows:

- In the (Global Money week) organized by the Organization for Economic Co-operation and Development (OECD), a financial awareness and education campaign was initiated for children. The campaign aimed to promote adopting sound financial habits and behaviors by the Jordanian society at an early age, and to gradually building their culture to enable them in making appropriate financial decisions, and enjoying a sound financial health in the future.
- An awareness campaign titled "Electronic payment Services, Safe and Smart Solutions" was launched to encourage electronic payment in the Kingdom. The campaign also intended to shift the Jordanian society's culture towards using digital financial services instead of Cash-Based Society.
- Several financial awareness and educational sessions were conducted for university students in different governorates in the Kingdom, to ensure outreaching all segments of society in all governorates. This is in addition to two visits to two factories in the north and south of the Kingdom targeting working women and expatriates. In addition, the CBJ cooperated with the Higher Council for the Rights of Persons with Disabilities to furnish them with a package of educational materials, and the CBJ also participated in one of the events organized by the Council. Moreover, the CBJ also participated in the "Ayla Red Sea Half-Marathon" event, which was organized by Run Jordan in Aqaba. Several educational leaflets were distributed for participants, in addition to disseminating electronic educational materials on electronic payment solutions, their benefits, and how to use them securely.
- As electronic financial fraud has increased locally and globally, a series of videos and

leaflets were published to raise citizens' awareness to prevent them from being victims to all forms of electronic financial fraud.

2-2-2-5 BUILDING AN ENABLING INFRASTRUCTURE TO PROMOTE FINANCIAL INCLUSION

2-2-2-5-1 DIGITAL FINANCIAL SERVICES

- In 2021, the CBJ continued to provide electronic services to its clients including ministries and governmental institutions and departments through the (E-Banking) system. In 2021, the system allowed the clients to use the inquiry service to check their accounts balances, and to obtain bank statements and notices. The CBJ also provided banking services to its clients including (transfers, cash checks, and checks through the Electronic Checks Clearing (ECC)).
- In 2021, the CBJ also operated the (ECC) system for clearing licensed banks checks; (248) clearing sessions were conducted in 2021, as follows:

Number and Value of Checks Provided for Clearing through the ECC during 2020-2021		
(Number and Value) (in million)	**2020**	**2021**
Cleared Checks provided:		
Total Number	6.95	6.89
Total Value	34,235.02	37,660.85
Checks disbursed:		
Total Number	6.48	6.69
Total Value	32,501.98	36,419.4
Returned checks:		
Total Number	0.47	0.24
Total Value	1,733.3	1,241.5
Returned checks/ total checks (Number)	6.7%	3.5%
Returned checks/ total checks (value)	5.1%	3.3%

- The CBJ continued to operate the Real Time Gross Settlement System (RTGS-JO) to carry out transfer transactions between the accounts of member banks in Jordanian Dinar, US Dollar, Euro, and Pound Sterling. These transactions were as follows:

	2020		**2021**	
	Number (thousand)	**Value (million)**	**Number (thousand)**	**Value (million)**
JD	278	68,881	307	64,582
USD	31	32,920	33	40,960
Euro	3	2,268	4	2,139
GBP	0.4	54	0.5	228
Open Market Operations (Number)	6,962 transactions		8,192 transactions	
Open Market Operations (Value)	JD 12,091 million		JD 7,435 million	

- The CBJ also maintained operating the Automated Clearing House system (ACH) which supports the new ISO standard (ISO 20022). The ACH system provides a secure infrastructure to execute retail payments between member banks and their clients, including the CBJ. The system processes the credit and debit money transfers, pre-mandated debit transfers, and the payments of government, financial institutions, and other private sector institutions, as indicated below:

Item	2020	2021
Number of transfer orders executed through the system	6.9 million orders	9.6 million orders
Value of transfer orders executed through the system	JD 5.4 billion	JD 7.1 billion

2-2-2-5-2 CREDIT INFORMATION COMPANY

CRIF-Jordan is one of the milestones in the financial system infrastructure. It continued to expand and furnish its database in terms of numbers and diversified sectors of information providers. By the end of 2021, CRIF signed agreements with (71) providers, compared to (66) providers in 2020; credit providers can benefit from the credit inquiry service. In terms of sectors, the agreements were signed with (23) banks, (12) financial leasing companies, (9) MFIs, and (27) other sectors.

On another front, CRIF pursued to include new value-added services; it initiated the credit scoring service, the Portfolio Alert service, and the Batch Enquiries service.

2-3 THE FINANCIAL SYSTEM LEGISLATIVE INFRASTRUCTURE

The foundation of an appropriate legislative framework for the financial system would definitely enhance the financial stability; practices evidenced that inappropriate supervisory and regulatory legislations for the financial system would deepen systemic financial crises when they occur. The CBJ verifies on an ongoing basis the soundness of businesses and the performance of the banking and financial institutions under its supervision, and ensures the soundness of their financial positions in consistency with effective laws, bylaws, regulations, and banking practices to achieve the requirements of the banking soundness and the monetary and financial stability. The CBJ in 2021 proceeded with a comprehensive review of the legislative framework governing the business of the banking and financial institutions under its supervision, in line with the CBJ's strategy for effective banking supervision that complies with international best standards and practices. This also extends the CBJ's efforts exerted to lay the ground for robust banking and financial industry, as follows:

2-3-1 LAWS AND BYLAWS

2-3-1-1 THE INSURANCE REGULATORY LAW

A Royal Decree was issued to pass the Insurance Regulatory Law No. (12) of 2021, published in the Gazette on 16/5/2021, which entered into force thirty days after publication, whereby the insurance business became under the CBJ's supervision. The provisions of this Law shall apply to insurance companies, reinsurance companies, insurance services providers, and all relevant parties, to ensure the rights of the insured and beneficiaries, as well as the soundness of the insurance and reinsurance companies' financial positions.

The Law reflects the CBJ's vision and its endeavor towards improving the regulatory and supervisory frameworks of the insurance business in accordance with international best standards and practices. It also aligns with the CBJ's disposition to strengthen the stability and soundness of the insurance sector to enable it to perform its envisioned role in serving the national economy.

2-3-1-2 ANTI MONEY LAUNDERING AND COUNTER TERRORIST FINANCING LAW

A Royal Decree was issued to pass the Anti Money Laundering and Counter Terrorist Financing Law No. (20) of 2021, which was published in the Gazette on 16/9/2021. The law includes a set of articles that outline the general policy for combating money laundering, terrorist financing, and proliferation of weapons of mass destruction. The Law identifies the perpetrators of money laundering and terrorist financing offenses, as any person commits, assists, abets, or conceals a money laundering and terrorist financing offense, or has the intention to commit, involve in, or try to commit that offense which is penalized according to legislations in force. This will help competent authorities to recover proceeds generated directly or indirectly from these offenses.

2-3-1-3 REGULATING INSURANCE BUSINESS FEES BYLAW

This Bylaw (Regulating Insurance Business Fees) No. (18) of 2022, issued pursuant to Article (31) of the Constitution, according the Cabinet's decision on 27/2/2022, as well as Article (95) of the Insurance Regulatory Law no. (12) of 2021. The new bylaw stipulates the annual fee levied on insurance companies at 0.0045 of total premiums. However, to regulate the fees payments, the aforementioned ratio shall be paid to the CBJ starting from June 2021, while all fees due before and unpaid, will be subject to the ratio stipulated in Regulating Insurance Business Fees bylaw no. (36) of 2000, and its amendments, and shall be paid to the CBJ.

2-3-1-4 INSURANCE COMPANIES DEPOSIT BYLAW

The (Insurance Companies Deposit Bylaw) No. (19) of 2022, issued pursuant to Article (13/ a) of the Insurance Regulatory Law No. (12) of 2021, whereby insurance companies shall deposit a JD deposit in any of operating banks in the Kingdom, according to the solvency margin instructions in force; a proof of deposit shall be sent to the CBJ. This is to ensure the insurance companies' adherence to the provisions of the law and respective bylaws and instructions thereof. According to the provisions of this bylaw, the bank keeping the deposit shall not use the deposit in full or in part, without a previous written consent of the CBJ's governor.

2-3-1-5 LICENSING EXCHANGE COMPANIES BYLAW

The (Licensing Exchange Companies Bylaw), issued pursuant to Article (31) of the Constitution according to the Cabinet's decision on 9/5/2021, and articles (5), (15), and (33) of the Money Exchange Business Law of 2015. The bylaw restricts the practicing of the exchange business to Jordanian companies registered in the companies control department only. The bylaw constitutes a regulatory and institutional framework that puts in place clear and objective criteria for licensing exchange companies.

2-3-1-6 FINANCE COMPANIES BYLAW

The (Finance Companies Bylaw) No. (107) of 2021, issued pursuant to Article (31) of the Constitution, and the Cabinet's decision on 27/10/2021, as well as article (65) of the CBJ law No. (23) of 1971. The provisions of this bylaw apply to all companies practicing financing activities including (microfinance, financial leasing, factoring, mortgage financing, mortgage refinancing, and lending-based crowdfunding) in consistency with the provisions of this bylaw. The bylaw is a legislative framework for finance companies under the CBJ's supervision in terms of licensing requirements and the financial activities they are allowed to practice, including *inter alia* capital requirements. This ensures providing an institutional framework and setting clear and objective criteria for licensing these companies. It is noteworthy that that the new bylaw repeals the microfinance bylaw No. (5) of 2015.

2-3-2 INSTRUCTIONS

2-3-2-1 INSTRUCTIONS FOR THE REQUIREMENTS, SCOPE, AND TASKS OF APPOINTED CHARTERED ACCOUNTANTS FOR INSURANCE COMPANIES

The Instructions for the Requirements, Scope, and Tasks of Appointed Chartered Accountants for Insurance Companies No. (5/2022) were enacted by the CBJ's Board of Directors pursuant to the provisions of Article (32/ a) and Article (109/ b) of the Insurance Regulatory Law No. (12) of 2021; the provisions of this Law shall apply to insurance companies as of 23/2/2022.

The instructions regulate the policy of audit service, and the criteria for selecting the audit office, which must be approved by the insurance company's management, and copied to the CBJ on an annual basis. This is in light of the significant role of the external chartered accountant in ensuring the integrity and accuracy of the insurance companies' financial statements, the increasing eligibility requirements for the external chartered accountants to match the complexity of the insurance companies' businesses, as well as the requirements of international financial reporting standards.

2-3-2-2 INSTRUCTIONS FOR INSURANCE COMPANIES GOVERNANCE

The Instructions for Insurance Companies Governance No. (1/ 2022) issued pursuant to the CBJ's board of directors' decision No. (13/ 2022) dated 16/1/2022, and came into force as of 15/2/2022.

These instructions stipulate the general frameworks that insurance companies must conduct to achieve envisioned institutional objectives, to perform a sound management for their operations, and to protect the interests of the insured and beneficiaries. This is in addition to strengthening the soundness of the insurance sector, and the commitment towards shareholders and other stakeholders, as well as the insurance companies' compliance with the legislations in force and their internal policies.

2-3-2-3 INSTRUCTIONS OF EFFECTIVE INTEREST OWNERSHIP

The Instructions of "Effective Interest" Ownership No. (8/2021) enacted on 17/8/2021 in the virtue of Article (34) of the Banking Law No. (28) of 2000 and its amendments, and pursuant to Article (99/b) of the same law, whereby banks are required to provide the CBJ with the owners of direct or indirect significant ownership in the capital of banks in Jordan, regardless of the percentage of ownership. Furthermore, no changes or transfers in the ownership structure shall take place without a prior approval from the CBJ, including transfers, or modification transactions. The persons benefiting from the transfer or change of ownership shall fill the forms designated thereto, and all supporting documents shall be sent to the CBJ before conducting the transaction.

2-3-2-4 INSTRUCTIONS FOR BANKS OWNERSHIP OF STOCKS AND SHARES IN COMPANIES' CAPITAL

The Instructions No. (5/2021) for banks ownership of stocks and shares in companies' capital were issued on 6/4/2021. The Instructions aim to mitigate the risks of using the funds of banks and their subsidiaries inside and outside Jordan to preserve banks' solvency.

2-3-2-5 THE INSTRUCTIONS OF FINANCIAL CONSUMER PROTECTION FOR ELECTRONIC PAYMENT AND MONEY TRANSFER COMPANIES

The Instructions of financial consumer protection for electronic payment and money transfer companies No. (3/2021) were issued on 3/3/2021. These instructions entered into force three months after issuance, and apply to all electronic payment and money transfer companies in the Kingdom licensed to practice any of the payment services or administrating and operating the electronic payment systems. The instructions address the relationship governing the payment service provider and the client in terms of several issues, namely: the disclosure and transparency, commissions and fees, contracts, personal data protection, the protection of electronic payment accounts against fraud and hacking, handling consumers' complaints, and others.

2-3-2-6 THE INSTRUCTIONS OF EXTENDING DIRECT FACILITIES IN FOREIGN CURRENCY AND THE CONTROLS OF PROVIDING CREDIT FACILITIES FOR PERSONS NOT PRACTICING AN ACTIVITY INSIDE THE KINGDOM AND/ OR FINANCING ACTIVITIES OUTSIDE THE KINGDOM

The CBJ on 3/3/2021 enacted the Instructions of extending direct facilities in foreign currency and the controls of providing credit facilities for persons not practicing an activity inside the kingdom and/ or financing activities outside the kingdom No. (2/2021). The Instructions aim to put in place a framework for the regulations and circulars governing the banks' provision of direct credit facilities in foreign currency, as well as credit facilities extended for persons not performing an activity inside the Kingdom, and/ or financing activities outside the Kingdom, so that all these instructions are included in one document. These Instructions shall come into force on the date of issuance, and banks shall furnish the CBJ with the data related to the Instructions on a quarterly basis, starting from the end of March 2021, using the forms designated thereto.

2-3-2-7 THE INSTRUCTIONS OF FINANCIAL CONSUMER PROTECTION FOR EXCHANGE COMPANIES CLIENTS

The CBJ issued the Instructions of financial consumer protection for the exchange companies clients No. (1/2021) on 11/1/2021. The provisions of these Instructions apply to licensed exchange companies in the Kingdom under the CBJ's supervision and oversight. The Instructions set forth that the services provided by the exchange companies shall be clear and comprehensive, the clients data shall be protected, the clients shall be treated with fairness and respect, and their complaints shall be handled. The Instructions also included that exchange companies are required to publish these Instructions on their websites.

2-3-3 SUPERVISORY CIRCULARS

The CBJ in 2021, and the first half of 2022 has enacted several supervisory circulars; namely:

- Circular No. (27/4/11698) dated 8/8/2021, directed to payment and electronic money transfer companies, whereby payment services providers are obliged to enhance their websites in order to publish and disclose information about their products and services, the commissions and prices they charge, and other information that contributes to building a clear understanding among customers about the payment service providers, and their services and products. This is in addition to disseminating their location, branches, and network of agents licensed by the CBJ, as well as the instructions of the financial consumer protection for payment and electronic transfer companies, in accordance with the provisions of Article (26) of the instructions of the financial consumer protection for payment and electronic money transfer companies. The CBJ shall verify the commitment of the payment services providers to the circular requirements.

- Circular No. (27/2/14180) dated 19/9/2021, directed to banks operating in the Kingdom, whereby banks are required to send (SMS) to all retail customers regarding all types of banking products, provided that the service shall be transaction-related (withdrawal, deposit, commission, fees). No additional costs shall be charged to customers, and these messages shall be sent shortly after executing the transactions on retail customers accounts.

- Circular No. (17/1/14693) dated 27/9/2021, directed to insurance companies regarding the guideline for applying the requirements of IFRS (17) published in Arabic and English. The standard specifies the minimum aspects to consider when setting policies and procedures, and making decisions related to the standard's requirements.

- Circular No. (27/1/15724) dated 13/10/2021, directed to banks operating in the Kingdom, whereby they are requested to check out their websites, and ensure their compliance with all effective instructions and circulars related to the financial consumer protection.

- Circular No. (27/1/16209) dated 24/10/2021, directed to all banks operating in the Kingdom, whereby they are required to protect customers against electronic fraud. It requires sending an (OTP) message to the customer indicating the amount to be paid, in case the number is used and/ or provided to others. This is in addition to raising customers' awareness periodically about the risks of sharing (OTP) with third parties.

- Circular No. (17/3/19355) dated 15/12/2021, directed to the insurance companies, regarding revoking previous approvals granted for issuing and marketing the vehicle insurance contract - comprehensive loss starting from 1/1/2022. If any company intends to re-issue and market these contracts, a new application must be submitted for further investigation according to Article (27) of the Insurance Regulatory Law.

- Circular No. (9/3/17/179) dated 3/1/2022, directed to licensed exchange companies, regarding the CBJ's board of directors' decision No. (212/2021) dated 14/12/2021, whereby electronic payment systems licensed to be administered and operated by exchange companies in the Kingdom to conduct electronic money transfers are approved, provided that these systems are used in one or more countries other than the Kingdom.

- Circular No. (10/1/1546) dated 25/1/2022, directed to all licensed banks, whereby banks are required to report any discovered cases of (embezzlement, forgery, theft or fraud, and other similar cases) to specialized security authorities, even if they were closed, or did not result in material financial losses for the bank. Banks also shall inform the CBJ with these cases specified by dates, and prove that they had reported these cases to specialized security authorities, evidenced by reporting dates.

- Circular No. (17/1/2363) dated 6/2/2022, directed to insurance companies and insurance service providers, regarding the disclosure of commissions and fees of the services they provide to clients.

- Circular No. (23/2/5250) dated 27/3/2022, directed to banks operating in the Kingdom, whereby they are requested to conduct stress testing as of 31/12/2021. They are required to conduct sensitivity tests including tests for the impacts of COVID-19 pandemic and the global geopolitical tensions, as well as the risks of climate change at the level of banks branches in Jordan, and at the consolidated level. However, scenario analyses shall be applied on the bank's branches in Jordan only. The testing results shall be sent according to the forms attached to the circular, in a period not exceeding the end of April 2022.

- Circular No. (28/2/5564) dated 30/3/2022, directed to MFIs operating in Jordan, whereby they are required to raise the awareness of their customers against electronic fraud through social media or other different websites.

- Circular No. (17/3/5874) dated 4/4/2022, directed to insurance services providers, regarding the payment of the annual fee levied by the CBJ for submitting a license renewal application.

- Circular No. (17/3/5848) dated 4/4/2022, directed to the insurance companies, regarding collecting the annual fee from the insurance companies according to their written premiums. The CBJ shall be notified upon each annual fee deposit.

- Circular No. (27/1/6792) dated 20/4/2022, directed to banks operating in the Kingdom, whereby they shall not charge any commissions for credit inquiry to assess or re-assess a customer's creditworthiness and financial solvency, whether the customers' application for credit was approved or rejected.

- Circular No. (10/2/8316) dated 24/5/2022, directed to all banks operating in the Kingdom, whereby the license granted to the National Bank of Kuwait (Jordan) is revoked as of end 25/5/2022. The assets and liabilities of the National Bank of Kuwait were transferred to the Arab Jordan Investment Bank in accordance with the agreement signed between the two banks.

- Circular No. (9/3/17/9024) dated 5/6/2022, directed to licensed exchange companies, whereby they are required to continuously verify whether their dealings with external parties are in compliance with any conditions and/or requirements imposed by the legislations in force in the countries of these parties. In addition, they are required to comply with the conditions and requirements of the legislations in force in the Kingdom.

- Circular No. (17/2/9786) dated 19/6/2022, directed to reinsurance brokers regarding reinsurance arrangements and schemes. Brokers are required to conduct reinsurance contracts only with reinsurance companies classified within the first and second categories, according to the credit rating stipulated in the decision of the Solvency Margin Instructions in force.

- Circular No. (9/4/9982) dated 22/6/2022, directed to licensed exchange companies, whereby they shall apply the legislations related to importing and exporting of foreign banknotes and coins, and precious metals, as well as to attach the CBJ's approvals upon dealing with any of external parties in this regard, when clearing inbound/ outbound shipments.

CHAPTER THREE: DEVELOPMENTS AND RISKS OF THE FINANCIAL SECTOR

3-1 INTRODUCTION

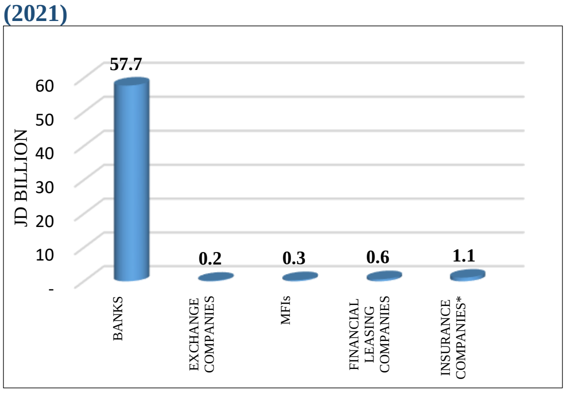
The financial sector in Jordan consists of banks, insurance companies, exchange companies, financial intermediation, financial services companies, and financing companies including MFIs, financial leasing, factoring, mortgage financing, mortgage refinancing, in addition to lending-based crowdfunding.

The CBJ assumes the oversight and supervision on the banking sector, the exchange companies, and the MFIs, which were brought under the CBJ's supervision since 1/6/2015. Furthermore, the Finance Companies Bylaw No. (107) of 2021 was enacted and entered into force on 30/5/2022, whereby all companies practicing financing activities are subject to the licensing and supervision of the CBJ.

In addition, a Royal Decree was issued to pass the Insurance Regulatory Law No. (12) of 2021, published in gazette on 16/5/2021, whereby the CBJ is in charge of overseeing and supervising the insurance sector.

Banks dominate the financial sector in Jordan, with total assets of JD 59.9 billion, accounting for 96.3% of the financial sector's total assets. (Figure 3-1).

FIGURE 3-1: TOTAL ASSETS OF THE FINANCIAL SECTOR IN JORDAN ACCORDING TO THE COMPONENTS OF THE FINANCIAL SECTOR (2021)

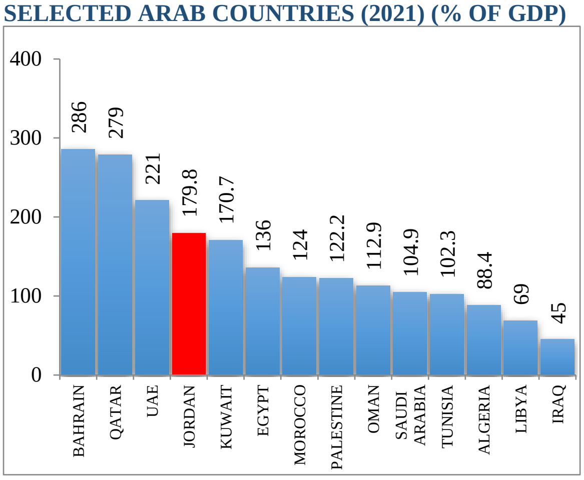


Source: CBJ.

3-2 MAJOR DEVELOPMENTS OF THE BANKING SECTOR IN JORDAN (ASSETS AND LIABILITIES OF BRANCHES OPERATING IN JORDAN)

Licensed banks' assets stood at JD 57.7 billion at the end of 2021, accounting for 179.8% of GDP, compared to 174.3% in 2020. Jordan ranked fourth amongst selected Arab countries. (Figure 3-2).

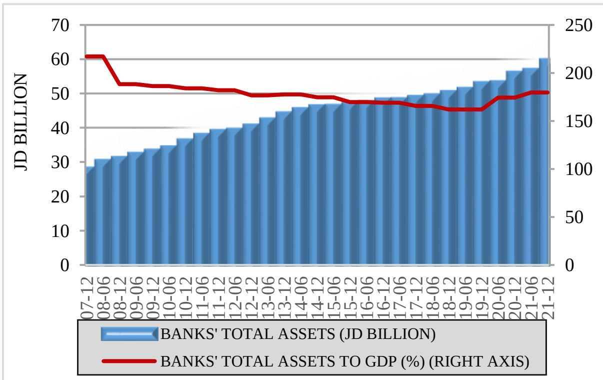
FIGURE 3-2: TOTAL ASSETS OF BANKS IN SELECTED ARAB COUNTRIES (2021) (% OF GDP)



Source: for Jordan's data: CBJ.
Data of other Arab countries: Financial Stability in Arab Countries Report 2021.

Although banks' assets in percent of GDP increased in Jordan, they were on the decline during the period (2007-2021). They decreased from 217.2% at the end of 2007, to reach 179.8% at the end of 2021. (Figure 3-3).

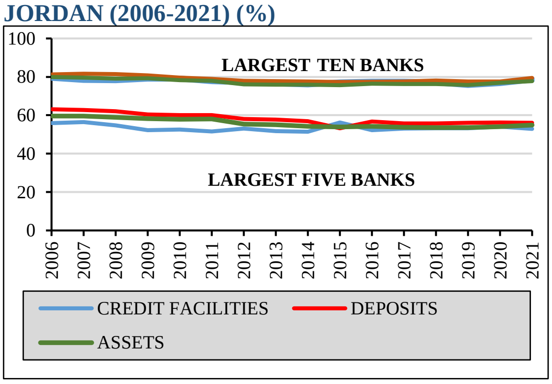
FIGURE 3-3: DEVELOPMENTS OF ASSETS OF BANKS OPERATING IN JORDAN, AND THEIR RATIO TO GDP (2007-2021)



Source: CBJ.

With respect to the market share of banks (concentration), the assets of the largest five banks (out of 23 banks) accounted for 54.9% of licensed banks' total assets at the end of 2021, while the assets of the largest ten banks approximated 77.8%. It is noteworthy that during the last fifteen years the market share of the largest five and largest ten banks were shrinking; from 59.6% and 79.9% in 2006, respectively. Therefore, the concentration ratio of licensed banks is declining (Figure 3-4), yet, the concentration at the banking sector in Jordan is still relatively high.

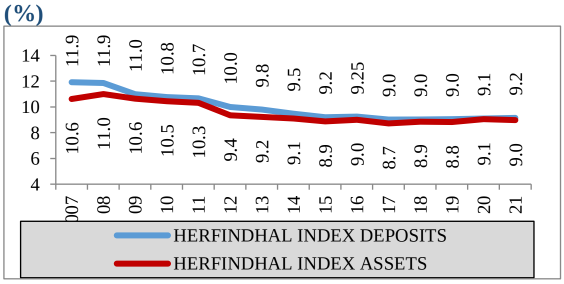
FIGURE 3-4: THE CONCENTRATION RATIO FOR THE BANKING SECTOR OPERATING IN JORDAN (2006-2021) (%)



Source: CBJ.

As for the competitiveness of the banking sector in Jordan; according to the Herfindahl Index (HI) of the banking sector's assets, the competitiveness was improved, as the HI declined from 10.6% at the end of 2007 to reach 9% by the end of 2021. These figures suggest that competitiveness of the banking sector in Jordan is improving steadily, as banks enhanced their businesses and products to boost their competitiveness. It is worth indicating that the decline in the concentration ratios for the banking sector in Jordan, and the enhanced competitiveness, reflect positively on the financial stability in Jordan (Figure 3-5).

FIGURE 3-5: HERFINDAHL INDEX FOR BANKS' ASSETS AND DEPOSITS IN JORDAN (2007-2021) (%)

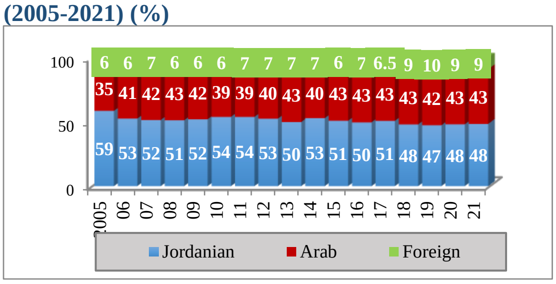


Source: CBJ.

3-2-1 BANKS' OWNERSHIP STRUCTURE

The share of foreigners (Arabs and Non-Arabs) in licensed banks' capital in Jordan reached to 52% in 2020 and 2021, which is considered amongst the highest in the region; as no restrictions are imposed thereto. It is worth mentioning that this share declined in 2010 and 2011, and increased again afterwards, which validates the increasing investors' confidence in the banking system in Jordan in particular, and the Jordanian economy in general. Most of foreigners' capital ownerships are stable strategic contributions (Figure 3-6).

FIGURE 3-6: OWNERSHIP STRUCTURE OF THE BANKING SECTOR OPERATING IN JORDAN (2005-2021) (%)

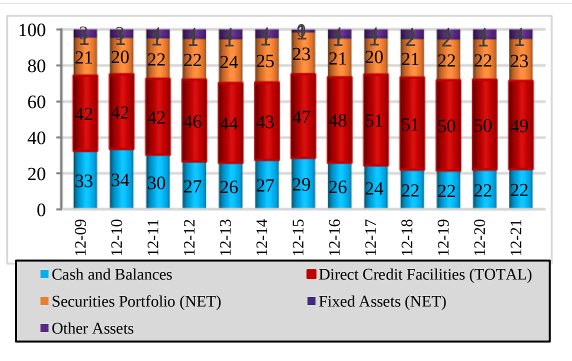


Source: CBJ.

3-2-2 USES OF FUNDS (ASSETS)

As for the structure of assets of banks operating in the Kingdom (uses of funds), credit facilities portfolio is still the largest component accounting for around 49% of banks' total assets at the end of 2021, compared to 50.1% at the end of 2020. This decrease is due to the growth of assets at rates higher than credit facilities growth (Figure 3-7).

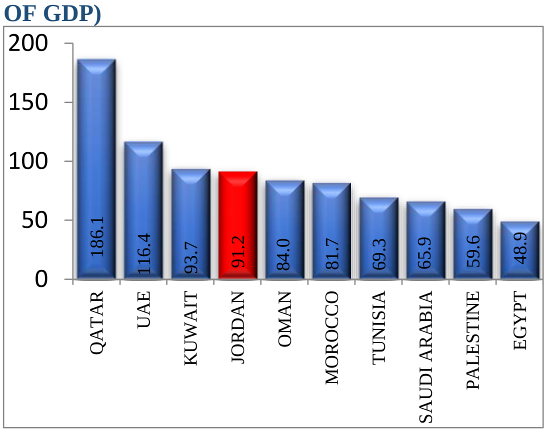
FIGURE 3-7: ASSETS STRUCTURE OF BANKS OPERATING IN JORDAN - USES OF FUNDS (2009-2021) (%)



Source: CBJ.

Direct credit facilities grew by 5% at the end of 2021 to reach around JD 29.3 billion, compared to a growth of 5.4% in 2020. It is worth mentioning that total credit facilities approximated 91.2% of GDP at the end of 2021, compared to 90% in 2020. Jordan outperformed a number of selected countries in the region (Figure 3-8).

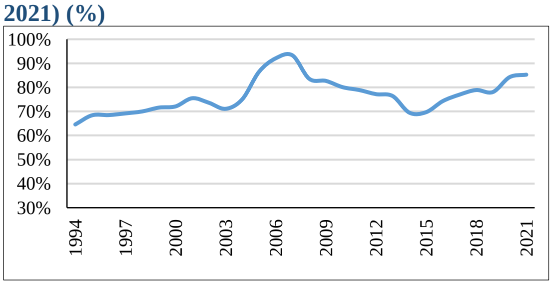
FIGURE 3-8: CREDIT FACILITIES FOR JORDAN AND SELECTED ARAB COUNTRIES IN 2021 (% OF GDP)



Source: for Jordan's data: CBJ.
Data of other Arab countries: Financial Stability in Arab Countries Report 2021.

Despite the increase in this ratio by 4.9% as compared to its historical trend, no additional capital buffers are required to impose on banks, as a large part of credit growth in 2021 was not an actual growth, rather it resulted from the postponement of loans installments due on stressed households and corporates affected by the COVID-19 pandemic. According to Basel III Accord, a capital buffer shall be imposed on banks if credit growth is not proportionate with the economic activity, as it signals to the accumulation of systemic risks and price bubbles are very likely, however, this cannot be validated currently. (Figure 3-9).

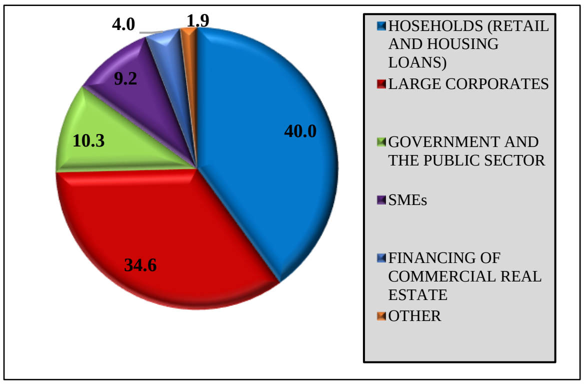
FIGURE 3-9: CREDIT EXTENDED TO THE PRIVATE SECTOR AS PERCENT OF GDP (1994-2021) (%)



Source: CBJ

With regard to the sectoral distribution of direct credit facilities as of end 2021, credit extended to households accounted for the largest share of 40% of these facilities, followed by credit extended to corporates which formed 34.6%. Credit extended to the government and public sector accounted for 10.3% of total credit facilities at the end of 2021, compared to 9.6% at the end of 2020. Moreover, credit provided to SMEs reached 9.2% of total credit facilities, at the end of 2021, while credit extended to the financing commercial real estates recorded 4% of total credit facilities in 2020 and 2021. (Figure 3-10).

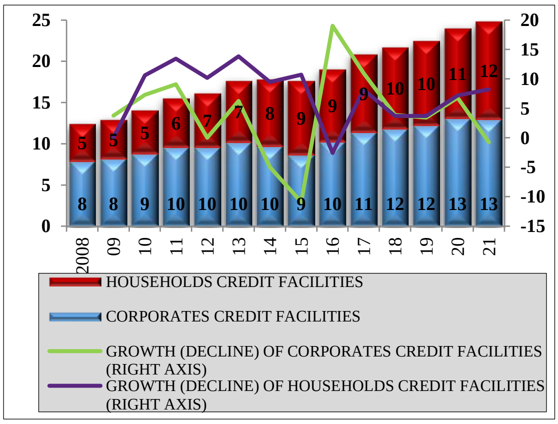
FIGURE 3-10: SECTORAL DISTRIBUTION OF CREDIT FACILITIES EXTENDED BY BANKS OPERATING IN JORDAN (2021) (%)



Source: CBJ

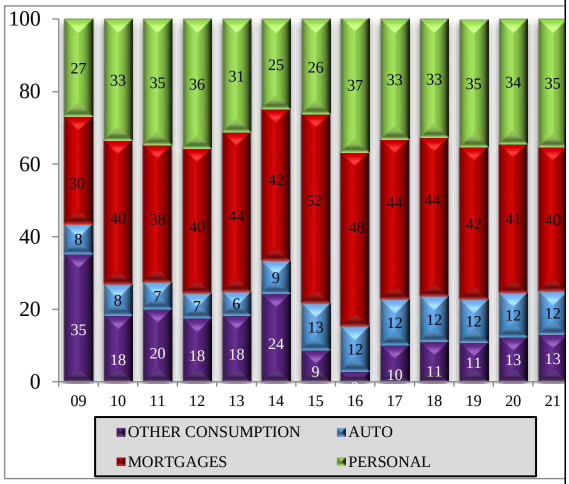
As for credit extended to households, mortgages accounted for the largest share of around 39.9% of households' loans at the end of 2021, compared to 41.1% at the end of 2020, followed by personal loans, which formed 35.1% at the end of 2021, compared to 34.4% at the end of 2020. Furthermore, consumption loans accounted for 13.1% of households' loans at the end of 2021, against 12.5% at the end of 2020. However, auto loans share of households' loans declined slightly from 12% at the end of 2020 to 11.9% at the end of 2021. In addition, credit facilities provided to corporates declined slightly by 0.8% at the end of 2021, compared to growing by 6.8% at the end of 2020, taking into account that a large part of the 2020 growth was primarily due to the postponements of loans repayments, as well as restructuring and rescheduling of the debts of corporates impacted by the COVID-19 pandemic. (Figures 3-11, 3-12).

FIGURE 3-11: DEVELOPMENTS OF CREDIT FACILITIES EXTENDED TO HOUSEHOLDS AND CORPORATES (2008-2021) (JD BILLION)



Source: CBJ

FIGURE 3-12: CREDIT FACILITIES EXTENDED TO HOUSEHOLDS (2009-2021) (%)

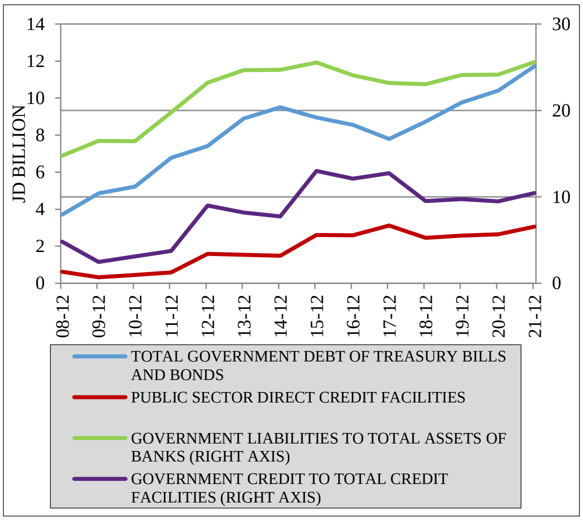


Source: CBJ

With regard to banks' exposure to government debt, in terms of investments in government bonds or providing government-guaranteed loans to certain public institutions, the government debt held by banks reached around JD 14.8 billion (accounting for 25.6% of banks' total assets) at the end of 2021, compared to JD 13.1 billion (accounting for 24.1% of banks' total assets) at the end of 2020. The increase in government debt was mainly due to the increase in government bonds from JD 10.4 billion at the end of 2020, to reach JD 11.7 billion at the end of 2021. It is worth mentioning that, government debt owed to banks as of end 2021 consists of JD 11.7 billion government bonds, and JD 3.1 billion credit facilities.

Banks' exposure to the government or government-guaranteed debt relative to banks' assets increased from 14.8% at the end of 2008, to reach 25.6% at the end of 2021 (Figure 3-13).

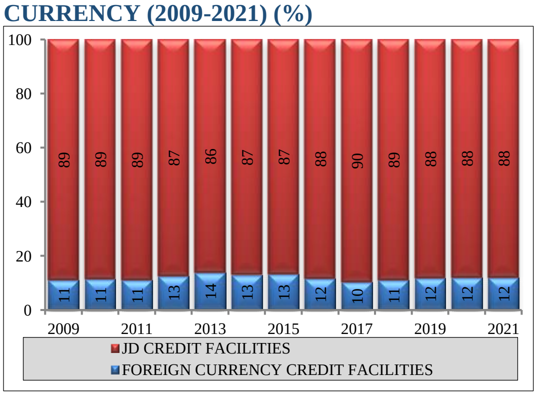
FIGURE 3-13: BANKS EXPOSURE TO GOVERNMENT DEBT (2008-2021)



Source: CBJ

As for credit facilities according to currency, they are primarily denominated in JDs constituting about 88% of total credit facilities at the end of 2021, exactly the same as of end 2020. (Figure 3-14).

FIGURE 3-14: CREDIT FACILITIES EXTENDED BY BANKS OPERATING IN JORDAN BY CURRENCY (2009-2021) (%)

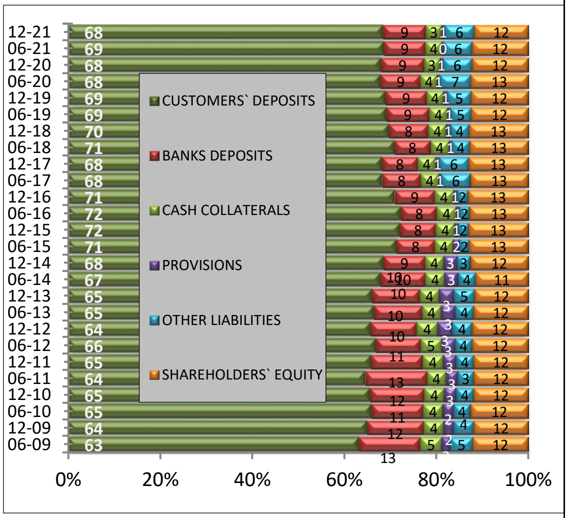


Source: CBJ

3-2-3 SOURCES OF FUNDS (LIABILITIES)

Analyzing the sources of funds in the banking system reveals that deposits represent the major source of funding, accounting for 68.4% of total sources at the end of 2021, compared to 68% at the end of 2020. (Figure 3-15).

FIGURE 3-15: LIABILITIES STRUCTURE OF BANKS OPERATING IN JORDAN (2009-2021) (%)



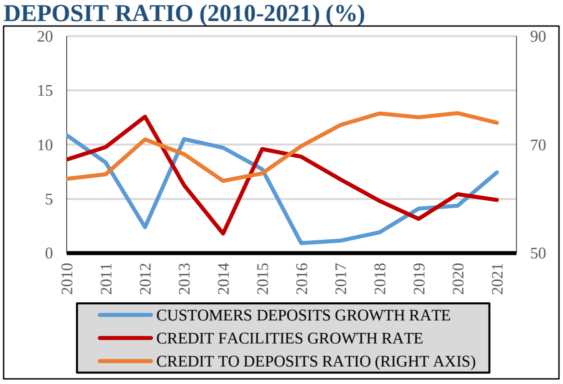
Source: CBJ

The second main source of funding is the shareholders' equity, which increased from JD 6.6 billion at the end of 2020, to reach JD 6.8 billion at the end of 2021, accounting for 11.7% of total sources of funds.

Deposits of banks are the third source of funds in terms of significance; they accounted for 9.3% at the end of 2021 and 2020.

With regard to developments of clients' deposits in the banking sector, they increased by 7.4% in 2021, compared to 4.2% in 2020, to reach around JD 39.5 billion. The ratio of credit facilities to deposits at the banking system in Jordan declined from 75.8% at the end of 2020, to reach 74% at the end of 2021 (Figure 3-16).

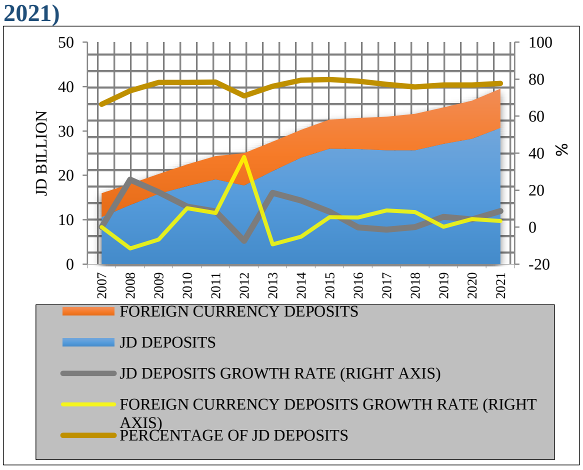
FIGURE 3-16: DEPOSITS AND CREDIT FACILITIES GROWTH RATES, AND CREDIT TO DEPOSIT RATIO (2010-2021) (%)



Source: CBJ

As for the composition of deposits in terms of currency, the JD-denominated deposits account for the largest share of deposits. Analyzing the changes in the ratio of JD-denominated deposits to total deposits indicates that they increased markedly from 66.4% at the end of 2007 to reach 78.4% at the end of 2011. However, it started to decline reaching its record low of 71% by the end of 2012, affected by the economic headwinds that hit Jordan in 2012. Nevertheless, during the years 2013, 2014, and 2015, and due to the improving economic conditions, as most economic and monetary fundamentals have improved, the JD-denominated deposits bounced back to reach its peak of 79.8% of total deposits at the end of 2015. During the period (2016- 2018) they decreased to 75.8% at the end of 2018, and increased afterwards during the period (2019-2021) to record 77.6% as of end 2021. This level is considered comfortable, reflects the confidence in Jordanian dinar as a saving currency, and strengthens the monetary and financial stability in the Kingdom (Figure 3-17).

FIGURE 3-17: JD AND FOREIGN CURRENCY DEPOSITS LEVELS AND GROWTH RATES (2007-2021)



Source: CBJ

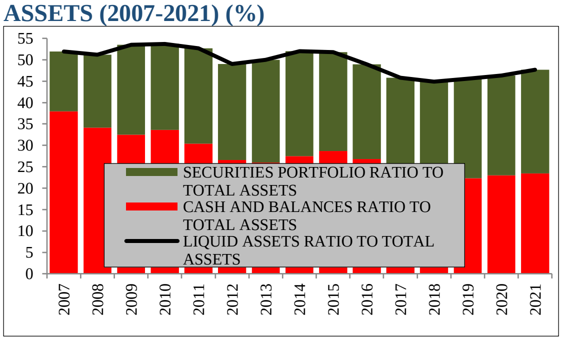
3-2-4 RISKS OF THE BANKING SECTOR IN JORDAN- FINANCIAL SOUNDNESS INDICATORS

Despite the unprecedented adversities that hit Jordan and the world due to the ramifications of COVID-19 pandemic; the financial and administrative positions of the banking sector in Jordan were broadly sound and resilient. In 2021, and the first half of 2022, most financial indicators and ratios for the banking sector showed a notable improvement, supported by the gradual recovery form the implications of COVID-19 pandemic. The next sections elaborate on the main developments of banks' financial ratios and indicators.

3-2-4-1 LIQUIDITY

The banking sector in Jordan enjoys a safe liquidity position; the liquidity indicators at the end of 2021 evidenced that the liquidity position of banks is sound and robust. The cash and balances stood at 23.4% of total assets at the end of 2021, compared to 23% at the end of 2020, while the share of securities portfolio (highly liquid) to total assets reached to 24.3% at the end of 2021, compared to 23.3% at the end of 2020. Accordingly, high-liquid assets accounted for around 47.7% of total assets at the end of 2021, compared to 46.3% at the end of 2020 (Figure 3-18).

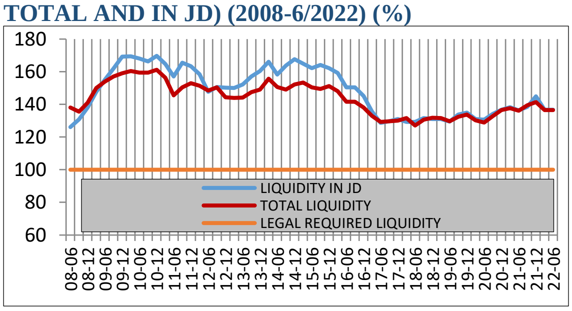
FIGURE 3-18: LIQUID ASSETS TO TOTAL ASSETS (2007-2021) (%)



Source: CBJ

The legal liquidity ratio imposed by the CBJ on banks increased from 136.5% at the end of 2020, to reach 141.5% at the end of 2021 (Figure 3-19). However, it declined slightly to 136.7% by the end of June 2022, yet it is still adequately higher than the CBJ's minimum requirement of 100%. This slight decline is attributed to the credit facilities being growing at higher rates than deposits during the first half of 2022. (Figure 3-19).

FIGURE 3-19: LEGAL LIQUIDITY RATIO (IN TOTAL AND IN JD) (2008-6/2022) (%)



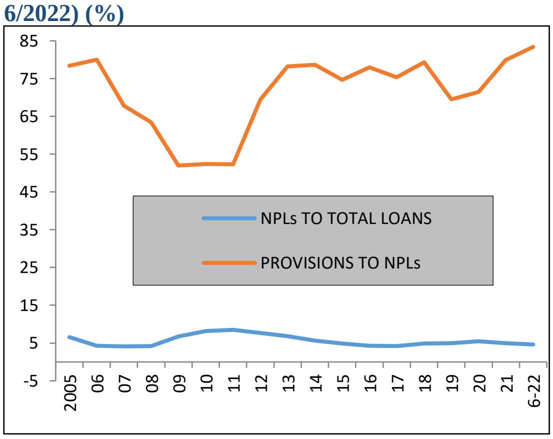
Source: CBJ

3-2-4-2 QUALITY OF ASSETS

The ratio of NPLs to total loans declined at the end of 2021 to reach 5%, compared to 5.5% at the end of 2020. The NPLs ratio to total loans declined further during the first half of 2022 to reach 4.6%. This implies that banks in Jordan maintain high quality assets.

As for the provisions coverage ratio to NPLs, it increased to 79.9% at the end of 2021, compared to 71.5% at the end of 2020, and increased further to 83.4% at the end of June 2022, which indicates that approximately 83.4% of NPLs are covered. (Figure 3-20).

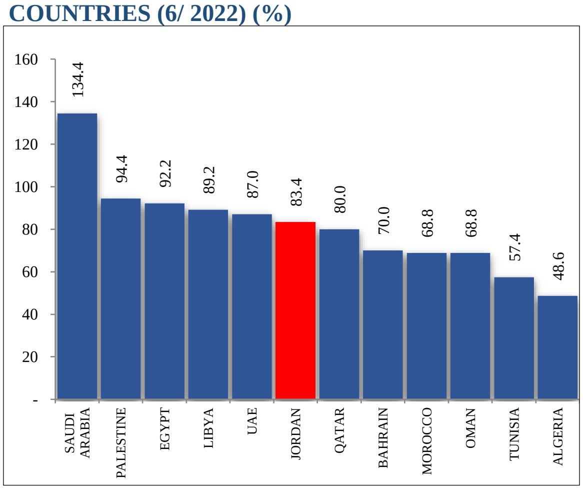
FIGURE 3-20: THE NPLs RATIO AND THE PROVISIONS COVERAGE RATIO OF NPLs (2005-6/2022) (%)



Source: CBJ

The banking system in Jordan ranked almost in the middle of 12 Arab countries in terms of the NPLs coverage ratio. (Figure 3-21).

FIGURE 3-21: THE PROVISIONS COVERAGE RATIO OF NPLS FOR JORDAN AND SELECTED ARAB COUNTRIES (6/ 2022) (%)

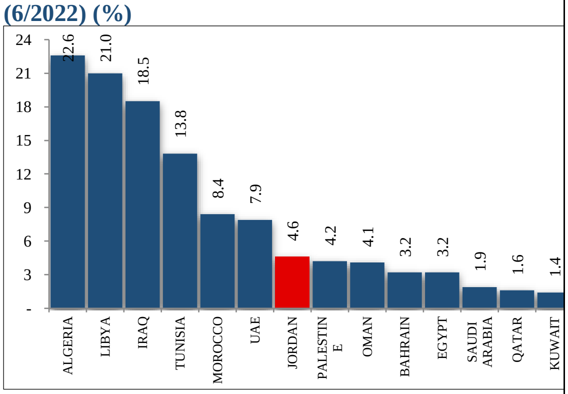


Source: for Jordan's data: CBJ.
Data of other Arab countries: Financial Stability in Arab Countries Report 2021.

The outstanding balance of NPLs (excluding interest in suspense) at the banking system stood at JD 1,421.5 million at the end of 2021; declining modestly by JD 74.5 million, compared to its level in 2020 of JD 1,496 million, and declined further to register JD 1,389 million by the end of June 2022. This is a good indicator of improving quality of banks' assets and their capability to withstand the implications of COVID-19 pandemic.

As compared to selected Arab countries, Jordan ranked in the middle in terms of NPLs ratio to total loans. (Figure 3-22).

FIGURE 3-22: THE NPLs TO TOTAL LOANS FOR JORDAN AND SELECTED ARAB COUNTRIES (6/2022) (%)

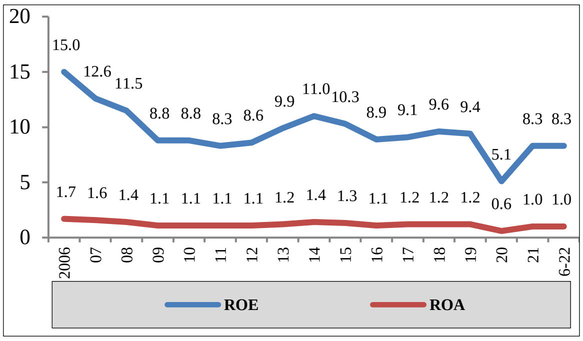


Source: for Jordan's data: CBJ.
Data of other Arab countries: Financial Stability in Arab Countries Report 2021.

3-2-4-3 PROFITABILITY

In 2021, and the first half of 2022, banks profits bounced back to their pre-pandemic levels; banks' net profits after tax reached to JD 550.1 million in 2021, compared to JD 328.2 million in 2020, increasing by JD 221.9 million, or 67.6%. During the first half of 2022, banks' profits maintained the same level recorded during the same period in 2021. Accordingly, the ROA increased to 1.0% in 2021, and in the first half of 2022, compared to 0.6% in 2020. Historically, the ROA of the banking system recorded 1.7% at the end of 2006, and declined gradually to 1.1% at the end of 2009 affected by the implications of the global financial crisis on banks' profits. The ROA maintained that low level until the end of 2012, to increase to 1.2% and 1.4% in 2013 and 2014, respectively, due to the remarkable growth of banks' profits. In 2015 and 2016, banks' ROA declined slightly to 1.3% and 1.1%, respectively, which was attributed mainly to the increase of income tax rate on banks from 30% in 2014 to 35% in 2015. However, banks' ROA increased again at the end of 2019 to reach 1.2%. (Figure 3-23).

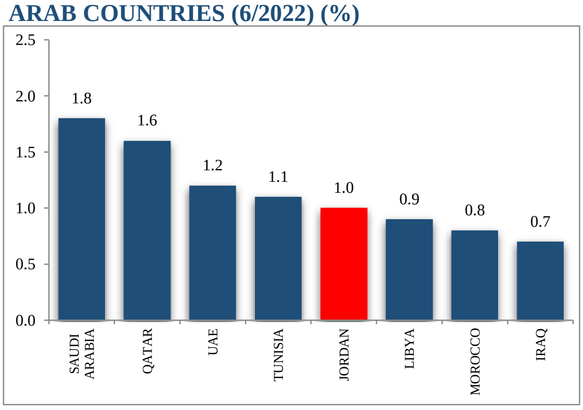
FIGURE 3-23: BANKS' ROE AND ROA (2006-6/2022) (%)



Source: CBJ

The comparison of Jordan to selected Arab countries in terms of banks' ROA, indicates that Jordan ranked almost in the middle among selected Arab countries. Iraq ranked as the lowest ROA of 0.7%, whereas Saudi Arabia ranked the highest with a 1.8% ROA. (Figure 3-24).

FIGURE 3-24: ROA FOR JORDAN AND SELECTED ARAB COUNTRIES (6/2022) (%)

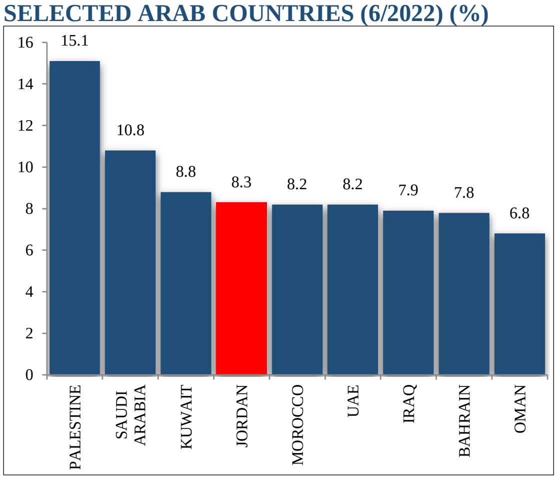


Source: for Jordan's data: CBJ.
Data of other Arab countries: the Financial Stability in Arab Countries Report 2021.

Furthermore, the ROE increased substantially at the end of 2021 and the first half of 2022 to reach 8.3%, compared to 5.1% in 2020, due to the increase in banks' profits supported by the gradual recovery from the ramifications of COVID-19 pandemic. (Figure 3-23).

In comparison with selected Arab countries, Jordan occupied the fourth ranking among 9 Arab countries in terms of the ROE. Oman had the lowest ROE of 6.8%, while Palestine had the highest ratio of 15.1%. (Figure 3-25).

FIGURE 3-25: BANKS' ROE FOR JORDAN AND SELECTED ARAB COUNTRIES (6/2022) (%)



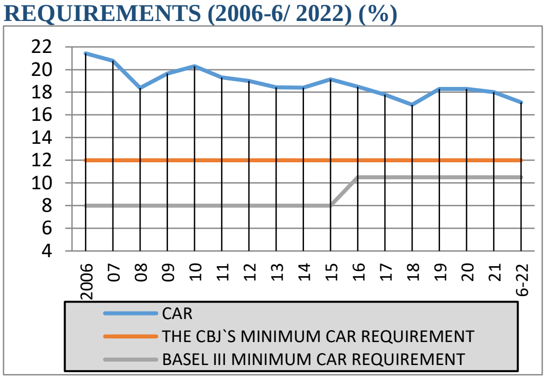
Source: for Jordan's data: CBJ.
Data of other Arab countries: the Financial Stability in Arab Countries Report 2021.

3-2-4-4 CAPITAL ADEQUACY

The CAR of the banking sector in Jordan is high; it ranged from 18% to 21% during the period (2007-2016). It is sufficiently well above the 12% minimum requirement of the CBJ, and the 10.5% minimum requirement of Basel Committee. However, the CAR decreased in 2017 and 2018 to 17.8% and 16.9%, respectively. The CAR's notable decline in 2018 is partially due to the implementation of IFRS (9), which required to build additional provisions for credit losses; these amounts were transferred from shareholders' equity account, in particular retained earnings. At the end of 2019, the CAR increased significantly to reach 18.3%, as the CBJ requested banks to not distribute dividends, which intended to support banks' capital base and enable them to ward off the ramifications of COVID-19 pandemic, as well as to support the national economy. In 2020, the CBJ allowed banks to distribute dividends which shall not exceed 12% of the paid-in capital, provided that banks must achieve profits in 2020. Furthermore, these distributions shall not breach the CAR and liquidity ratios requirements stipulated in the law and the instructions. Limiting the distribution of dividends contributed to enhancing the capital base of banks and to achieving a stable CAR in 2020, which remained stable at its 2019 level of 18.3%. The CAR declined slightly to reach 18% and 17.1%, at the end of 2021 and June 2022, respectively, which is attributed to the notable growth of credit during this period. Nevertheless, the CAR is still well above the minimum requirement of 12%.

Tier I core capital ratio remained stable at 17.5% at the end of 2020, and 2021, and declined modestly to 16.4% at the end of June 2022. It is noteworthy, that the capital of banks in Jordan is mostly composed of tier I core capital; the highest quality component and the most capable to absorb losses (Figure 3-26).

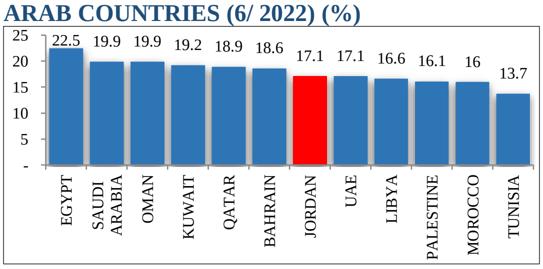
FIGURE 3-26: ACTUAL CAR COMPARED WITH THE CBJ AND BASEL COMMITTEE MINIMUM REQUIREMENTS (2006-6/ 2022) (%)



Source: CBJ

In comparison with selected Arab countries, the CAR in Jordan ranked in the middle among 12 Arab countries with available data. (Figure 3-27).

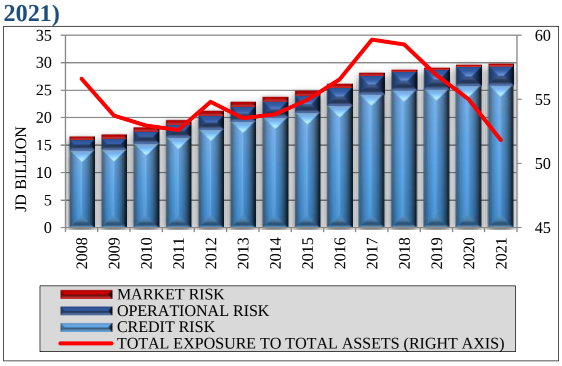
FIGURE 3-27: CAR FOR JORDAN AND SELECTED ARAB COUNTRIES (6/ 2022) (%)



Source: for Jordan's data: CBJ.
Data of other Arab countries: the Financial Stability in Arab Countries Report 2021.

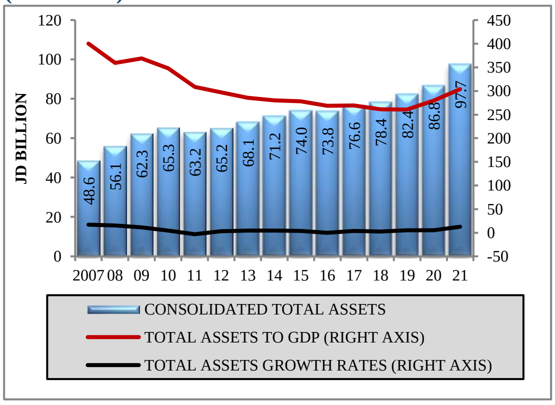
With regard to banks' exposures, the credit risk is the most significant risk forming 86.8% of total risks as of end 2021, followed by operational risks forming around 11.7% of total risk, and the market risks 1.5% of total risk. These figures are close to their levels in 2020, which validates that the risks structure at banks is stable, and no substantial changes occurred. (Figure 3-28).

FIGURE 3-28: THE COMPONENTS OF TOTAL EXPOSURES IN THE BANKING SECTOR (2008-2021)



Source: CBJ

FIGURE 3-29: DEVELOPMENTS OF ASSETS OF BANKS OPERATING IN JORDAN (CONSOLIDATED LEVEL AND AS % OF GDP) (2007-2021)



Source: CBJ

3-2-5 OPERATIONAL EFFICIENCY OF BANKS

The operational efficiency for banks is measured primarily by the Cost (excluding interests) to Income Ratio (CIR). The CIR of banks declined to around 62.2% at the end of 2021, compared to 74.4% at the end of 2020. However, this notable decline is due to the increase in banks' income.

3-3 ASSETS AND LIABILITIES OF CONSOLIDATED BANKING SECTOR IN JORDAN (BRANCHES OPERATING IN JORDAN AND ABROAD AND SUBSIDIARIES)

3-3-1 ASSETS

The number of Jordanian banks operating abroad reached to (8) banks. The Arab Bank's assets abroad constituted around 83.9% of total assets of Jordanian banks operating abroad, and 74% of the Arab Bank's consolidated total assets as of end 2021. The consolidated total assets of banks approximated JD 97.7 billion at the end of 2021, compared to JD 86.8 billion at the end of 2020, increasing by JD 10.9 billion or 12.6%, as consolidated assets, credit, and deposits increased significantly in 2021 compared to 2020. This increase was attributed to the acquisition of Oman Arab bank, which statements was consolidated with the Arab bank group, as the investment has been reclassified from investment in an associate to investment in a subsidiary.

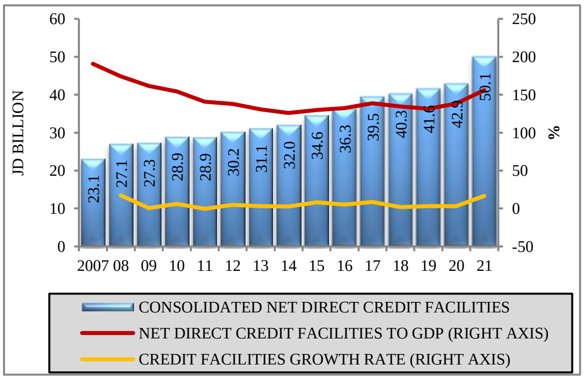
Assets of branches in Jordan accounted for 59.1% of consolidated total assets at the end of 2021, compared to 62.3% at the end of 2020.

The consolidated assets of the banking sector relative to GDP ratio were on a continuous decline during the period (2007-2019), it declined from 400% in 2007 to around 260.7% at the end of 2019. Afterwards, it increased to reach 279.7% and 304% in 2020 and 2021, respectively, as assets grew significantly higher than the GDP which was influenced by the repercussions of COVID-19 pandemic.

3-3-2 CREDIT FACILITIES

The net balance of consolidated credit facilities of the banking sector grew by 16.7% to reach JD 50.1 billion at the end of 2021, compared to JD 42.9 billion at the end of 2020 (a growth of 3.2%). The consolidated credit facilities as percent of GDP reached to 155.8% at the end of 2021, compared to 138.3% at the end of 2020. (Figure 3-30).

FIGURE 3-30: DEVELOPMENTS OF CREDIT FACILITIES OF BANKS OPERATING IN JORDAN (CONSOLIDATED LEVEL AND AS % OF GDP) (2007-2021)



Source: CBJ

3-3-3 DEPOSITS

Consolidated customers' deposits increased to JD 68.3 billion at the end of 2021, growing by 15.1% compared to JD 59.4 billion (a growth of 6.3%) at the end of 2020. (Figure 3-31).

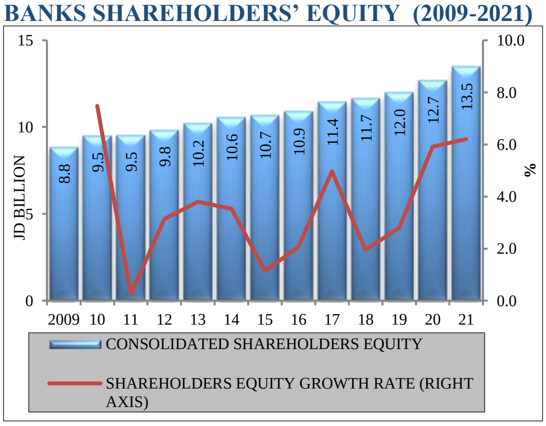
FIGURE 3-31: DEVELOPMENTS OF CONSOLIDATED CUSTOMERS' DEPOSITS AT BANKS (2012-2021)

Source: CBJ

3-3-4 SHAREHOLDERS' EQUITY

The consolidated balance of shareholders' equity for banks totaled JD 13.5 billion at the end of 2021, compared to JD 12.7 billion at the end of 2020. It is worth mentioning that shareholders' equity was trending upward since 2009 (Figure 3-32), which enhances banks' solvency and resilience to withstand risks, and strengthens the stability of the financial sector.

FIGURE 3-32: TRENDS OF CONSOLIDATED BANKS SHAREHOLDERS' EQUITY (2009-2021)



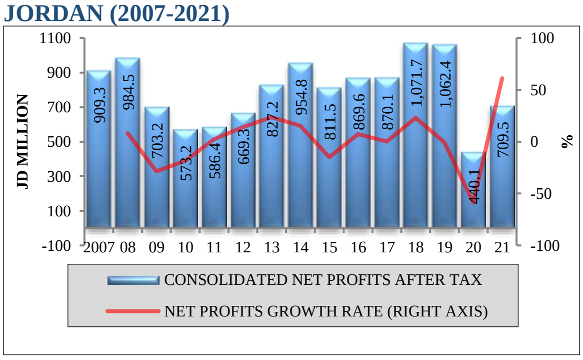
Source: CBJ

3-3-5 NET PROFIT AFTER TAX, ROA, AND ROE

3-3-5-1 NET PROFIT AFTER TAX

Consolidated banks' net profit after tax recorded a substantial increase at the end of 2021, to reach JD 709.5 million, compared to JD 440.1 million at the end of 2020, a growth of 61.2%. This is due to the gradual recovery from the repercussions of COVID-19 pandemic. (Figure 3-33).

FIGURE 3-33: TRENDS OF NET PROFIT AFTER TAX FOR CONSOLIDATED BANKS OPERATING IN JORDAN (2007-2021)



Source: CBJ

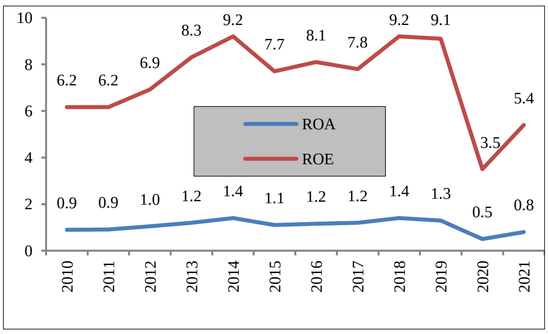
3-3-5-2 ROA

The ROA of consolidated banks increased to stand at 0.8% as of end 2021, compared to 0.5% at the end of 2020. (Figure 3-34).

3-3-5-3 ROE

The ROE of consolidated banks increased at the end of 2021 to reach 5.4%, compared to 3.5% at the end of 2020. (Figure 3-34).

FIGURE 3-34: ROA AND ROE OF CONSOLIDATED BANKS) (2010-2021) (%)



Source: CBJ

3-4 FINANCIAL STABILITY INDEX

3-4-1 INTRODUCTION

As mentioned in previous financial stability reports, the CBJ in 2017 introduced Jordan Financial Stability Index (JFSI) according to countries practices in designing their own indices; countries used different approaches in terms of variables, statistical methods, weights, and other factors. Therefore, the JFSI was developed according to international best practices thereon, yet it was tailored to fit the features of the Jordanian economic and financial system.

The JFSI is a composite of three sub-indices; each index represents a key element of the Jordanian financial system, namely: the banking sector index which constitutes of nine variables, the macroeconomics index which includes seven variables, and the capital market index which consists of two variables. These 18 sub-indices were calculated and analyzed by using historical data for the period (2007-2021).

3-4-2 THE METHODOLOGY

The methodology used to develop the JFSI is one of the most widely used by countries[1] calculating the same index. The JFSI was developed based on international best practices thereupon, and tailored to the features of the financial sector in Jordan, which is dominated by the banking sector. Accordingly, more than half of the indices used to calculate the composite JFSI refer to the banking sector indicators. A synopsis of the methodology used to calculate the JFSI is set out below.

Data Normalization:

The re-scaling methodology was used to re-measure the sub-indices, by subtracting the minimum value of the sub-index from the value of the index and then divide the output by the range of the sub-index according to the formula (1) below.

$$di = \frac{Ai-min}{Max-min} \ldots\ldots\ldots\ldots\ldots\ldots (1)$$

Where min[2] and Max represent the minimum and maximum values of the di sub-index.

Calculation of sub-indices:

The sub-index is calculated by using the weighted average of normalized indices, and determining the weights based on the relative importance of indices. Several methods are available for selecting the weights of indices; however, the best-used one is to rely on the professionals and experts' opinions, as weights are estimated according to the significance of the sub-index and its impact on the financial stability in the Kingdom. Subsequently, the following weights were allocated to the banking sector indices:

Variable	Weight
CAR	28.3%
Quality of Assets	28.3%
Liquidity	28.3%
Profitability	15%
Total	100%

The sub-indices of the banking sector, macroeconomics, and the capital market were calculated using the following formulas:

Banking Sector Index (weighted average of sub-indices):

$$Bsi = \frac{\sum_1^9 W_b d_b}{9} \ldots\ldots\ldots\ldots\ldots\ldots (2)$$

Macroeconomics Index:

$$Esi = \frac{\sum_1^7 d_E}{7} \ldots\ldots\ldots\ldots\ldots\ldots (3)$$

Capital Market Index:

$$Msi = \frac{\sum_1^2 d_M}{2} \ldots\ldots\ldots\ldots\ldots\ldots (4)$$

Calculating the Composite Financial Stability Index:

Using the weighted average of the three sub-indices, the JFSI is calculated using the following formula:

JFSI= ((9/18)*Bsi) + ((7/18)*Esi) + ((2/18)*Msi)).… (5)

The JFSI's value ranges from zero to 1.

3-4-3 THE JFSI RESULTS

The JFSI value ranges from zero to one, the closer the value to one, the greater the stability of the financial system. The JFSI value was 0.64 at the end of 2007, and dropped to 0.5 by the end of 2008 due to the global financial crisis. It increased to 0.64 at the end of 2009 to fall again during the period (2010-2012) with the lowest value recorded at the end of 2012 of 0.36, influenced by the Arab Spring and the refugees' crisis as well as the challenging economic conditions that hit the Kingdom, especially in 2012. The JFSI started to recover and reached 0.57 by the end of 2015, and declined during the years (2016-2018) to reach 0.46 in 2018. However, in 2019, the JFSI improved compared to the period (2016- 2018[3]) to record 0.55, supported by improved liquidity ratios, CARs, and the financial leverage ratio of banks operating in Jordan, as well as the increase in the CBJ's foreign reserves and gold. In 2020, the COVID-19 pandemic substantially affected the economic and financial conditions in the Kingdom; the JFSI declined to reach 0.44. However, in 2021, it increased to 0.47 due to the increase of the BSI from (0.36) in 2020 to (0.52) in 2021, supported by the remarkable

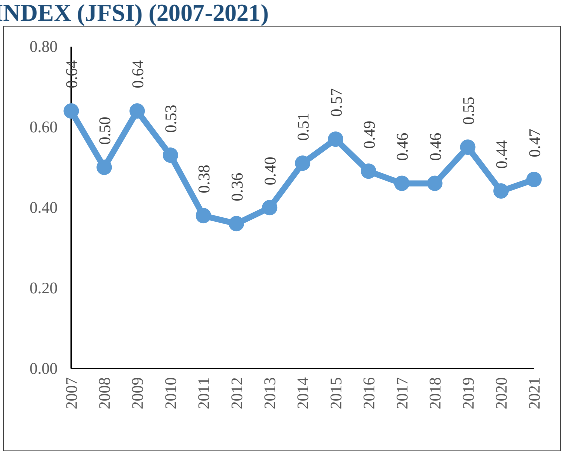
[1] Banking Stability Index: A Cross-Country Study.

[2] The minimum value is determined according to the minimum values stipulated in respective regulations in force rather than the minimum values mentioned in the study.

[3] One of the main drawbacks of the FSI, which was recognized by most countries using such index, is its high sensitivity to any changes in the values of the sub-indices included in the calculation, regardless how small these changes were.

improvement in most financial indicators for banks in 2021, and the gradual recovery from the implications of COVID-19 pandemic, (Figure 3-35).

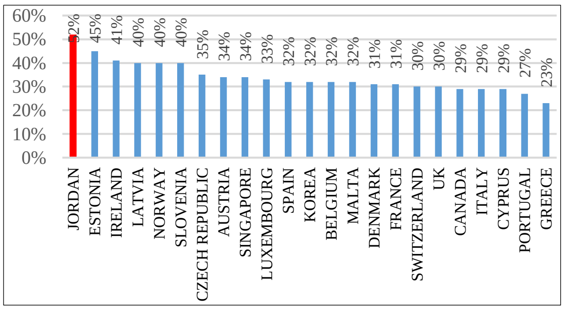
FIGURE 3-35: JORDAN FINANCIAL STABILITY INDEX (JFSI) (2007-2021)



Source: CBJ

As compared to 23 countries using similar indices, Jordan ranked first in terms of the BSI, as indicated in (Figure 3-36). This ensures that the banking sector in Jordan is highly stable.

FIGURE 3-36: THE BSI IN JORDAN COMPARED TO SELECTED COUNTRIES



3-5 DEVELOPMENTS OF NON-BANKING FINANCIAL SECTOR (NON-BANKING FINANCIAL INSTITUTIONS)

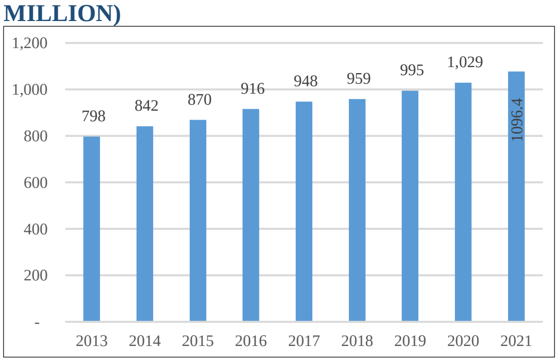
3-5-1 THE INSURANCE SECTOR

The insurance sector is a vital component of the financial sector. It protects individuals and properties against risks, in addition to attracting and investing national savings to support economic development. The contribution of insurance premiums to GDP reached around 2% in 2021. Given the importance of this sector in strengthening financial stability, the Cabinet on 24/02/2016 entitled the CBJ to supervise the insurance sector according to international practices of regulatory authorities. To this end, the CBJ in cooperation with the Ministry of Industry, Trade, and Supply drafted the insurance regulatory law of 2019, which was passed by the Parliament in March 2020. The Insurance Regulatory Law No. (12) of 2021 was enacted by a Royal decree, and published in the Gazette on 16/05/2021. The provisions of this Law apply to insurance companies, reinsurance companies, insurance services providers, and all relevant parties involved in regulating and supervising the insurance sector. This is to protect the rights of the insured and beneficiaries, as well as to ensure the soundness of the financial positions of insurance companies and reinsurance companies. The Law reflects the CBJ's vision and endeavor to strengthen the regulatory and supervisory frameworks of the insurance business, in accordance with international standards and best practices, which are in the context of the CBJ's dedication to enhance the stability and the soundness of the insurance sector to enable it to achieve its envisioned role in the economy.

The Insurance sector consists of (23) licensed insurance companies operating in Jordan; one company is licensed to provide life insurance; (7) companies are licensed to practice general insurance business; while (15) companies are licensed to carry out both types of insurance (general insurance and life insurance), two of which are providing Takaful insurance, and are licensed to practice life and general insurance. In addition, the insurance sector includes (848) insurance services providers, including insurance agents and brokers, reinsurance brokers, loss settlement specialists, inspectors, authorized delegates to subscribe, actuarists, insurance consultants, insurance business management companies, banks licensed to practice insurance business, and reinsurance brokers residing abroad.

Total assets of insurance companies in the Kingdom totaled JD 1,096.4 million at the end of 2021, compared to JD 1,029.3 million at the end of 2020; growing by 6.5% (Figure 3-37).

FIGURE 3-37: DEVELOPMENTS OF INSURANCE COMPANIES' TOTAL ASSETS (2013-2021) (JD MILLION)

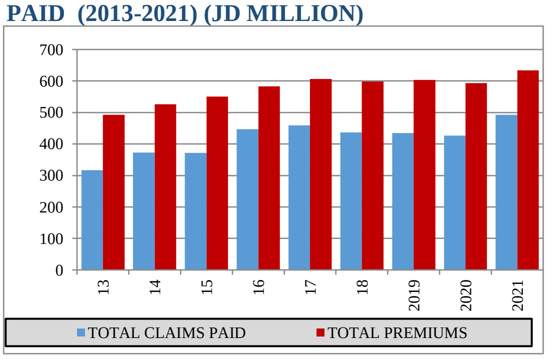


Source: CBJ.

3-5-1-1 THE INSURANCE SECTOR MAIN INDICATORS[4]

Total insurance premiums increased by 7.8% in 2021, to reach JD 639.9 million, compared to JD 593.4 million in 2020. In addition, total claims paid increased by 16.7% to reach JD 498.3 million in 2021, compared to JD 426.9 million in 2020 (Figure 3-38).

FIGURE 3-38: DEVELOPMENTS OF TOTAL INSURANCE PREMIUMS AND TOTAL CLAIMS PAID (2013-2021) (JD MILLION)



Source: CBJ

The financial results of the insurance companies revealed that total investments reached to JD 629.7 million in 2021, up from JD 590.4 million in 2020. Meanwhile, paid in capital declined from JD 272.8 million in 2020, to JD 256.6 million as of end 2021 (Table 3-1). The net profit after tax for insurance companies stood at JD 13 million in 2021, compared to JD 22 million in 2020, declining approximately by 40.9%.

TABLE 3-1: FINANCIAL RESULTS OF INSURANCE COMPANIES (2014-2021) (JD MILLION)

Item	2014	2015	2016	2017	2018	2019	2020	2021*
Total Investments	534.4	533.6	543.5	569	563.4	576.1	590.4	629.7
Total assets	842.2	869.7	915.6	948	959	995.1	1,029.3	1,096.4
Shareholders' equity	332.8	330.7	343.7	335	317.9	327.1	336.4	349
Total written premiums in Jordan	525.8	550.4	582.9	606.8	597.9	603.3	593.4	639.9
Total claims paid in Jordan	372.9	371.8	447	459	436.5	434.7	426.9	498.3
Paid in capital	268	269	267	265	266.4	271.3	272.8	256.6

Source: CBJ.
*Preliminary data that might be changed

3-5-2 NON-BANKING FINANCIAL INSTITUTIONS

Non-banking financial institutions are essential to the economy, as they provide credit to vulnerable segments facing difficulties to access banks. The following section elaborates on these institutions.

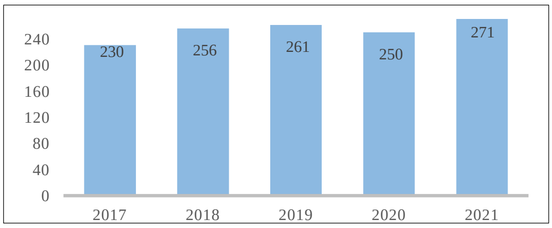
3-5-2-1 MICROFINANCE SECTOR

The microfinance sector in Jordan started its business in 1994, and expanded rapidly during the last years. Microfinance loans portfolio recorded a steady growth rate during the period (2017-2019) that averaged 7.1%. In 2020, it declined by 4.3%, due to the ramifications of COVID-19 pandemic, yet it increased again by 8.4% in 2021. (Figure 3-39).

Total MFIs loans portfolio reached to JD 271 million at the end of 2021, compared to around JD 250 million at the end of 2020. The number of borrowers decreased by 4.7% to reach 411 thousand borrowers at the end of 2021, compared to 431 thousand borrowers at the end of 2020. In addition, the average value of loans increased from JD 713 at the end of 2020, to JD 847 at the end of 2021, an increase of 18.8%.

[4] Preliminary data

FIGURE 3-39: DEVELOPMENTS OF MFIs LOANS PORTFOLIO (2017-2021) (JD MILLION)



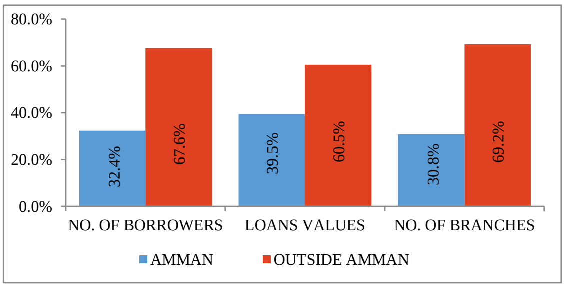
Source: CBJ.

The MFIs generally target women; to empower them and enhance their contribution to the economy and society. However, the MFIs services also focus on borrowers outside Amman to achieve economic and social development throughout the Kingdom as follows:

3-5-2-2 THE MICROFINANCE SECTOR ACTIVITIES OUTSIDE AMMAN

The microfinance sector activities are concentrated outside Amman, as 67.6% of borrowers, 60.5% of total value of loans, and 69.2% of MFIs branches and marketing offices are located outside Amman (figure 3-40).

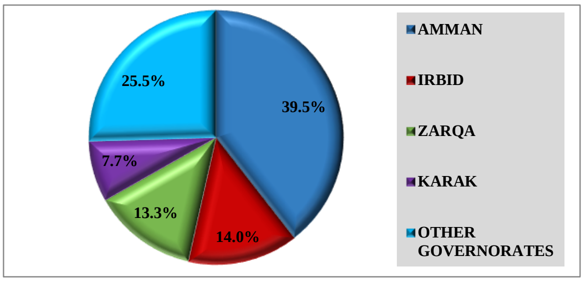
FIGURE 3-40: THE MICROFINANCE SECTOR ACTIVITY INSIDE AND OUTSIDE AMMAN IN 2021 (%)



Source: CBJ.

The distribution of MFIs Loans according to governorates in 2021 (figure 3-41), revealed that Amman received 39.5% of these loans, followed by Irbid 14%, Zarqa 13.3%, Karak 7.7%, while other governorates received 25.5% of total loans.

FIGURE 3-41: DISTRIBUTION OF MFIs LOANS ACCORDING TO GOVERNORATE IN 2021 (%)



Source: CBJ.

3-5-2-3 FINANCIAL LEASING COMPANIES[5]

Total assets of financial leasing companies which are subsidiaries of banks in Jordan totaled JD 620.6 million at the end of 2021, compared to JD 649.4 million at the end of 2020; a decline of 4.4%. Further, shareholders' equity decreased from JD 333 million in 2020, to JD 322.3 million in 2021. The financial results of financial leasing companies, indicated that net profits after tax increased by 40% to reach JD 18.9 million in 2021, compared to JD 13.5 million in 2020. Subsequently, the ROE increased from 4.1% in 2020, to 5.9% in 2021, and the ROA increased from 2.1% in 2020, to 3.04% in 2021. (Table 3-2).

TABLE 3-2: DEVELOPMENTS OF FINANCIAL LEASING COMPANIES (2016- 2021) (JD MILLION)

Item	2016	2017	2018	2019	2020	2021
Revenues	32.3	37.7	43.3	53.2	51.5	47.2
Paid-In Capital	121	142.5	175	210	212.5	195
Total Assets	401.6	499.7	582	604.6	649.4	620.6
Shareholders' Equity	227.8	251.8	309	323	333	322.3
Profit After tax	17.3	17.6	17.7	21.8	13.5	18.9
ROE (%)	8%	7.3%	6.8%	6.9%	4.1%	5.90%
ROA (%)	4.8%	3.9%	3.5%	3.7%	2.1%	3.04%

Source: annual statements of financial position for financial leasing companies (subsidiaries of banks).

3-5-2-4 THE EXCHANGE SECTOR

The number of licensed exchange companies in the Kingdom stood at 279; 117 headquarters and

5 The data covers (8) financial leasing companies, which are subsidiaries of banks, and dominate the financial leasing activity in Jordan. However, the financial leasing transactions provided by Islamic banks are not included in calculations.

162 branches located in governorates all over Jordan (Table 3-3).

TABLE 3-3: NO. OF EXCHANGE COMPANIES AND BRANCHES IN JORDAN

Governorate	No. of Companies	No. of Branches	Total
Amman	70	104	174
Zarqa	11	15	26
Irbid	6	22	28
Aqaba	4	4	8
Other Governorates	26	16	42
Total	117	162	279

Source: CBJ.

In light of the developments in the exchange sector and the notable growth in its business during the last two decades, which made it one of the most vital sectors in the Kingdom, and to respond to economic updates and developments, the Money Exchange Business Law No. 44 of 2015 was enacted on 18/10/2015, and superseded the law No. 26 of 1992.

This Law constitutes the legislative framework that governs the exchange business in the Kingdom, through setting the conditions and requirements for licensing, merging, liquidation, and management of exchange companies, and the records and documents that must be retained by these companies, as well as validating the role of the chartered accountant in auditing the exchange companies' business, in terms of expanding the scope of the auditor's functions according to best practices. The Law also contributed to establishing the legal basis for informing exchange companies about any decisions or instructions issued by the CBJ, and strengthened the CBJ's authority to enact the instructions for the acceptable ratios and limits for sound financial positions of the exchange companies, and the size of non-Jordanian workforce. The Law lays down the legal basis for the formulation of an ad hoc committee dedicated to handle complaints submitted to the CBJ against the exchange companies' services.

The CBJ conducts on-site and off-site supervision on the exchange sector. The off-site supervision mainly involves examining and analyzing periodic statistical data and audited financial statements of exchange companies, and draws appropriate recommendations thereon. On the other hand, the on-site supervision, which is carried out through on-site inspection visits, verifies the compliance of the exchange companies with all relevant laws and regulations in force, which adds to the work of the external auditors of the exchange companies as stipulated in the provisions of the Law.

As for the financial results of the exchange sector in 2021, total assets (business size) increased slightly to record JD 161.9 million, compared to JD 161.7 million in 2020. The ROA and return on capital increased in 2021 to reach 2.34% and 3.96% respectively, compared to negative rates of -2.35%, and -3.97% in 2020. This remarkable increase in profits ratios of exchange companies is attributed to the increase in their profits aftermath the gradual recovery from the implications of the COVID-19 pandemic on this sector and other economic sectors. (Table 3-4).

TABLE 3-4: LEADING INDICATORS OF THE EXCHANGE SECTOR IN 2021

Indicator	JD Million
Total Business size*	161.9
Total Capital	98.3
Total Financial guarantees offered	33.8
Total Purchases of foreign currency	6905
Total Sales of foreign currency	6922
Return on capital*	3.96%
ROA*	2.34%

*Preliminary data and might be changed, Source: CBJ

3-5-3 SOCIAL SECURITY CORPORATION[6] (SSC)

The Social Security Corporation (SSC) plays a pivotal role in the society; the social security umbrella covers 61,822 active firms, of which 62% are based inside Amman as indicated in the SSC annual report of 2020. The SSC umbrella extended to cover 1.3 million insured persons working in more than 81 thousand active enterprises in the public and private sectors. The umbrella also expanded to cover the voluntary participation of Jordanians, which reached to 72 thousand subscribers. The ratio of workers insured in the SSC to total workers in the Kingdom reached 77%, thanks to the SSC's efforts represented by issuing the regulations intended to cover freelancers on 29/8/2019, which entered into force on 1/1/2020.

In addition to its fundamental role in the society, the SSC significantly contributes to achieving the financial stability through its massive investments portfolio diversified in financial and non-financial assets, as well as its effective lending to the government through treasury bills and bonds. The main features of the SSC are listed below:

- The SSC has a massive investment capacity with a long-term investment horizon, as it invests to raise funds for retirement claims of individuals at different ages, which enables the SSC to undertake investments at different maturities, and helps to diversify the risk premiums for various maturities. This policy is particularly important during financial crises when market suffers shortages of liquidity. The SSC's investments accounted for 38.4% of GDP at the end of 2021, compared to 36% at the end of 2020.
- The SSC carries out self-financing investments, as the subscribers' deductions constitute the source of funds rather than borrowings or deposits (such as banks). Therefore, the SSC is not exposed to high leverage ratio, nor risks of maturity mismatch of sources and uses of funds. These two factors led several international banks to fail during the last global financial crisis in 2008, which validates that the SCC is not a possible source of systemic risk in the financial system.
- Unlike deposits at banks, the deductions of workers and employers are retained for a long period, and cannot be withdrawn, thus, they are not exposed to liquidity runs.

The SSC's role during the COVID-19 crisis was crucial; the SSC assumed a clear and determined approach to respond to the crisis, which consisted of two pillars: the first represents the corporation's dedication towards its responsibilities as a cornerstone to provide the social protection for workers in the Kingdom, while the second is the provision of liquidity to the private sector enterprises and assisting them to ward off the ramifications of the pandemic. The SSC also embarked several intervention programs enacted through defense orders and announcements thereof. These programs resulted in JD 205 million direct support to individuals and companies, in addition to the indirect contribution, which provided a JD 153 million liquidity to the private sector enterprises.

Building on the SSC's importance in stimulating investments, and in order to boost its funds, the Social Security Investment Fund (SSIF) was founded and started its business at the beginning of 2003. The SSIF assumes investing the SSC's funds, aiming to realize high and constant returns, preserving the real value of the SSC assets, as well as providing the sufficient liquidity to meet the SSC's obligations. The SSIF's assets reached to JD 12.3 billion at the end of 2021, compared to JD 11.2 billion at the end of 2020, increasing by 9.8%. In addition, the SSIF's income increased

[6] Despite the SSC is not considered as a non-banking financial institution; financial stability reports in most countries include it with non-banking financial institutions, as they are essential to achieve financial stability through their diversified investments in financial and non-financial assets.

by JD 84.9 million, or 16.7% to reach JD 593.5 million at the end of 2021, compared to JD 508.6 million at the end of 2020. The SSIF's investment portfolios consist of seven major portfolios. (Table 3-5).

TABLE 3-5: DISTRIBUTION OF THE SSIF PORTFOLIOS (2020-2021) (JD MILLION)

Investment Portfolios	2020	2021
Money Market Instruments Portfolio	1,434	1,558.4
Bonds portfolio	6,410	6,893.6
Loans portfolio	396	412.1
Equity portfolio	1,555	2,040.8
Real estate portfolio	717	748.2
Tourism portfolio	292	314.3
Other assets	363	373.8
Total	11,167.7	12,341.2

Source: SSIF

The SSIF's investments are diversified in different economic aspects. The SSIF is the second largest buyer (banks are the first) of government treasury bills and bonds, and government-guaranteed bonds which are allocated to the money market instruments portfolio (mature in less than one year), and the bonds portfolio (mature in more than one year). Moreover, the SSIF loans portfolio consists of medium- and long-term loans including direct loans and syndicated loans. The equity portfolio consists of stocks of public companies listed in ASE, as well as the stocks of the strategic private placements companies, according to the SSIF's investment policy. The real estate portfolio includes all real estate investments in lands, commercial buildings, and real estate development, while the tourism portfolio constitutes of all investments in the tourism sector. The allocation of the SSIF's investments among these portfolios aims to diversify the investments, and to reduce risks, according to specified investment considerations.

It is worth mentioning that the SSC is a strategic shareholder in the capital of several banks in Jordan. The total contribution of the SSC in Jordanian banks' capital approached JD 958.3 million at the end of 2021, accounting for 12.5% of the market value of banks' shares in Jordan (Table 3-6).

TABLE 3-6: THE SSC CONTRIBUTIONS IN JORDANIAN BANKS CAPITAL AS OF END 2021 (JD MILLION) (%)

Bank	Contribution (JD Million)	Share (%)
Jordan Kuwait Bank	42.9	21.04%
Jordan Commercial Bank	24.5	19.84%
Arab Bank PLC.	538.4	17.18%
Housing Bank for Trade & Finance	179.7	15.42%
Jordan Ahli Bank PLC	19.9	10.25%
Capital Bank	38.4	9.46%
Safwa Bank	17.9	9.38%
Cairo Amman Bank	21.3	8.07%
Bank al Etihad	23.9	8.53%
Jordan Islamic Bank	40.5	5.82%
Arab Jordan Investment Bank	8.6	4.08%
ABC Bank	2.0	2.05%
Bank of Jordan	0.1	0.01%
Total	958.3	12.5%

Source: SSIF

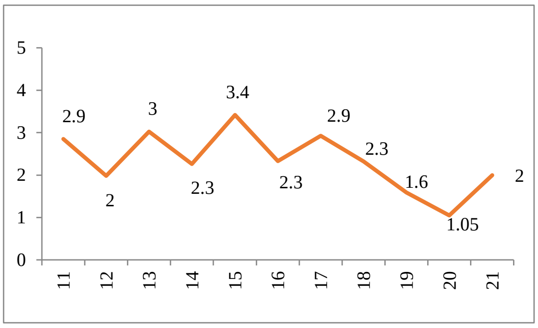
3-5-4 AMMAN STOCK EXCHANGE (ASE)

The ASE performance improved markedly, as the ASE indicators recorded positive figures not seen since 2005. They improved significantly in 2021, compared to 2020, supported by the gradual recovery from the repercussions of COVID-19 pandemic; the trading volume increased by 87.2%, while the free float share price index (ASE100) increased by 27.8%. Meanwhile, market capitalization of listed shares increased by JD 2,587.9 million, or 20%, to reach JD 15,495.7 million, which is equivalent to 49.9% of GDP. The ASE's key performance indicators in 2021 are summarized next.

The trading volume increased by JD 914.8 million to reach JD 1,963.6 million in 2021 (figure 3-42), driven by the following factors:

1. The increase of the trading volume in the industrial sector by JD 312.2 million.
2. The increase of the trading volume in the financial sector by JD 328.8 million.
3. The increase of the trading volume in the services sector by JD 273.7 million.

FIGURE 3-42: TRADING VOLUME IN ASE (2011-2021) (JD BILLION)



Source: ASE

The number of shares traded increased by 395.5 million shares to reach 1,538.2 million shares, against 1,142.7 million shares traded in 2020. In addition, the number of executed contracts increased to 818.3 thousand contracts at the end of 2021, up from around 421 thousand contracts at the end of 2020. As for shares traded by sector, the financial sector accounted for 50.2% of the trading volume in 2021, followed by the industrial sector 25.1%, and the services sector 24.7%. (Table 3-7).

TABLE 3-7: RELATIVE IMPORTANCE OF TRADING VOLUME BY SECTOR (2012-2021) (%)

Sector	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021
Industrial	19.5	13.1	16.7	10.1	30.2	22.4	42.2	18.2	17.4	25.1
Services	20.4	13.5	16.5	21.2	18.2	12.8	9.8	16.2	20	24.7
Financial	60.1	73.4	66.8	68.7	51.6	64.8	48	65.6	62.6	50.2

Source: ASE

With regard to the transactions of non-Jordanian investors in ASE, they purchased around JD 220.2 million shares in 2021, and sold JD 281.1 million shares (Table 3-8).

TABLE 3-8: PURCHASES AND SALES OF SHARES BY NON-JORDANIAN INVESTORS IN ASE (2014-2021) (JD MILLION)

	2014	2015	2016	2017	2018	2019	2020	2021
Total Purchases	362.7	981.7	666.5	994.9	1231.8	528.7	96.8	220.2
Arabs	262.1	894.3	520.3	638.7	214.4	147.5	75.7	194.5
Foreigners	100.6	87.4	146.2	356.3	1,017.4	381.2	21.1	25.8
Total Selling	384.8	971.1	429.4	1329.2	747.3	414.6	164.4	281.1
Arabs	247.8	873.5	304.1	1177.6	177.1	374.8	94.1	186
Foreigners	137	97.6	125.3	151.6	570.2	39.8	70.3	95.1
Net Investment	-22.2	10.6	237.1	-334.3	484.5	114.1	-67.5	-60.9
Arabs	14.3	20.7	216.2	-538.9	37.3	227.3-	-18.4	8.5
Foreigners	-36.5	-10.1	20.9	204.7	447.2	341.4	-49.1	-69.3

Source: ASE

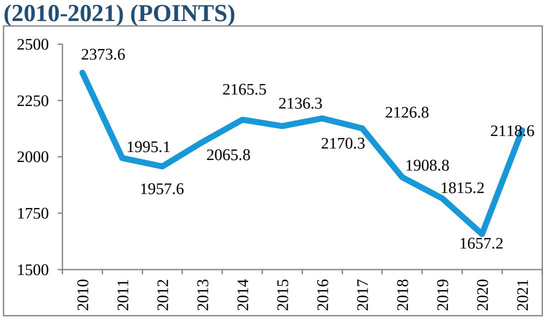
3-5-4-1 THE FREE FLOAT WEIGHTED SHARE PRICE INDEX

The free float weighted share price index (ASE100) increased to reach 2,118.6 points at the end of 2021, compared to 1,657.2 points at the end of 2020; increasing by 27.8%. The ASE20 increased to reach 1,074.4 points at the end of 2021, compared to 806.5 points at the end of 2020.

3-5-4-2 THE MARKET CAPITALIZATION WEIGHTED SHARE PRICE INDEX

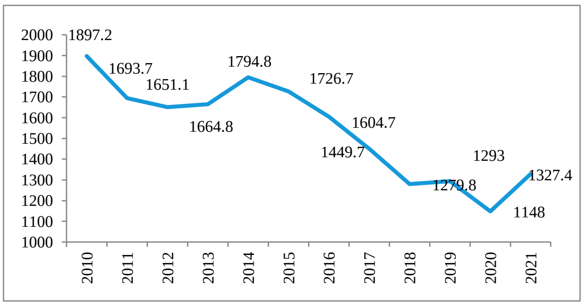
The market capitalization weighted share price index increased by 955.7 points in 2021, compared to its level recorded in the previous year to reach 4,005.3 points, compared to declining by 464.2 points in 2020. This increase is due to the increase in the indices of banks, financial companies, and services companies.

FIGURE 3-43: FREE FLOAT MARKET CAPITALIZATION WEIGHTED SHARE PRICE INDEX (CLOSING PRICE OF DECEMBER 1999=1000) (2010-2021) (POINTS)



Source: ASE

FIGURE 3-44: FREE FLOAT MARKET CAPITALIZATION WEIGHTED SHARE PRICE INDEX OF THE SERVICES SECTOR (CLOSING PRICE OF DECEMBER 1999=1000) (2010-2021) (POINTS)



Source: ASE

FIGURE 3-45: FREE FLOAT MARKET CAPITALIZATION WEIGHTED SHARE PRICE INDEX OF THE INDUSTRIAL SECTOR (CLOSING PRICE OF DECEMBER 1999=1000) (2010-2021) (POINTS)

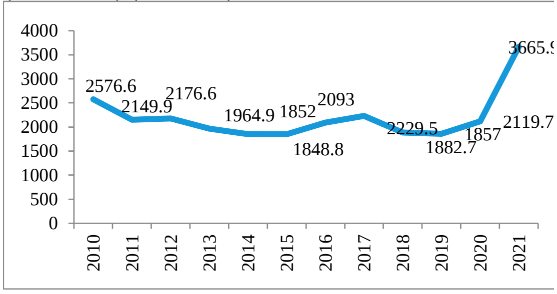
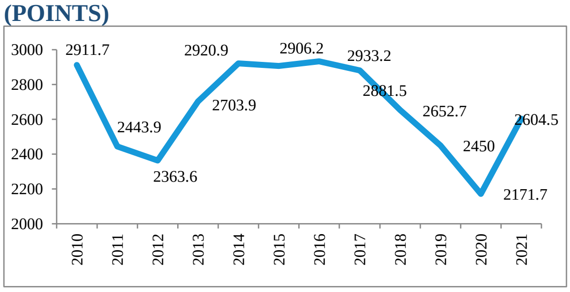


FIGURE 3-46: FREE FLOAT MARKET CAPITALIZATION WEIGHTED SHARE PRICE INDEX OF THE FINANCIAL SECTOR (CLOSING PRICE OF DECEMBER 1999=1000) (2010-2021) (POINTS)



Source: ASE

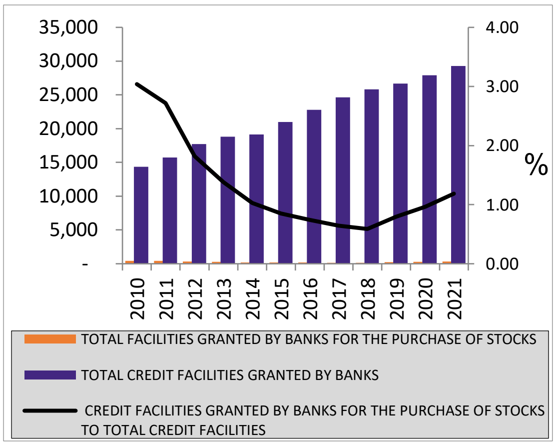
3-5-5 BANKS' EXPOSURE TO STOCK MARKETS RISKS

Capital markets are essential to stimulate the economy's impetus, as they attract foreign investments, promote national savings, and provide financing sources for economic projects, which ultimately serve the national economy. As capital markets are crucial, risks facing these markets captured an increasing attention, especially after the global financial crisis of 2007, through monitoring stock prices bubbles and assessing risks in stock markets, as well as the exposure of banks to these risks. Regarding the exposure of banks to stock market risks in Jordan, it could evolve from credit facilities extended by banks to finance the purchase of shares or through investments of banks in shares. Banks' exposure to these risks is analyzed below:

3-5-5-1 CREDIT FACILITIES EXTENDED BY BANKS FOR PURCHASING SHARES

Credit facilities extended to finance the purchase of shares constitute a minimal percentage of total credit facilities extended by licensed banks. They reached to JD 346.8 million at the end of 2021, accounting for 1.2% of total credit facilities, compared to JD 268.7 million at the end of 2020, an increase of 29.1%. (Figure 3-47).

FIGURE 3-47: CREDIT FACILITIES EXTENDED BY BANKS FOR PURCHASING SHARES & TOTAL CREDIT FACILITIES (2010-2021) (JD MILLION)

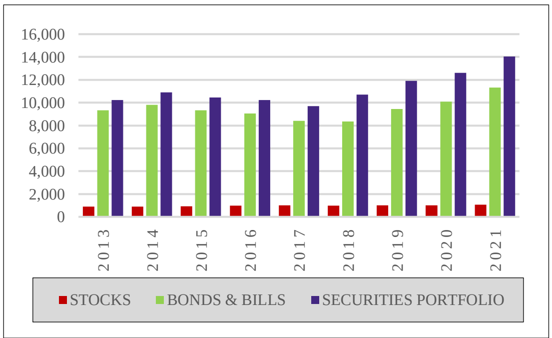


Source: CBJ

3-5-5-2 BANKS' INVESTMENTS IN SHARES

The securities portfolio of banks in Jordan reached around JD 14,039.4 million at the end of 2021, compared to JD 12,610 million at the end of 2020, increasing by 11.3%. Banks' investments in shares accounted for 8% of total investments in securities at the end of 2021, which is the same level recorded in 2020; they are much lower than investments in bonds (mostly government bonds) which capture the largest share of banks' investments in securities. Banks' investments in shares are relatively low due to the restrictions imposed by the Banking Law and the CBJ's instructions on these investments, which are intended to lower market risk for banks and maintain the financial stability in the kingdom. Figure (3-48)

FIGURE 3-48: SECURITIES PORTFOLIO AT BANKS (2013-2021) (JD MILLION)



Source: CBJ

CHAPTER FOUR: DEVELOPMENTS AND RISKS OF THE NON-FINANCIAL SECTOR

4-1 HOUSEHOLD SECTOR

4-1-1 EXPOSURE OF BANKS TO THE HOUSEHOLD SECTOR

In the context of the CBJ's monitoring to the household indebtedness to banks, the next section illustrates the major developments of household debt and related ratios thereto.

4-1-2 THE HOUSEHOLD INDEBTEDNESS TO BANKS

Table (4-1) illustrates the household indebtedness to banks during the period (2017-2021); it reached to JD 11.8 billion at the end of 2021, up from JD 10.9 billion at the end of 2020, increasing by 8.6%. A large part of the increase in 2020 and 2021 does not reflect an actual growth, rather, it resulted from banks postponement of loans repayments due on clients impacted by the COVID-19 pandemic.

TABLE 4-1: HOUSEHOLD INDEBTEDNESS TO BANKS (2017-2021) (JD MILLION)

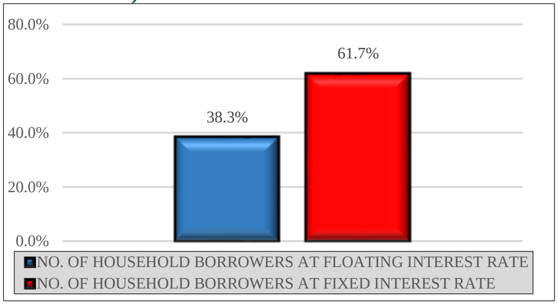
Indebtedness	2017	2018	2019	2020	2021
The Banking Sector (JD Million)	9,452.5	9,801.3	10,167	10,902.1	11,839.6
Growth (YOY) (%)	8.2	3.7	3.7	7.2	8.6

The number of household borrowers from banks at the end of 2021 stood at 1.22 million borrowers, compared to 1.17 million borrowers at the end of 2020, increasing by 50 thousand borrowers (4.3%).

With regard to the classification of borrowers according to gender, male borrowers reached to around 992 thousand borrowers at the end of 2021, accounting for 81.6% of total household borrowers. The female borrowers accounted for 18.4% of total borrowers, to reach 224 thousand borrowers.

On another front, classifying households' loans according to the interest rate type indicates that 763 thousand borrowers obtained fixed interest rate loans, accounting for 61.7% of total household borrowers, while 473 thousand borrowers obtained loans with floating interest rates, accounting for 38.3% of total borrowers. (Figure 4-1).

FIGURE 4-1: DISTRIBUTION OF BORROWERS ACCCORDING TO THE INTERST RATE (FIXED/ FLOATING) FOR 2021



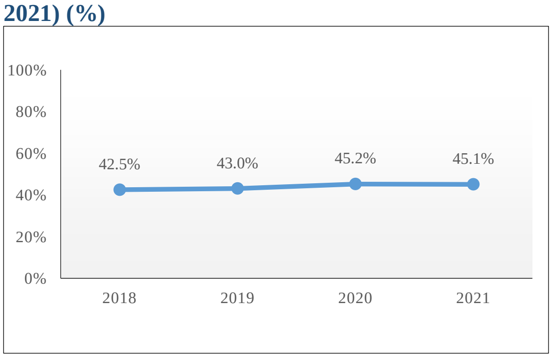
4-1-3 HOUSEHOLD DEBT BURDEN RATIO

The Debt Burden Ratio (DBR), which is measured by the monthly installments and interest payments paid by borrowers relative to their regular monthly income, is one of the key ratios to measure the risks of household indebtedness for banks and for individuals themselves. High DBR imposes negative effects on the financial and economic stability, as it dampens individuals' capability to repay their loans, which increases the default rates at banks, as well as their ability to spend and consume, which adversely affects economic growth.

Figure (4-2) displays the average DBR for households in Jordan during the period (2018-2021). The average DBR declined slightly to reach 45.1% at the end of 2021, compared to 45.2% at the end of 2020, which is slightly higher than the 42.5% and 43%, recorded in 2018 and 2019, respectively, as households' income declined due to the repercussions of COVID-19 pandemic. Despite the increase of the average DBR in 2020 and 2021, it is still acceptable according to international standards, as the average DBR in most countries ranges between (40%-50%).

The actual average DBR for households is less than 50% in 14 banks, while it exceeds 50% in three banks.

FIGURE 4-2: AVERAGE HOUSEHOLD DBR (2018-2021) (%)



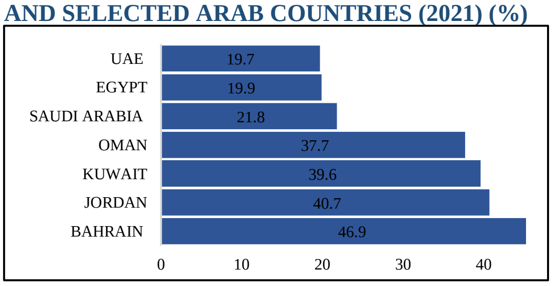
Source: CBJ

The NPLs for the households' loans portfolio declined from 4.9% at the end of 2020, to record 4.1% as of end 2021, and 4% at the end of June 2022, which is a positive sign to strengthen the financial stability in the Kingdom.

4-1-4 HOUSEHOLD INDEBTEDNESS IN SELECTED ARAB COUNTRIES

As the data are limited, the household indebtedness in selected Arab countries were measured by using the ratio of facilities extended to households relative to the total facilities extended by banks. In 2021, Jordan ranked second among selected Arab countries in terms of this ratio which stood at 40.7%; the ratio in Jordan is lower than Bahrain, yet it is higher than Kuwait, Oman, Saudi Arabia, Egypt, and UAE. (Figure 4-3).

FIGURE 4-3: CREDIT FACILITIES EXTENDED TO HOUSEHOLDS RELATIVE TO TOTAL CREDIT FACILITIES EXTENDED BY BANKS IN JORDAN AND SELECTED ARAB COUNTRIES (2021) (%)



Source: Central Banks websites of selected countries.

4-1-5 SUMMARY

The figures of the household DBR during the last four years (2018-2021), indicate that this ratio declined slightly at the end of 2021 to reach 45.1%, compared to 45.2% at the end of 2020, yet it is slightly higher than its level in 2018 and 2019. The average DBR ratio in Jordan falls within the international acceptable limits, which range between (40% -50%), which implies that the risks of household indebtedness for banks and the individuals themselves are normal and acceptable compared to other countries. Nevertheless, banks with household DBR exceeding 50% should reconsider bringing this ratio down to mitigate the risks arising from the continuous increase in households' indebtedness.

4-2 NON-FINANCIAL COMPANIES SECTOR

4-2-1 INTRODUCTION

The corporate sector in Jordan consists of non-banking financial companies and non-financial companies[1]. The non-banking financial companies sector consists of the insurance companies, securities companies, MFIs, financial leasing companies, and other companies providing diversified financial services. The non-financial companies sector listed in ASE includes the industrial, services, and real estate sectors, which are overseen by the Ministry of Industry, Trade, and Supply. In 2021, total assets of non-financial companies amounted to JD 10,495.4 million, compared to JD 9,567.9 million at the end of 2020, increasing by 9.7%.

The following section elaborates on the developments of the non-financial companies (industrial, services, and real estate). According to the ASE's annual report, the listed companies in ASE reached to 172 at the end of 2021, compared to 179 companies at the end of 2020. With regard to the evolution and risks of the financial companies, they were detailed in chapter three.

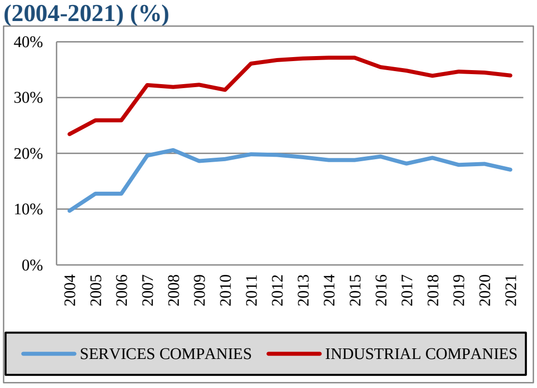
4-2-2 THE OWNERSHIP STRUCTURE OF NON-FINANCIAL COMPANIES

According to the Securities Depository Center data, the non-Jordanian ownership (Arabs and foreigners) in non-financial industrial and

[1] Based on the data of non-financial companies listed in ASE for 2021, as data of non-financial companies not listed in ASE are not available (noting that some data for previous years were changed from the source).

services companies reached to 34% and 17.1%, respectively, at the end of 2021 (in the form of shares, bonds, and subscription rights), compared to 34.5% and 18.1%, respectively, at the end of 2020. The non-Jordanian ownership in these companies broadly reflects investors' confidence in the Jordanian economy; these ownerships are stable contributions (Figure 4-4).

FIGURE 4-4: NON-JORDANIAN OWNERSHIP (ARABS AND FOREIGNERS) IN NON-FINANCIAL COMPANIES FOR THE PERIOD (2004-2021) (%)

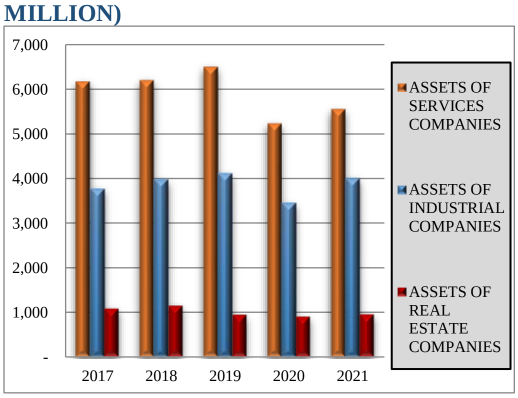


Source: ASE Website.

4-2-3 ASSETS OF THE NON-FINANCIAL COMPANIES

Assets of non-financial companies listed in ASE approximated JD 10,495.4 million at the end of 2021, compared to JD 9,567.9 million at the end of 2020, increasing by 9.7%, as the conditions of these companies were improved especially in the second half of 2021 after deteriorating in 2020 due to the adversities brought by the COVID-19 pandemic. The industrial companies' assets increased to reach JD 3,998.9 million at the end of 2021, compared with JD 3,450.5 million at the end of 2020, increasing by 15.9%. Furthermore, the assets of services companies increased by 6.3% from JD 5,223.9 million at the end of 2020, to JD 5,551.2 million at the end of 2021, while assets of the real estate companies increased by 5.8% to reach JD 945.2 million at the end of 2021, compared to JD 893.6 million at the end of 2020. (Figure 4-5).

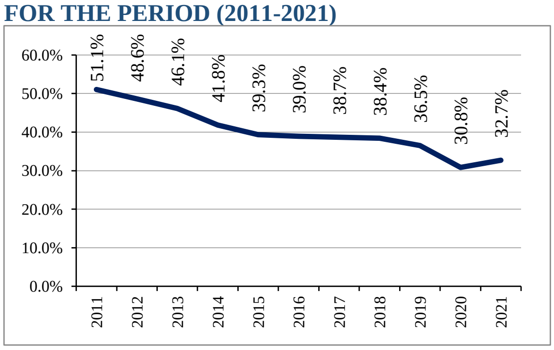
FIGURE 4-5: ASSETS OF NON-FINANCIAL COMPANIES FOR THE PERIOD (2017-2021) (JD MILLION)



Source: ASE Website.

The assets of non-financial companies relative to GDP recorded 32.7% at the end of 2021, compared to 30.8% at the end of 2020, while they recorded 51.1% at the end of 2011. (Figure 4-6).

FIGURE 4-6: ASSETS OF NON-FINANCIAL COMPANIES SECTOR AS PERCENT OF GDP FOR THE PERIOD (2011-2021)

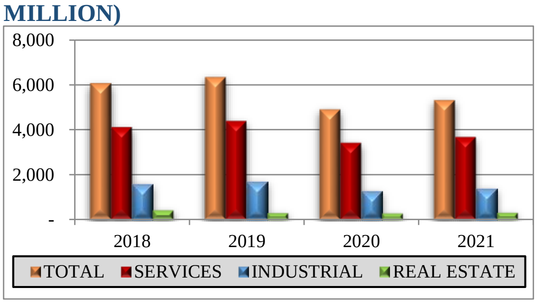


Source: ASE Website, and the CBJ

4-2-4 LIABILITIES OF NON- FINANCIAL COMPANIES

Liabilities of non-financial companies reached to JD 5,319.5 million at the end of 2021, compared to JD 4,911.4 million at the end of 2020, an increase of 8.3%. Liabilities of the services companies reached approximately JD 3,664.8 million at the end of 2021, compared to JD 3,408.4 million at the end of 2020. Liabilities of the industrial companies reached to JD 1,370.2 million at the end of 2021, compared to JD 1,241.9 million at the end of 2020. As for the liabilities of real estate companies, they reached to JD 284.4 million at the end of 2021, compared to JD 261 million at the end of 2020 (Figure 4-7).

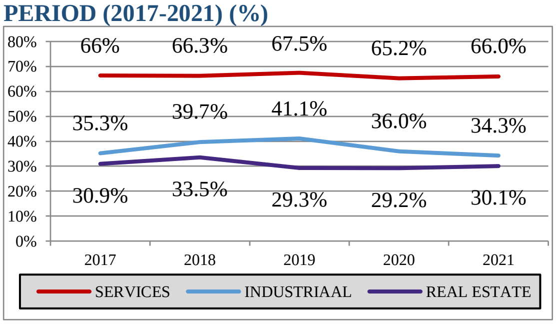
FIGURE 4-7: LIABILITIES OF NON-FINANCIAL COMPANIES FOR THE PERIOD (2018-2021) (JD MILLION)



Source: ASE Website.

In addition, the liabilities to assets ratio increased slightly for the real estate and services companies at the end of 2021, to reach 30.1% and 66%, respectively, compared to 29.2% and 65.2% respectively, at the end of 2020. However, the ratio for industrial companies declined from 36% at the end of 2020, to 34.3% at the end of 2021. (Figure 4-8).

FIGURE 4-8: LIABILITIES TO ASSETS RATIO OF NON-FINANCIAL COMPANIES DURING THE PERIOD (2017-2021) (%)



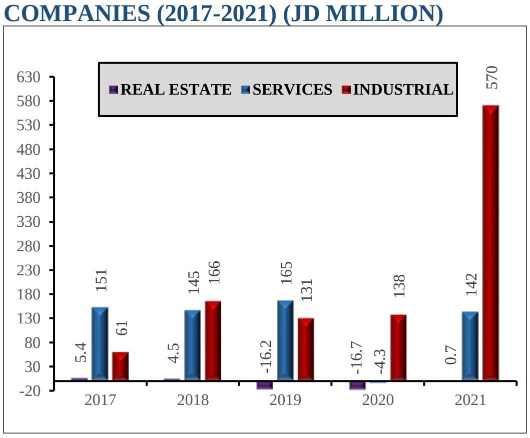
Source: ASE Website.

4-2-5 PROFITABILITY OF NON-FINANCIAL COMPANIES

Net profits of non-financial companies increased remarkably to reach JD 712.9 million at the end of 2021, compared to JD 117.3 million at the end of 2020, due to improving conditions of these companies, as they bounced back especially during the second half of 2021, after deteriorating sharply due to the repercussions of COVID-19 pandemic. This increase is mainly attributed to the increase of industrial companies (the industrial sector) profits by 312.3% to reach JD 570.2 million in 2021, compared to JD 138.3 million in 2020, owing to the increase in the profits of the extractive industries companies, such as phosphate and potash companies.

In addition, the profits of the services companies (the services sector) increased to reach JD 142 million in 2021, compared to losses of JD 4.3 million in 2020, supported by the reopening of economic sectors after the lockdowns in 2020. The profits of the real estate companies increased by JD 17.4 million in 2021, or 103.9%, to record a small profit of JD 0.7 million at the end of 2021, compared to losses of JD 16.7 million at the end of 2020. (Figure 4-9).

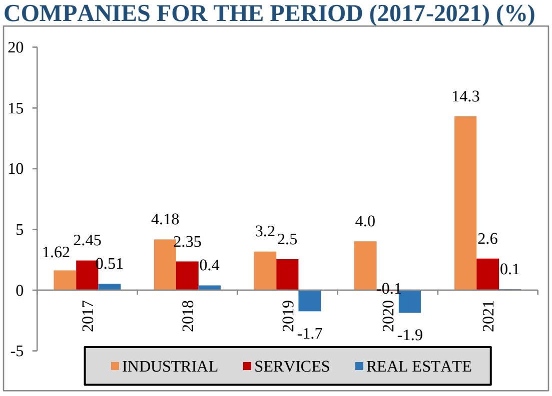
FIGURE 4-9: NET PROFITS OF NON-FINANCIAL COMPANIES (2017-2021) (JD MILLION)



Source: ASE Website.

The ROA of the industrial companies increased to 14.3% at the end of 2021, compared to 4% at the end of 2020, while the ROA for services companies increased form -0.1% at the end of 2020, to 2.6% at the end of 2021. In addition, the ROA of the real estate companies increased from -1.9% at the end of 2020, to 0.1% at the end of 2021. (Figure 4-10).

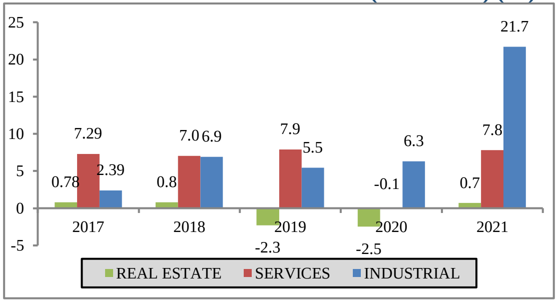
FIGURE 4-10: ROA OF THE NON-FINANCIAL COMPANIES FOR THE PERIOD (2017-2021) (%)



Source: ASE Website

Furthermore, the ROE of the industrial companies increased to 21.7% at the end of 2021, up from 6.3% at the end of 2020. The services companies' ROE increased also to reach 7.8% at the end of 2021, up from -0.1% at the end of 2020. Meanwhile, the ROE for the real estate companies increased from -2.5% at the end of 2020, to reach 0.7% at the end of 2021. (Figure 4-11).

FIGURE 4-11: ROE OF THE NON-FINANCIAL COMPANIES FOR THE PERIOD (2017-2021) (%)

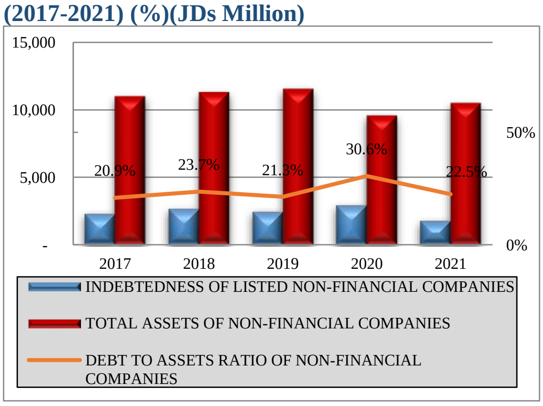


Source: ASE Website.

4-2-6 FINANCIAL LEVERAGE FOR NON-FINANCIAL COMPANIES

Most non-financial companies listed in ASE are still less dependent on borrowing. The debt to assets ratio of non-financial companies declined to around 22.5% at the end of 2021, compared to 30.6% at the end of 2020, due to the increase in the assets of non-financial companies in 2021 as compared to 2020. (Figure 4-12).

FIGURE 4-12: DEBT TO ASSETS RATIO FOR NON-FINANCIAL COMPANIES DURING THE PERIOD (2017-2021) (%)(JDs Million)

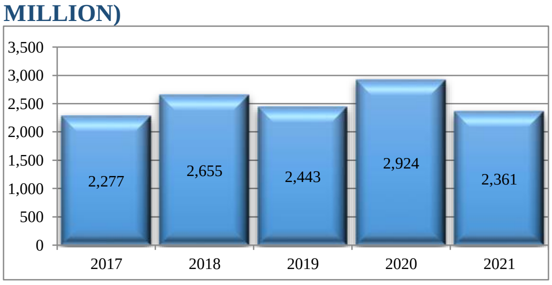


Source: ASE Website

4-2-7 INDEBTEDNESS OF NON-FINANCIAL COMPANIES TO THE BANKING SECTOR

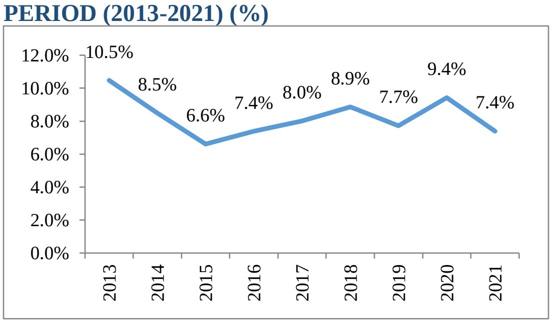
The facilities extended by banks to non-financial companies listed in ASE reached to JD 2,361 million at the end of 2021, compared to JD 2,924 million at the end of 2020, a decrease of 19.2%, (Figure 4-13). The indebtedness of non-financial companies in percent of GDP increased consecutively during the period (2015-2020), yet it declined at the end of 2021 to record 7.4%, compared to 9.4% at the end of 2020. (Figure 4-14).

FIGURE 4-13: INDEBTEDNESS OF NON-FINANCIAL COMPANIES TO THE BANKING SECTOR FOR THE PERIOD (2017-2021) (JD MILLION)



Source: ASE Website.

FIGURE 4-14: INDEBTEDNESS OF NON-FINANCIAL COMPANIES TO THE BANKING SECTOR (IN PERCENT OF THE GDP) FOR THE PERIOD (2013-2021) (%)



Source: ASE website and CBJ.

4-2-8 STRESS TESTING FOR NON-FINANCIAL COMPANIES

Stress testing were conducted for a number of non-financial public shareholding companies to assess the soundness of the corporate sector and its ability to withstand shocks, thus evaluating the companies' capability to repay their debts to banks and the financial sector in general. The Financial Stability Department in the CBJ built a model for stress testing for the corporate sector, using the Interest Coverage Ratio (ICR) for the borrowing companies, which is a widely used and a significant measure to assess the companies' ability to repay their debts. The ICR is the ratio of earnings before interest and tax (EBIT) to interest expenses paid on loans; it assesses the ability of borrowing companies to cover the interest expenses for loans using current period revenues. If the ICR exceeds 150%, the debt is totally covered, however, if it falls within (100%-150%), the debt is at risk, whereas, the debt is uncovered if the ICR declines below 100%.

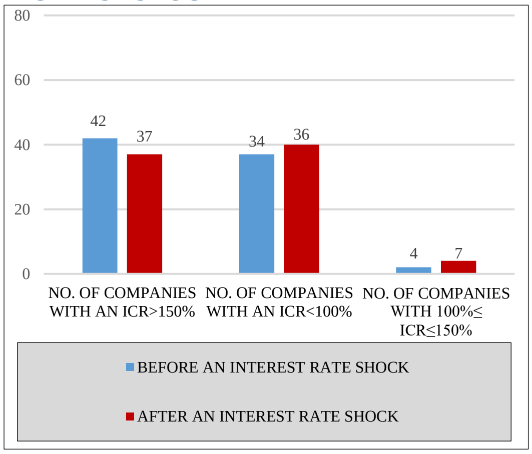
The tests assume shocks in terms of an increase in interest rates or a decline in companies' profits due to the potential economic implications of the global geopolitical tensions in particular the Russian-Ukrainian crisis. The tests measure the impact of each shock on the ICR; the after-shock ICR is used to assess the companies' ability to repay their debts to banks.

4-2-9 A SHOCK OF INCREASING INTEREST RATES

An interest rate hike will raise the interest expenses paid by borrowing companies to banks; provided that their revenues remain constant. This will negatively affect the companies' ability to pay their interest expenses to banks, thus the ICR will decline as interest expenses will increase. If interest rates on loans provided to these companies increased by 200 basis points, the ICR will decline from 678% to 531%, which is adequately higher than the minimum acceptable limit of 150%. This means that the effect of this shock on companies will be relatively limited in general.

On the individual level, (5) companies will have their ICRs below 150%, which will decrease the number of companies with a covered ICR from (42) to (37) companies. The number of companies with an ICR between (100%-150%) will increase from (4) to (7) companies, and the number of companies with an ICR below 100% will decline from (34) companies to (36) companies. (Figure 4-15).

FIGURE 4-15: THE ICR FOR COMPANIES BEFORE AND AFTER AN INTEREST RATE INCREASE SHOCK



On the sectoral level, the average ICR will decrease from 307% to 228% for services companies[2], from 781% to 619% for industrial companies, and from 125% to 95% for real estate companies.

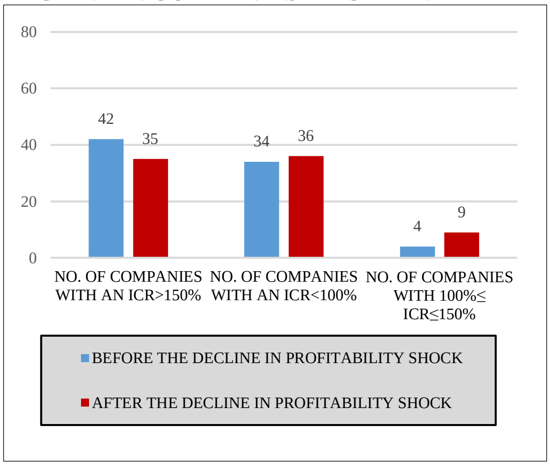
4-2-10 A SHOCK OF A DECLINE IN PROFITS OF BORROWING COMPANIES

If the profits of borrowing companies declined by 25% due to possible economic implications of the global geopolitical tensions, especially the Russian-Ukrainian crisis, the effect of this shock will be higher than the interest rates hike shock, as the ICR will decline from 678% to 497%.

On the individual level, 7 companies will have their ICR below 150% thus the number of companies with an ICR below 100% will increase from (34) to (36) companies. The number of companies with an ICR between (100%-150%) will increase from (4) companies to (9) companies. (Figure 4-16).

[2] The data of Royal Jordanian was excluded as they are outliers; the company incurred huge losses in 2020 and 2021 due to the repercussions of COVID-19 pandemic, which had a toll on the aviation sector.

FIGURE 4-16: THE ICR FOR COMPANIES BEFORE AND AFTER THE SHOCK OF A DECLINE IN COMPANIES' PROFITABILITY



On the sectoral level, the average ICR will decrease from 307% to 189% for services companies, from 781% to 497% for industrial companies, and from 125% to 78% for real estate companies.

4-2-11 CONCLUSION

Most indicators of the non-financial companies improved markedly in 2021, propelled by the improvement of their operational performance, in light of the gradual recovery from the repercussions of COVID-19 pandemic, as well as the notable improvement in several economic fundamentals in the Kingdom.

The profits of non-financial companies grew remarkably in 2021, to reach JD 712.9 million, compared to JD 117.3 million in 2020, which is primarily due to the gradual recovery from the repercussions of COVID-19 pandemic. However, challenges facing the corporate sector and the national economy still looming large, namely the soaring energy and primary commodities prices arising from the supply chain disruptions after COVID-19 pandemic, in addition to the repercussions of the Russian-Ukrainian crisis.

CHAPTER FIVE: THE EXPOSURE OF BANKS IN JORDAN TO RISKS OF THE REAL ESTATE MARKET AND THE REAL ESTATE PRICE INDEX

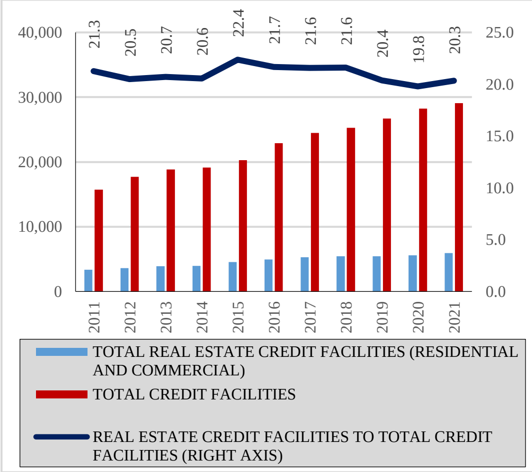
5-1 INTRODUCTION

The risks of the real estate sector and the financing provided to it captured an increasing attention after the global financial crisis, which was triggered by a real estate bubble in US in 2007; it affected most economies worldwide, including Jordan.

During the last two decades, the real estate market in Jordan experienced successive spikes driven mainly by the political and economic conditions in the region, and the resulting abnormal population growth in Jordan, owing to the influx of large numbers of Arabs from neighboring countries, especially from Iraq and Syria. This chapter highlights the real estate sector in Jordan and the exposure of banks operating in Jordan to the risks thereto. Furthermore, this chapter also discusses the development of real estate prices in the Kingdom through analyzing the Real Estate Price Index (REPI); an indicator developed jointly by the CBJ and the Department of Lands and Survey.

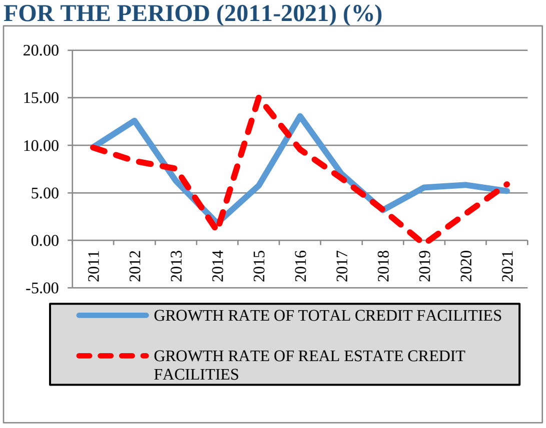
Credit facilities extended to the real estate sector for residential and commercial purposes grew by 5.8% to reach JD 5.91 billion at the end of 2021, accounting for 20% of total credit facilities provided by banks, compared to JD 5.59 billion, a growth of 2.8% in 2020. It is noteworthy, that the average annual growth rate during the years 2011-2021 reached 6.3% (Figure 5-1).

FIGURE 5-1: DIRECT CREDIT FACILITIES TO THE REAL ESTATE SECTOR AND THEIR RATIO TO TOTAL DIRECT CREDIT FACILITIES DURING (2011-2021) (JD MILLION) (%)



The average annual growth rate of facilities extended to the real estate sector during the period 2011-2021 was slightly lower than the average annual growth rate of total facilities; it recorded 6.3% compared to 6.9% growth in total credit facilities (Figure 5-2). In addition, the trading volume at the real estate market in Jordan increased by 46.9% in 2021 compared to its level in 2020, to reach approximately JD 5,021 million, due to lifting lockdowns especially during the second half of 2021, and the reopening of economic sectors, which led economic conditions to improve and started the gradual recovery from the repercussions of COVID-19 pandemic which affected most sectors including the real estate.

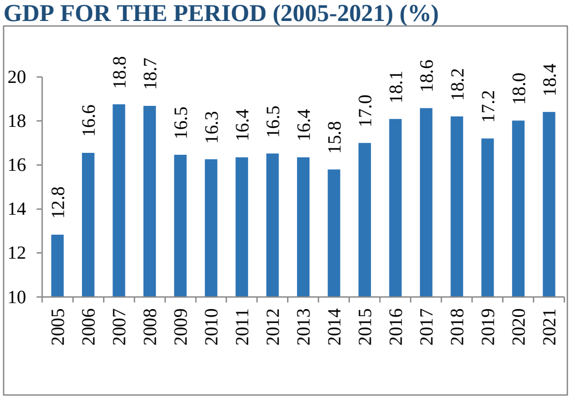
FIGURE 5-2: THE REAL ESTATE CREDIT FACILITIES GROWTH RATES COMPARED TO TOTAL CREDIT FACILITIES GROWTH RATES FOR THE PERIOD (2011-2021) (%)



The ratio of credit facilities extended to the real estate sector in percent of GDP reached 18.4% in

2021, compared to 18% in 2020. Figure (5-3) illustrates the evolution of this ratio during the period 2005-2021. The figure indicates that during the period 2005-2008, the ratio increased markedly to reach 18.7% at the end of 2008, and dropped to 15.8% at the end of 2014 due to the repercussions of the global financial crisis and the headwinds in the region. Afterwards, this ratio kept fluctuating up and down to reach 18.4% at the end of 2021.

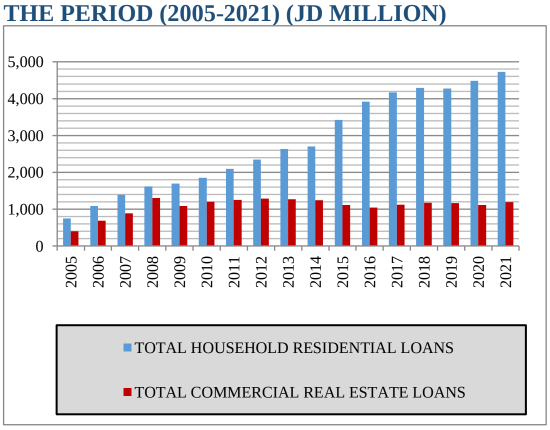
FIGURE 5-3: CREDIT FACILITIES EXTENDED TO THE REAL ESTATE SECTOR AS PERCENT OF GDP FOR THE PERIOD (2005-2021) (%)



5-2 TYPES OF CREDIT FACILITIES EXTENDED TO THE REAL ESTATE SECTOR

With regard to the types of credit facilities extended to the real estate sector, the household residential real estate loans accounted for 79.8% of these facilities at the end of 2021, while the commercial real estate loans accounted for 20.2% (Figure 5-4).

FIGURE 5-4: HOUSEHOLD RESIDENTIAL LOANS AND COMMERCIAL REAL ESTATE LOANS FOR THE PERIOD (2005-2021) (JD MILLION)



5-2-1 HOUSEHOLD RESIDENTIAL LOANS

Total household real estate residential loans extended by banks grew by 5.4% to reach JD 4,721.6 million at the end of 2021, compared to JD 4,479 million at the end of 2020, this growth is partially explained by the postponement of loans repayments due on clients impacted by the COVID-19 pandemic. In the pre global financial crisis period of (2006-2008), the household residential loans increased significantly, due to high demand for real estates, especially by non-Jordanians; the average growth rate of residential loans reached to 30%. Thereafter, during the period (2009-2010), the growth pace started to slow down due to the ramifications of the global financial crisis, in tandem with uncertainty conditions, as well as banks reluctance to provide real estate loans. The growth of residential loans bounced back during the period (2011-2015) as the impacts of the global financial crisis have abated, market conditions improved, and the demand for real estate increased due to the influx of Arab refugees, especially from Syria. However, during the period (2016-2019) the growth of residential loans was gradually slowing down due to the geopolitical developments in the region, and the increase of uncertainty and its implications on the economic sectors in the Kingdom, in particular the real estate sector. However, the growth of residential loans improved slightly in 2020 and 2021. (Figure 5-5) and (Figure 5-6).

FIGURE 5-5: RESIDENTIAL LOANS RATIO TO TOTAL CREDIT FACILITIES EXTENDED FOR THE REAL ESTATE SECTOR (2005-2021) (JD MILLION)

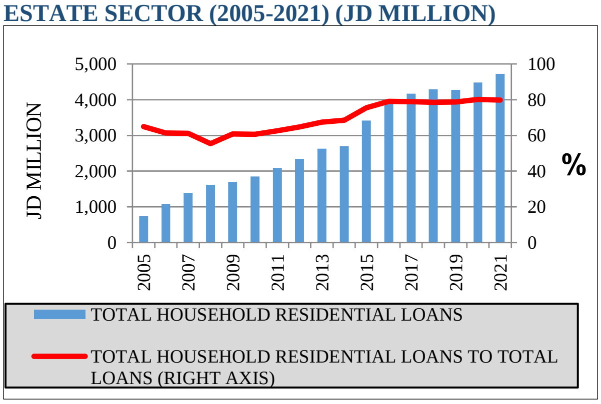
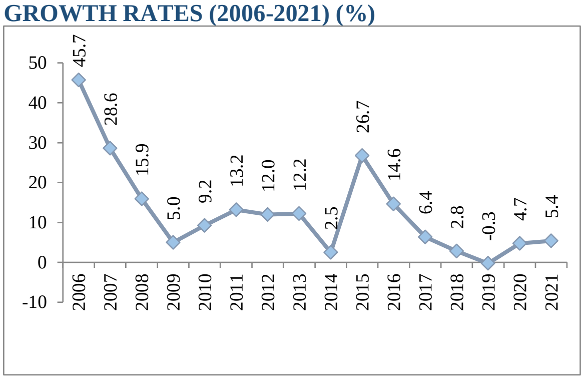
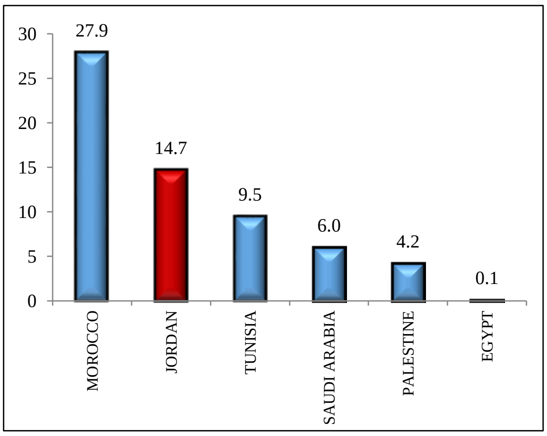


FIGURE 5-6: HOUSEHOLD RESIDENTIAL LOANS GROWTH RATES (2006-2021) (%)



The household residential loans as percent of GDP stood at 14.7% at the end of 2021, compared to 14.4% at the end of 2020. Jordan ranked second among selected Arab countries in terms of this ratio; Jordan is much lower than Morocco, and higher than Tunisia, Saudi Arabia, Palestine, and Egypt (Figure 5-7).

FIGURE 5-7: RESIDENTIAL LOANS IN PERCENT OF GDP IN JORDAN AND SELECTED ARAB COUNTRIES (2021)* (%)



*Data of selected countries 2021/ Arab Monetary Fund

It is noteworthy that the number of apartments sold in 2021 approached 41,030, compared to 29,016 apartments in 2020, increasing by 41.4%, as the ramifications of the COVID-19 pandemic apparently affected most economic sectors in 2020, including the real estate.

5-2-2 COMMERCIAL REAL ESTATE LOANS

Total commercial real estate loans extended by banks increased by 7.5%, to reach JD 1,193.1 million at the end of 2021 (20.2% of total credit facilities for the real estate sector), compared to JD 1,110 million at the end of 2020. The commercial real estate loans were growing rapidly during the pre-crisis period (2005-2008); they increased from JD 400 million to JD 1,300 million, with an annual average growth rate of 49%. Afterwards, they declined significantly in 2009 to reach around JD 1,089 million, due to the tremendous adverse effect of the global financial crisis on the commercial real estates. These loans were slowing down during the period (2010-2012), and declined during the period (2013-2016), however, these loans increased again in 2017, and 2018, yet they decreased in 2019 and 2020 due to the implications of COVID-19 pandemic, and they bounced back in 2021 as figures (5-8) and (5-9) indicate.

FIGURE 5-8: COMMERCIAL REAL ESTATE LOANS GROWTH RATES (2008-2021) (%)

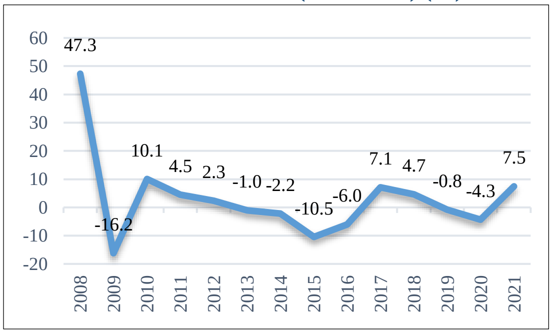
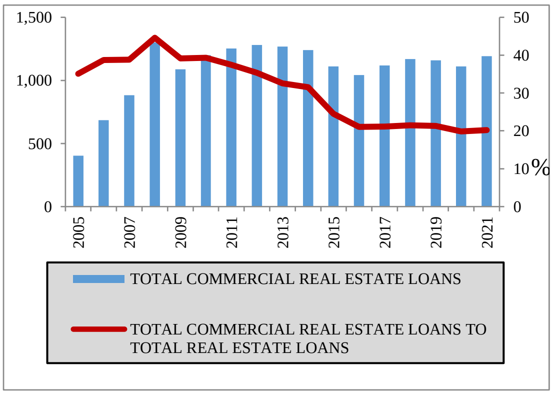


FIGURE 5-9: COMMERCIAL REAL ESTATE LOANS TO TOTAL CREDIT FACILITIES EXTENDED FOR THE REAL ESTATE SECTOR (2005-2021) (JD million)

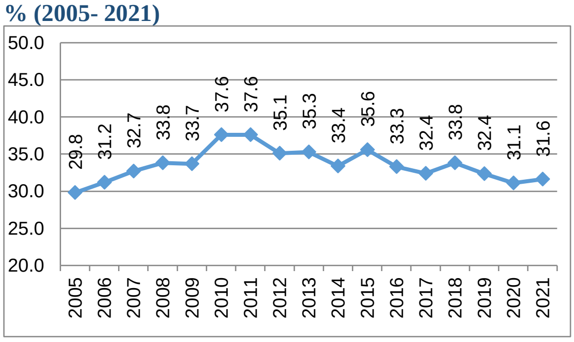


5-3 DIRECT FACILITIES PROVIDED USING REAL ESTATES AS COLLATERALS

Banks are directly exposed to the risks of the real estate market, as they provide credit facilities to finance the purchase or construction of residential or commercial real estates; which are generally used as collaterals for these loans. Another channel for banks' exposure to the real estate market risks is when real estates are used as collaterals to secure different credit facilities extended by banks. Accordingly, any decline in the prices of real estates will affect the value of collaterals, and dampen banks' ability to recover their funds if the borrower defaults and cannot repay. Total direct credit facilities extended by banks for purposes other than mortgages using real estate as collaterals amounted to JD 3,336.6 million at the end of 2021, compared to JD 3,194 million in 2020.

Furthermore, total direct credit facilities extended using real estates as collaterals for residential, commercial, and other purposes reached around JD 9,251.3 million, accounting for 31.6% of total facilities at the end of 2021, compared to 31.1% in 2020. (Figure 5-10).

FIGURE 5-10: CREDIT FACILITIES EXTENDED BY BANKS USING REAL ESTATES AS COLLATERALS TO TOTAL CREDIT FACILITIES % (2005- 2021)



5-4 THE LTV RATIO UPPER LIMIT FOR HOUSEHOLD RESIDENTIAL AND COMMERCIAL REAL ESTATE LOANS IN JORDAN

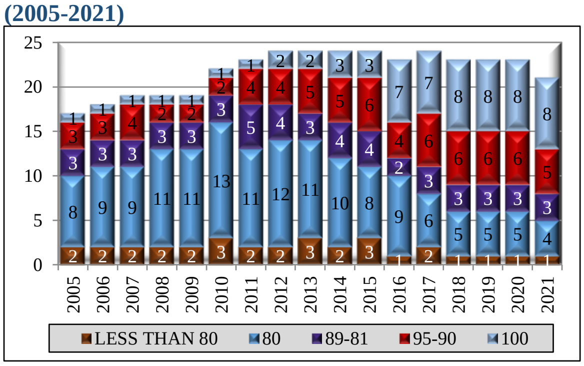
The loan to the value of the mortgage (LTV) ratio is one of the most essential ratios and indicators that need to be monitored, to assess banks' exposure to the real estate market risks. The immense increase in this ratio may expose banks to high risks in case of real estate prices fall, thus deterring banks' ability to recover their funds in case of clients' default, as the value of real estates used as collaterals for these loans will drop.

In addition, if the real estate market signals for a price bubble, countries usually set limits on the LTV ratio to curb the real estate prices bubble, to reduce the probability of bankruptcy when house prices fall down, and to reduce losses by raising the value of collaterals, which enhances banks' ability to ward off these risks.

To analyze the LTV ratio in Jordan, the CBJ has compiled some LTV data from banks in terms of the upper limits and the actual average.

Figure (5-11) illustrates the upper limits of the LTV ratio for household residential loans. The figure illustrates that the LTV ratio for (5) banks (accounting for 23.8% of banks providing household residential loans) does not exceed 80%, (3) banks have an LTV ratio between 81% and 89%, whereas, (5) banks have an LTV ratio between 90% and 95%, and the remaining (8) banks have a 100% LTV ratio.

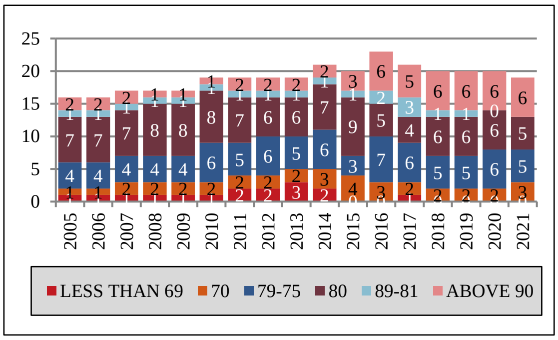
FIGURE 5-11: THE LTV RATIO UPPER LIMIT FOR HOUSEHOLD RESIDENTIAL LOANS FOR BANKS (2005-2021)



The figure above indicates that the number of banks with an LTV upper limit of 100% increased from (3) banks in 2015 to (8) banks in 2020 and 2021, which implies that some banks in Jordan are providing loans that exceed the values of residential real estates in the Kingdom.

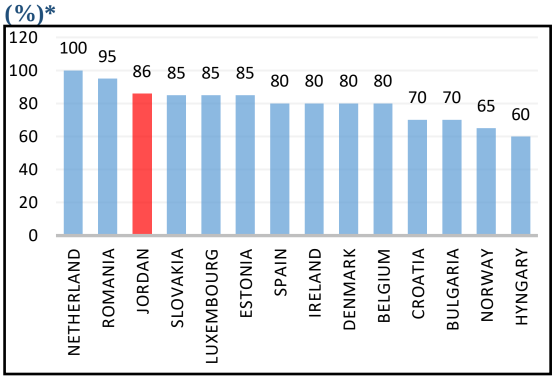
The majority of banks set their LTV upper limit for commercial real estate loans lower than the ratio for residential loans, as 68.4% of banks providing commercial real estate loans with an LTV ratio not exceeding 80% (Figure 5-12).

FIGURE 5-12: BANKS DISTRIBUTION ACCORDING TO THE LTV RATIO UPPER LIMIT FOR COMMERCIAL REAL ESTATE LOANS (2005-2021)



The average LTV ratio upper limit varies across countries, ranging between 60% and 100%. Banks in Jordan had an average LTV upper limit of around 86%, ranking third amongst 12 countries with available LTV data (Figure 5-13).

FIGURE 5-13: LTV RATIO UPPER LIMIT FOR REAL ESTATE LOANS (RESIDENTIAL AND COMMERCIAL) FOR SELECTED COUNTRIES (%)*

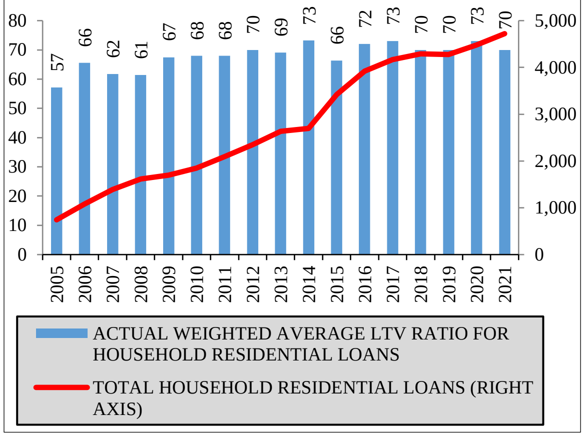


*: European Mortgage Federation (EMF), November 2021

5-5 ACTUAL AVERAGE LTV RATIO FOR HOUSEHOLD RESIDENTIAL AND COMMERCIAL REAL ESTATE LOANS

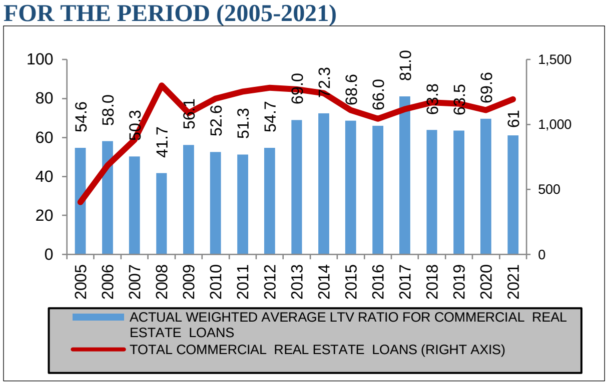
Despite the increase of the LTV ratio upper limit for household mortgages in some banks, the actual average of the LTV ratio upper limit is below the upper bound banks can afford (i.e. the ratio specified in banks' credit policies). The actual weighted average of the LTV ratio stood at 73.2% in 2014, dropped to 66.3% in 2015, and resumed its upward trend to reach 72% at the end of 2016 and 73% at the end of 2017. It declined again to reach 70% in 2018 and 2019, yet it increased to 73% in 2020, and declined to 70% at the end of 2021(Figure 5-14).

FIGURE 5-14: TOTAL HOUSEHOLD RESIDENTIAL LOANS AND ACTUAL WEIGHTED AVERAGE LTV RATIO FOR HOUSEHOLD RESIDENTIAL LOANS (2005-2021)



With regard to the actual average of the LTV ratio for commercial real estate loans, it increased to 70% in 2020, against 64% in 2019, and declined to 61.1% at the end of 2021. (Figure 5-15).

FIGURE 5-15: ACTUAL WEIGHTED AVERAGE LTV RATIO FOR COMMERCIAL REAL ESTATE LOANS AND TOTAL COMMERCIAL REAL ESTATE LOANS FOR THE PERIOD (2005-2021)



5-6 THE CBJ MEASURES TO MITIGATE BANKS' EXPOSURE TO THE RISKS OF THE REAL ESTATE MARKET AND ENHANCING BANKS' ABILITY TO WITHSTAND THESE RISKS

As mentioned in previous Financial Stability Reports, the CBJ has put in place certain controls, aiming at reducing banks' exposure to the real estate market risks and enhancing their ability to ward off these risks as follows:

1. The CBJ's Instructions of Capital Adequacy in force, weighted the risks of residential loans with an LTV ratio not exceeding 80% at 35%; however, the weight increases to 100% if the

LTV ratio exceeds 80%. In other words, if the LTV ratio is above 80%, residential loans are subject to higher capital requirements, which improves banks' ability to withstand these risks, and strengthens the financial stability in the Kingdom.

2. Enacting the Instructions for Large Exposure Limits and Credit Controls No. (2/2019) dated 4/3/2019, which repealed the Instructions for Credit Concentrations No. (9/2001). These Instructions set the maximum limit of credit provided by banks for establishing or purchasing real estates at 20% of total customer JD deposits. These Instructions came into effect on 30/6/2019.

5-6-1 THE REAL ESTATE ASSETS PRICE INDEX IN JORDAN

The real estate assets total value is a fundamental anchor for investment activities in the economy, as they are highly interlinked with other investment sectors, and the real estate prices reflect on inflation, the monetary policy, and the financial stability. Drawing on the high importance of calculating a real estate assets price index (Real Estate Price Index "REPI"), and as already mentioned in previous reports, in the beginning of 2014, an REPI for Jordan was jointly developed by the CBJ and the Department of Lands and Survey, according to international best practices taking into consideration the data available at the Department of Lands and Survey. The REPI index is significant to interpret several developments such as detecting price bubbles of the real estate assets, thus estimating the real estate market risks, in addition to forecasting economic growth, estimating the value of houses, which is used to estimate wealth, and it can be used as a benchmark for international comparisons.

Figures (5-16 to 5-21) illustrate the REPI in Jordan and the changes in this index during the period (2005-2021). These figures indicate that the REPI in Jordan dropped from 119.6 points in 2020 to 119.0 points in 2021, a small decline of 0.5%, compared to a decline of 0.1% in 2019, and 0.5% in 2020.

In 2021, that slight decline in REPI is attributed mainly to the increase in the lands price index by 0.8%, and the decline in the residential and non-residential indices by 2.3% and 1.1%, respectively. In this regard, and as mentioned in previous reports, the REPI went through several stages, which are summarized in four phases as follows:

The first phase, pre-global financial crisis (2005-2008): the demand for real estate especially by non-Jordanians was considerably high, and the prices of residential and non-residential real estates increased substantially. While the second phase (2009-2010) was prevailed by the repercussions of the global financial crisis and uncertainty, and loans extended by banks were declining; these factors apparently contributed to weakening the demand for real estate assets, which brought their prices down. Accordingly, the government in mid-2009 expanded the scope of the exemptions for apartments, and lands were also included to boost the real estate market. During the third phase (2011-2016), the real estate investments bounced back, yet at a slower pace than pre-global financial crisis era.

During the period (2017-2021), the real estate assets prices dropped again due to the slowdown of economic activity in the Kingdom and its impacts on the real estate sector, the worsening conditions of Jordanian workers in the Gulf countries, who are the most willing to purchase real estates, as well as the implications of COVID-19 pandemic which had a toll on most sectors including the real estate.

FIGURE 5-16: THE REPI (RESIDENTIAL, COMMERCIAL, AND LANDS) IN JORDAN (2005-2021)

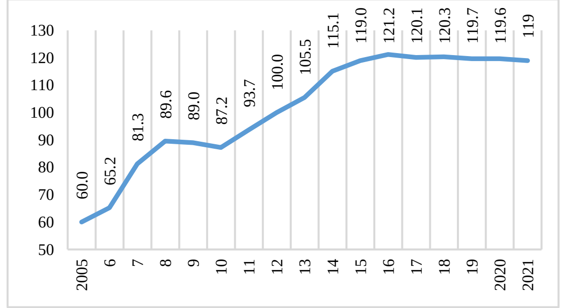


FIGURE 5-17: CHANGES IN REPI (RESIDENTIAL, COMMERCIAL, AND LANDS) IN JORDAN (2006-2021) (%)

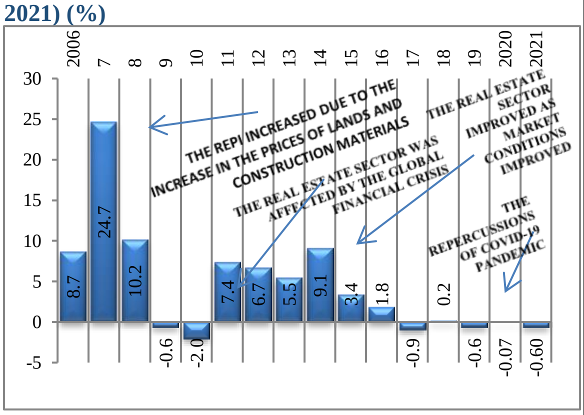


FIGURE 5-18: REPI (RESIDENTIAL, COMMERCIAL, AND LANDS) IN JORDAN AND TOTAL REAL ESTATE CREDIT FACILITIES (2005-2021)

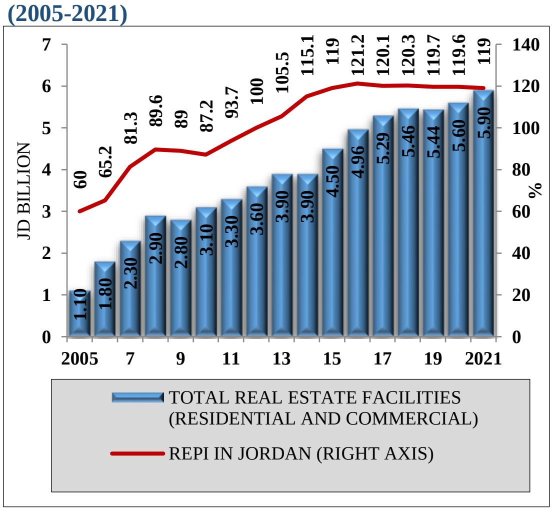


FIGURE 5-19: RESIDENTIAL REPI IN JORDAN AND ITS PERCENTAGE CHANGE (2006-2021)

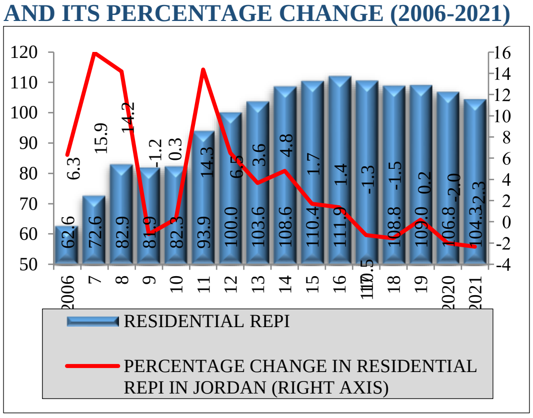


FIGURE 5-20: NON-RESIDENTIAL REPI IN JORDAN AND ITS PERCENTAGE CHANGE (2006-2021)

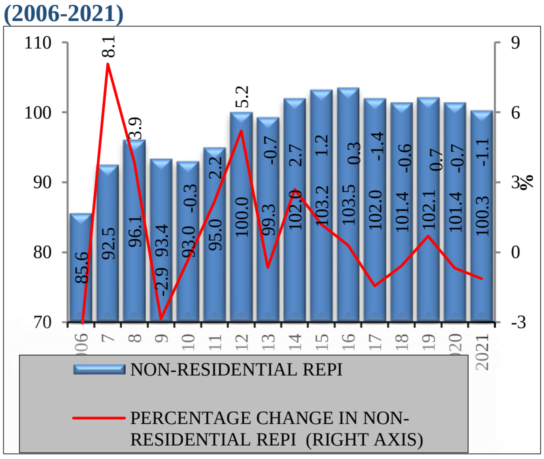
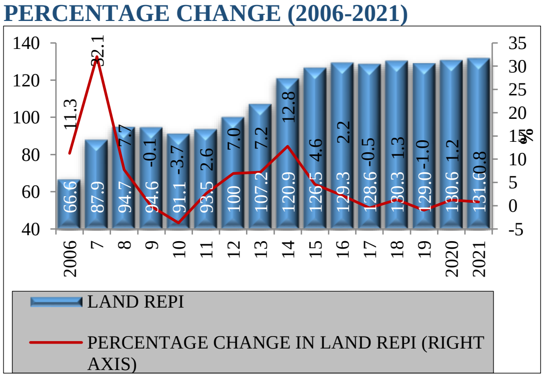


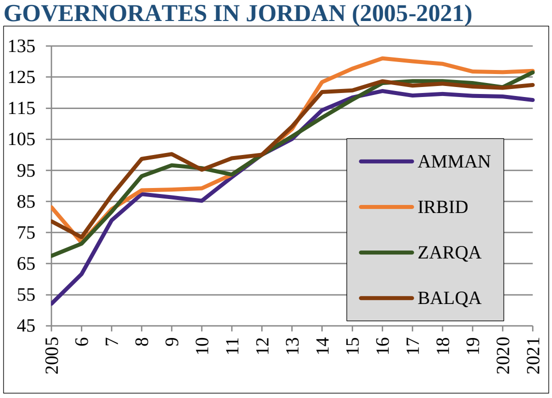
FIGURE 5-21: LAND REPI IN JORDAN AND ITS PERCENTAGE CHANGE (2006-2021)



As for the REPI for main governorates in Jordan, it dropped slightly by 1% in Amman in 2021 to reach 117.6 points, from 118.8 points in 2020. In addition, it increased in Irbid from 126.6 points in 2020 to reach 127 points in 2021, increasing by 0.3%. The REPI highest increase was in Zarqa where it increased from 121.8 points in 2020, to

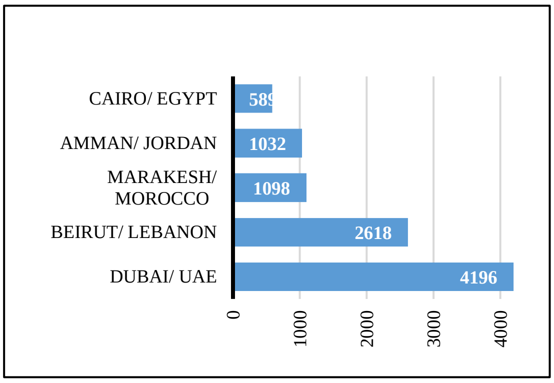
126.5 points in 2021, a growth of 3.9%. (Figure 5-22).

FIGURE 5-22: THE REPI FOR MAJOR GOVERNORATES IN JORDAN (2005-2021)



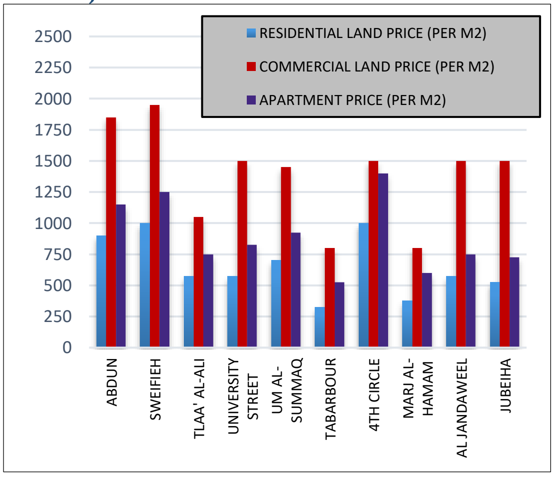
As for the average residential price per square meter in Amman, and according to the information available (for the most attractive places for investment), the average residential price per square meter reached to JD 1,032. It is noteworthy that the prices per square meter in several Arab cities such as Marrakech, Beirut and Dubai are higher than in Amman, (Figure 5-23 and Figure 5-24).

FIGURE 5-23: SQUARED METER PRICES IN AMMAN COMPARED TO SELECTED ARAB CITIES (2017) (JD PER M²)*



*: Source: http://www.globalpropertyguide.com (website)

FIGURE 5-24: THE PRICE OF ONE SQUARED METER IN SELECTED AREAS IN AMMAN (JD PER M²)*

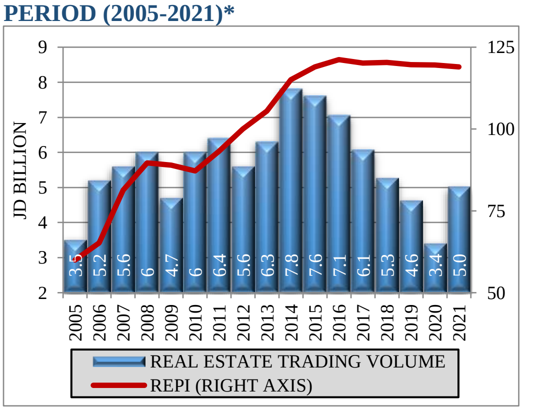


*: Source: www.qoshan.com

5-6-2 TRADING VOLUME IN THE REAL ESTATE MARKET IN JORDAN

The real estate publication of the Department of Lands and Survey 2021, revealed that the trading volume in the real estate market in Jordan increased by 46.9% in 2021, to reach JD 5,021 million compared to JD 3,418 million in 2020. This is due to easing lockdowns especially in the second half of 2021, and reopening of economic sectors, which improved the economic conditions and started the recovery from the repercussions of COVID-19 pandemic, which affected most sectors including the real estate. Figure (5-25) indicates the developments of the real estate trading volume, and the REPI for Jordan during the period (2005-2021).

FIGURE 5-25: THE REAL ESTATE TRADING VOLUME AND THE REPI IN JORDAN FOR THE PERIOD (2005-2021)*



*source: the real estate bulletin, Department of lands and Survey 1/2022

Sales to non-Jordanians reached to JD 257 million at the end of 2021, accounting for only

9% of total real estate trading volume. Sales to Iraqis accounted for the largest share in 2021 with an investment of JD 107 million, or 42% of total estimated sales to non-Jordanians in 2021 (Table 5-1).

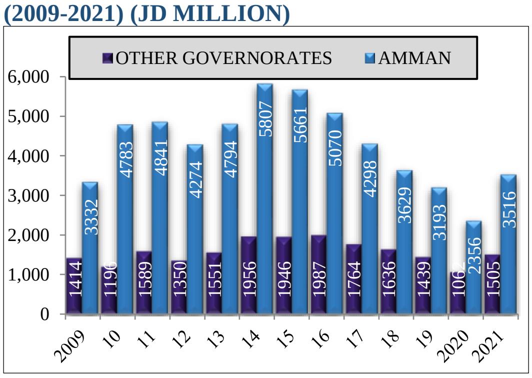
TABLE 5-1: SALES TO NON-JORDANIANS (2015-2021) (JD MILLION)

Nationality	2015	2016	2017	2018	2019	2020	2021
Iraqi	215.1	168.4	157.2	111.5	86.1	76.7	107.6
Saudi	66.4	50.2	63.4	44.0	30.9	34.9	46.4
Syrian	17.5	19.4	18.1	17.5	N.A	11	20.3
American	N.A.	21.5	N.A.	N.A	N.A	N.A	12.7
Gazza	N.A.	N.A.	N.A.	N.A	N.A	N.A	9.6
Other	133.2	115.6	83.1	111.4	30.2	56.4	60.4
Total	432.2	375.1	321.8	284.4	236.2	179	257

Source: Real Estate Bulletin-Department of Lands and Survey 1/2022.

As for the trading volume according to governorates, Amman is the largest with a trading volume of JD 3,516 million in 2021, accounting for 70% of total trading volume in the real estate market. Other governorates' trading volume reached to JD 1,505 million, or 30% of total trading volume (Figure 5-26).

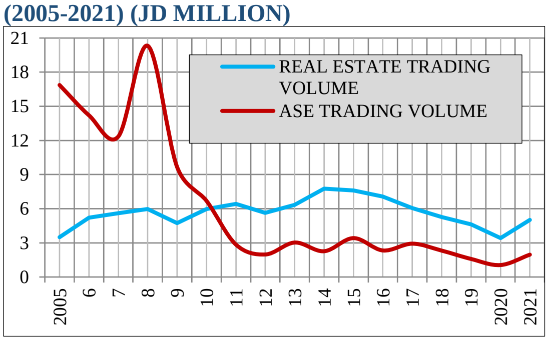
FIGURE 5-26: REAL ESTATE TRADING VOLUME FOR AMMAN AND OTHER GOVERNORATES (2009-2021) (JD MILLION)



*source: the real estate bulletin, Department of lands and Survey 1/2022

Comparing the real estate trading volume to the trading volume in ASE, indicates that the trading volume in the financial market was much higher than the real estate market during the period 2005-2009, due to the boom of the ASE during that period, accompanied by a large inflow of liquidity to the financial market by Arabs, especially Iraqis. This led prices to increase immensely in the financial market, which also attracted many Jordanian investors to join. However, after the deepening of the global financial crisis and the significant decline of prices in the financial market, the trading volume dropped sharply in the financial market, much below the trading volume in the real estate market. The real estate investments are safe haven compared to financial investments. (Figure 5-27).

FIGURE 5-27: THE REAL ESTATE TRADING VOLUME AND THE ASE TRADING VOLUME (2005-2021) (JD MILLION)



*source: the real estate bulletin, Department of lands and Survey 1/2022, and ASE

To proceed with stimulating the real estate sector, and due to the implications of COVID-19 pandemic on this sector, the government decided to finalize the first set of stimulation measures for the real estate sector and housing, whereby apartments and single houses are exempted from registration fees until mid-2021. In addition, the fees and taxes levied on the remaining area that exceeds 150 meters, are 50% lower than the rates stipulated in the law.

The decision also lowered land sale fees by 50% than the rate mentioned in the law, including transactions between relatives, partners, and others. The tax on selling real estate has also been lowered to 50% than the rate stipulated in the law.

The Cabinets' decision of May 2019 was also expanded until mid-2021, regarding the exemption of heirs from the fees related to ownership transfer and disassociation, to enable heirs to manage their real estates whether by sale, subdivision, or investments.

5-7 CONCLUSION

The trading volume in the real estate market and the REPI in Jordan indicate that the real estate market was affected by the slowdown of the economic activity in the Kingdom and the economic and political developments in the region more apparently in 2017. In 2020, the ramifications of the

COVID-19 deepened further the slowdown of the real estate sector; the real estate trading volume decreased by 26%. However, in 2021 the real estate sector improved significantly, as the trading volume increased by 46.9% as explained earlier. The REPI declined slightly in 2021 by 0.5% compared to 2020; this index is relatively stable (with a small tendency to decline) during the past five years which indicates that a price bubble in the real estate market in Jordan is unlikely, in the short and medium terms. This is a positive sign that reduces the risks of the real estate sector, and strengthen the financial stability in the Kingdom.

Nevertheless, the slowdown in the real estate sector requires some banks to reconsider the upper limit of the LTV ratio, especially banks with an LTV ratio exceeding 80%, to avoid any risks arising from falling real estate prices.

CHAPTER SIX: STRESS TESTING

6-1 INTRODUCTION

Stress testing is an important tool used by regulatory authorities and banks to assess banks' ability to withstand shocks and high risks they may confront. The objective of these tests is to evaluate the financial position of a bank under severe yet plausible scenarios, accordingly the tests results are used to determine the levels of capital and liquidity that banks must hold to withstand financial shocks and high risks.

These tests are forward-looking risk assessments that use sophisticated tools rather than statistical methods that use historical information, and help senior management to understand a bank's conditions in times of crises. Stress testing is crucial for risk management and the planning for capital and liquidity, nonetheless, it cannot cover all aspects of a bank's vulnerabilities; it is useful within an integrated risk management policy intended to enhance the soundness and robustness of banks, and strengthen the entire financial system.

STRESS TESTING FOR THE BANKING SECTOR

6-2 FIRST: SENSITIVITY ANALYSIS

The sensitivity analysis tests are broadly used to measure the impact of changes in single risk factors on a bank's financial position, such as the increase of NPLs ratio, changes in interest rates, fluctuations of exchange rates, and changes in stock prices. Generally, the source of the shock (i.e., the source triggering this type of risk) is not identified in these tests. The sensitivity analysis conducted by banks operating in the Kingdom for several risk factors are illustrated next.

6-2-1 SENSITIVITY ANALYSIS FOR CREDIT RISK

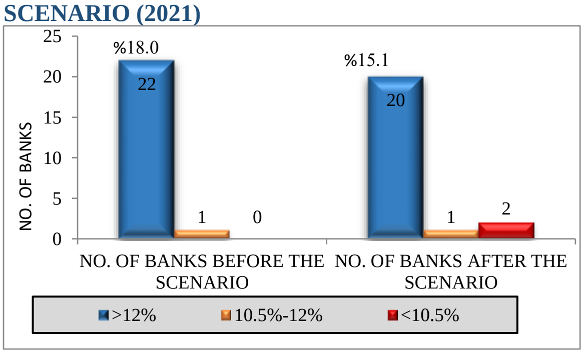
The sensitivity analysis for credit risk assumed an increase in NPLs (default rate at banks) by 100%, and a decline in banks' profits by 50% in 2022 compared to their levels in 2021, in light of lingered implications of COVID-19 pandemic as well as the global geopolitical tensions, in particular the Russian-Ukrainian crisis and their impact on economic conditions in Jordan. The loss Given Default (LGD) ratio is also supposed to reach 65% of NPLs. In this case, the CAR of the banking sector in Jordan will drop from 18% to 15.1%, which implies that the banking sector is broadly capable to withstand this shock; the after-shock CAR remains higher than the 12% minimum requirement applied in Jordan. The limited impact of this shock can be explained by following:

1- High CARs at banks in Jordan, which are considered among the highest in the region.

2- Banks have high profits levels, which enable them to handle additional provisions and losses resulting from the shock when it occurs, without significantly affecting the capital, which in turn protects banks' capital.

At the individual bank level, the CAR will remain higher than 12% for (20) banks, while it will become below 12% for (3) banks; one of which will maintain a CAR above the 10.5% international minimum requirement, which validates the ability of most banks in Jordan to withstand this shock (Figure 6-1).

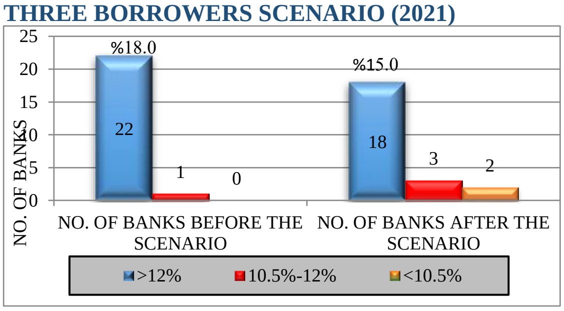
FIGURE 6-1: THE CAR BEFORE AND AFTER APPLYING THE INCREASE OF CREDIT LOSS SCENARIO (2021)



6-2-2 SENSITIVITY ANALYSIS FOR CREDIT CONCENTRATION RISKS

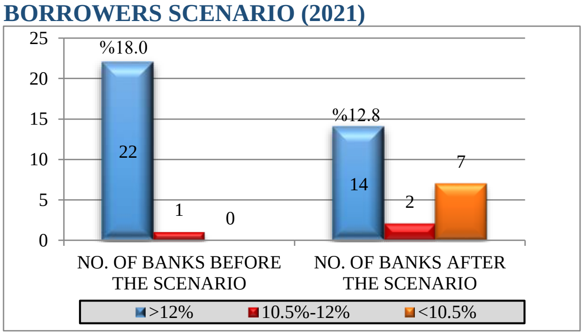
As for credit concentrations risks, in case of the default of the largest three borrowers (excluding credit facilities provided to the government of Jordan and the government- guaranteed facilities) at the individual bank level, the CAR will remain above the minimum requirement of 12% for (18) banks. It will fall below 12% for (5) banks, three of which will maintain a CAR above the international minimum requirement of 10.5%. The CAR for the banking sector will drop from 18% to 15%, thus the CAR for the banking sector will remain higher than the required limit. (Figure 6-2).

FIGURE 6-2: THE CAR BEFORE AND AFTER APPLYING THE DEFAULT OF THE LARGEST THREE BORROWERS SCENARIO (2021)



However, under the assumption of the default of the largest six borrowers (excluding credit facilities provided to the government of Jordan and the government-guaranteed facilities) for each individual bank, the CAR of the banking sector will decline from 18% to 12.8%, yet remains above the minimum requirement. At the individual bank level, the CAR will remain above 12% for (14) banks, while it will fall below 12% for (9) banks, which validates that certain banks need to reduce their concentration risks. It is worth mentioning that the CBJ monitors banks' concentration risks on ongoing basis through credit concentration instructions (Figure 6-3).

FIGURE 6-3: THE CAR BEFORE AND AFTER APPLYING THE DEFAULT OF THE LARGEST SIX BORROWERS SCENARIO (2021)



6-2-3 SENSITIVITY ANALYSIS OF MARKET RISKS

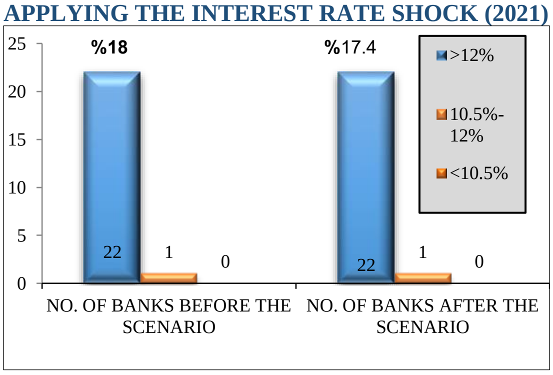
A number of tests were conducted to assess banks' sensitivity to market risks and their impact on capital adequacy. The analysis used three types of shocks only: interest rates, exchange rates, and stock prices, which are the most commonly used variables thereupon.

6-2-3-1 INTEREST RATE SHOCK

In light of the CBJ interest rates hikes to maintain monetary stability and to subdue inflation, a 400 basis points increase in interest rates was assumed.

In this scenario, the CAR of the banking sector will decline from 18% to 17.4%[1]. However, at the individual bank level, the CAR will remain above 12% for (22) banks out of (23) banks, which indicates the ability of banks in Jordan to withstand this shock (Figure 6-4).

FIGURE 6-4: THE CAR BEFORE AND AFTER APPLYING THE INTEREST RATE SHOCK (2021)

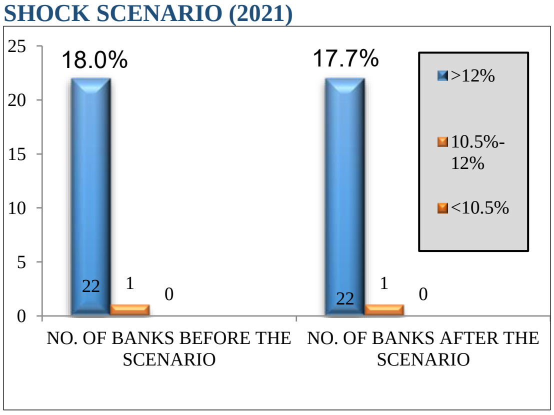


[1] The impact of the shock was calculated using the gap analysis test that examines the status quo at banks in terms of the balance of assets and liabilities sensitive to interest rate risk.

6-2-3-2 FOREIGN EXCHANGE RATE SHOCK

Assuming a 25% decline in the exchange rate of the Jordanian dinar[2] against all foreign currencies, the banking sector's CAR will decline slightly from 18.0%[3] to 17.7%. This indicates that the banking sector is highly capable to withstand this shock, thanks to the comfortable coverage of foreign currency assets to banks' foreign liabilities; long foreign currency positions for most banks. At the individual bank level, the CAR will remain above 12% for (22) banks out of (23) banks, exactly as before the shock. (Figure 6-5).

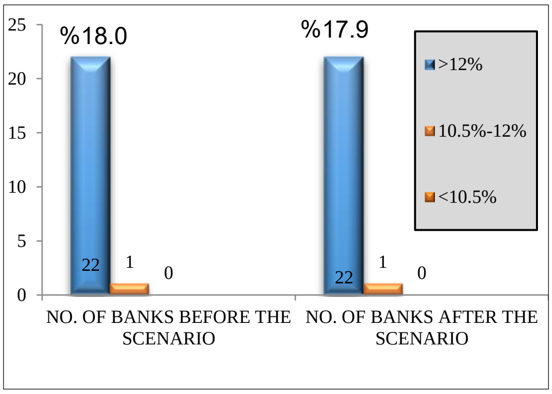
FIGURE 6-5: THE CAR BEFORE AND AFTER APPLYING THE FOREIGN EXCHANGE RATE SHOCK SCENARIO (2021)



6-2-3-3 EQUITY PRICE SHOCK

The test assumes a decline in the stock prices in the financial market by 30%, in this scenario the CAR of the banking sector in Jordan will decline from 18% to 17.9%, which implies that the effect of this shock on the banking sector is immaterial in general. At the individual bank level, the ratio will remain above 12% for (22) banks, exactly as before the shock. (Figure 6-6). This validates that banks in Jordan are able to withstand the shock of equity price risks due to the low exposure of banks to the financial market in Jordan.

FIGURE 6-6: THE CAR BEFORE AND AFTER APPLYING THE EQUITY PRICE SHOCK (2021)



6-3 SECOND: MACRO-STRESS TESTING

Credit risk is one of the main significant risks facing banks which has the most influence on their solvency. Therefore, the Satellite Model was used to predict the NPLs ratio for the period 2022-2024. In this context, a series of scenarios were assumed; medium and severe macro-stress scenarios, which represent hypothetical scenarios designed to assess banks' ability to withstand shocks. Assuming lingering ramifications of the COVID-19 pandemic, as well as the repercussions of the Russian-Ukrainian crisis, and the adversities they bring to Jordan's economy, namely; the increase in the prices of energy and primary commodities arising from the supply chain disruptions, which will set the economic growth to slow down, the unemployment rate to increase, and the financial market to deteriorate. Moreover, the interest rates are also assumed to increase to curb inflationary pressures and to preserve the attractiveness of the Jordanian dinar as a saving currency. To measure the impact of these assumptions on banks, the GDP growth rate (economic growth rate) was used as one of the major economic variables affecting the NPLs, and measuring its impact on the regulatory CAR and Tier1 capital[4] for a bank. Economic research suggest that the decline in

[2] This is a hypothetical scenario that aims primarily to examine banks' exposure to exchange rate risk, noting that the CBJ's foreign currency reserves at the end of October 2022 approached USD 16 billion, sufficient to cover around 8.3 months of the Kingdom's imports, which is a very comfortable level and significantly strengthens the stability of the dinar exchange rate.

[3] This analysis does not consider the indirect effects of the decline in the exchange rate of the Jordanian dinar on the economy, hence, the effect on banks' NPLs is not assessed.

[4] According to Basel III definition

economic growth rate will increase the NPLs, as it affects the customers' ability to repay their debts. Other variables such as the unemployment rates, interest rates, and the stock prices, were also used to predict the NPLs ratio.

To estimate the NPLs ratio, the stress testing methodology using the Satellite Model suggested (3) scenarios to predict the value of the dependent variable (NPLs ratio), and to examine their effect on the CAR of banks for the coming years. These scenarios, in terms of severity, are classified as follows:

- Baseline Macro Stress Scenario.
- Medium Macro Stress Scenario.
- Severe Macro Stress Scenario.

To forecast the NPLs ratio, the following model was used[5]:

$$\mathbf{NPL_t = C + B_1\, NPL_{(t-1)} + B_2\, \Delta RGDP_{(t-1)} + B_3 UNEMP_{(t-1)} + B_4\, RIR_t + B_5\, ASE_t}$$

Where:

NPL_t= Projected NPLs ratio for 2022

C= Constant

NPL_{t-1}= NPLs ratio of the preceding year

$\Delta RGDP_{t-1}$= Real GDP growth rate (economic growth rate)

$UNEMP_{t-1}$= Unemployment rate

RIR_t= Real interest rates

ASE_{t}= ASE general price index

The statistical tests revealed a significant inverse relationship between the economic growth rate and the NPLs ratio, a significant positive relationship between the unemployment rate and the NPLs ratio, a significant positive relationship between the interest rates and the NPLs ratio, and a significant inverse relationship between stock prices and the NPLs ratio at banks, according to the following equation:

$$\mathbf{NPL_t = -8.9 + 0.67\, NPL_{(t-1)} - 0.34\, \Delta RGDP_{(t-1)} + 0.57\, UNEMP_{(t-1)} + 0.39\, RIR_t - 0.04\, ASE_t}$$

[5] This model was estimated using the Fully Modified Ordinary Least Squares (FMOLS) method, which provides optimal estimates for cointegrated regressions by modifying the least squares to calculate the effects of autocorrelation and homoscedasticity in the dependent variables, which result from an autocorrelated relationship between the dependent variable and the independent variables.

The following table shows the results of the econometric analysis of the above-mentioned model:

TABLE 6-1: RESULTS OF THE ECONOMETRICS ANALYSIS

Variable	Coefficient	T-Statistic
C	-8.9	-2.5
NPL(-1)	0.67*	8.0
RGDP(-1)	-0.34**	-1.9
UNEMP(-1)	0.57*	2.9
RIR	0.39*	4.2
ASE	-0.04*	-3.7
Coefficient of Determination (R^2)	91.2%	
Adjusted R^2 Coefficient	87.8%	

(*): Statistically significant at 95% confidence level
(**): Statistically significant at 90% confidence level

6-3-1 ASSUMPTIONS OF THE MODEL

The CBJ has developed stress tests so that the NPLs ratio and its effect on banks' CAR are predicted for several coming years (Multiple-Period Stress Testing), instead of a single year. Consequently, the NPLs ratios for the period 2022-2024 were projected based on changes assumed in the economic growth rate, the unemployment rate, interest rates, and stock prices. The following scenarios have been assumed, noting that the model used is based on the assumption that banks' profits in 2022 will drop by 50% compared to their levels in 2021, and that the LGD will hit 65% of NPLs:

TABLE 6-2: MACRO STRESS TESTING SCENARIOS FOR THE YEARS 2022-2024

Year	Variable	Economic Growth Rate	Unemployment Rate	Real Interest Rate RIR*	General Shares Price Index
Scenarios of 2022	Baseline Scenario	2.4[6]	22.8	5.6	4005
	Medium Macro Stress Scenario	0.0	25.8	7.6	3004
	Severe Macro Stress Scenario	-2.4	28.8	9.6	3200
Scenarios of 2023	Baseline Scenario	2.7	22.6	9.6	3200
	Medium Macro Stress Scenario	0.3	25.6	10.1	1502
	Severe Macro Stress Scenario	-2.1	28.6	10.6	1001
Scenarios of 2024	Baseline Scenario	3.0	22.4	10.6	1001
	Medium Macro Stress Scenario	0.7	25.4	10.6	751
	Severe Macro Stress Scenario	-1.8	28.4	10.6	150

[6] The IMF revised up its projection for the economic growth rate in Jordan for 2022 from 2.4% to 2.7%.

The shock scenarios were assumed according to the following methodology:
Medium Macro Stress Scenario: The projected GDP growth rate for 2022 minus one standard deviation of economic growth rate data for the period (1994-2021). The unemployment rate for the first quarter of 2022 plus one standard deviation of the unemployment rate data for the period (1994-2021).
Severe Macro Stress Scenario: The projected GDP growth rate of 2022 minus two standard deviations of economic growth rate data for the period (1994-2021), the unemployment rate for the first quarter of 2022 plus two standard deviations of the unemployment rate data for the period (1994-2021).
For real interest rates and stock prices, the interest rates were assumed to increase by 200 and 400 basis points in 2022, and by 50 and 100 basis points in 2023 for both the medium and severe macro scenarios, respectively. The interest rates are projected to remain unchanged in 2024.
For stock prices, they were assumed to decrease by 25% and 50% for the medium and severe scenarios, respectively.
*Represents the weighted average interest rates on credit facilities/ loans and advances minus inflation rate.

6-3-2 RESULTS

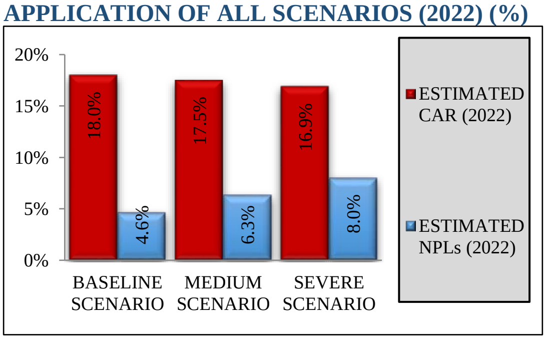
Table (6-3) and Figure (6-7) illustrate projected NPLs ratio and CARs for 2022 assuming the scenarios above; under the severe scenario, the NPLs ratio will increase from 5% in 2021 to 8% in 2022, thus the CAR will drop from 18% to 16.9% in 2022.

TABLE 6-3: MACRO STRESS TESTING RESULTS FOR 2022

Scenarios	Projected NPLs (2022)	Projected CAR (2022)
Baseline Scenario	4.6%	18.0%
Medium Macro Stress Scenario	6.3%	17.5%
Severe Macro Stress Scenario	8%	16.9%

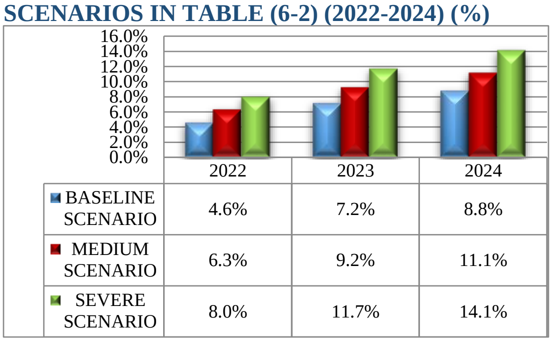
* The NPLs ratio at the end of 2021 stood at about 5%.
** The CAR at the end of 2021 reached to 18%

FIGURE 6-7: CAR AND NPLs AFTER THE APPLICATION OF ALL SCENARIOS (2022) (%)



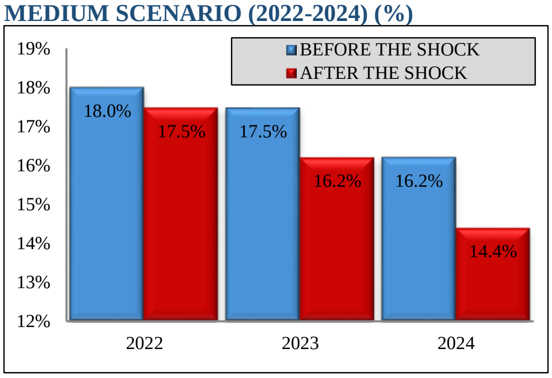
If these scenarios occur (Table 6-2: scenarios), the projected NPLs ratios for 2022-2024 assuming the (three) scenarios will be as illustrated in Figure (6-8).

FIGURE 6-8: THE NPLs AFTER ASSUMING THE SCENARIOS IN TABLE (6-2) (2022-2024) (%)



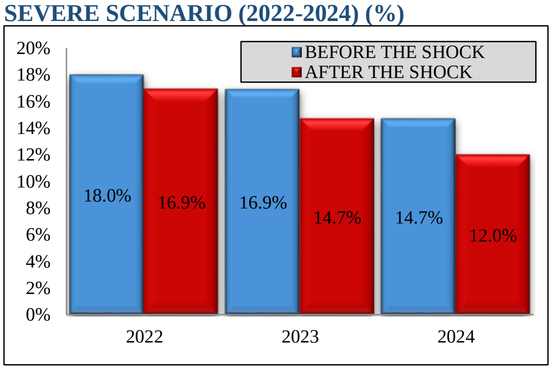
Accordingly, after applying the medium scenario, the CAR for the years 2022-2024 will decline to 14.4% in 2024, which remain sufficiently higher than 12% for the three years (2022-2024). This implies that the banking sector in Jordan is capable to withstand this shock (figure 6-9).

FIGURE 6-9: THE CAR AFTER APPLYING THE MEDIUM SCENARIO (2022-2024) (%)



In addition, implementing the severe scenario indicates that the CAR will drop to 12% in 2024, yet it will remain higher than 12% for the years (2022-2023), which means that the banking sector's CAR is high and capable to withstand this shock as well (figure 6-10).

FIGURE 6-10: THE CAR AFTER APPLYING THE SEVERE SCENARIO (2022-2024) (%)



6-4 CONCLUSION

According to the results for the years (2022-2024), the banking sector is broadly capable to withstand the shocks and high risks resulting from lingering ramifications of COVID-19 pandemic, and the global geopolitical tensions arising from the Russian-Ukrainian crisis. Assuming the most severe scenario, the CAR of the banking sector for the years 2022, 2023, and 2024 will reach to 16.9%, 14.7% and 12%, respectively; the CAR will remain equal to or higher than the minimum limit stipulated in the instructions. These positive results are attributed to the high levels of banks' capital and the comfortable level of profits, which enable banks to handle the additional provisions and losses resulting from the assumed shocks without a significant impact on the capital, thus providing a sufficient protection for banks' capital. Furthermore, the sensitivity analysis revealed that the credit concentration risk has a greater impact on some banks compared to other risks, which requires these banks to reduce their concentration risk. The CBJ will continue to conduct and enhance these tests taking into consideration developments of risks at the international, regional, and national levels to ensure the soundness and robustness of the banking sector in Jordan.

CHAPTER SEVEN: CLIMATE CHANGE RISKS AND IMPLICATIONS FOR FINANCIAL STABILITY

7-1 OVERVIEW

The climate change is a global major concern, as it entails social, economic, and environmental risks. Early at the beginning, climate change gained attention; several efforts were exerted globally to confront the implications of climate change and to adapt to its potential effects on ecosystems and economic sectors.

In 1992, the United Nations (UN) convened the Earth Summit in Rio de Janeiro, Brazil, to discuss the climate and environmental challenges arising from the extinction of certain species, continuous desertification, and land and natural resources degradation. Afterwards, environmental and climate change scientists were encouraging international entities, mainly the UN, to foster the adoption of countries, especially the industrial ones, to the policies that would reduce harmful carbon emissions, and to introduce economic models and structures that replace fossil fuels energy sources with renewable and Eco-friendly sources for production. This is to ensure preserving the ecosystem for future generations, and achieving sustainable development as well.

At the Paris conference in 2015, which was held by the UN to confront climate change risk; a landmark treaty was concluded to confront climate change, and to accelerate and promote the necessary actions and investments to achieve a sustainable low-carbon future. The main objectives set out by the Paris Agreement on Climate Change, which were adopted by 197 UN member countries worldwide, are as follows:

- Limit global warming to well below 1.5 degrees Celsius in the current century.
- Review countries' commitments to reduce harmful emissions periodically every few years.
- Countries responsible for 96% of emissions are required to take actions to reduce the greenhouse gas emissions that cause global warming during the period (2020-2030).
- Provide the necessary financing for developing countries to contribute to reducing gas emissions that are harmful to the environment and adapting to the effects of climate change.

Furthermore, the OECD's International Program for Action on Climate (IPAC) assesses and supports country progress towards a more resilient economy and net-zero greenhouse gas (GHG) emissions; countries are to adopt a number of measurable indicators to evaluate and analyze the progress of countries towards reducing gas emissions.

Although developed countries consider climate change as a global emergency, they did not commit to these pledges, as they are not mandatory. Furthermore, the transition towards renewable energy is not only the responsibility of governments, rather companies and individuals must also commit in terms of sources and uses of energy, as well as adopting policies compatible with future climate risks that jeopardize the sustainability of earth.

7-2 CLIMATE CHANGE

The climate change refers to long-term shifts in temperatures and weather patterns, besides a radical change in natural phenomena, with a steady deterioration of the environmental and vegetation cover.

Without doubt, continuous climate change is attributed to the increase in human industrial activities and the resulting gas emissions in several countries worldwide, especially in developed countries. According to the Intergovernmental Panel on Climate Change (IPCC) sixth report issued in 2021, the global temperature had increased by 1.1 degrees Celsius compared to their levels during the period (1850-1900). However, if gas emissions maintain their current level, global temperature will rise by (1.5-2) degrees Celsius in coming decades.

The global warming imposes adversities that must be monitored and mitigated, namely:

- Melting ice sheets and glaciers, calving off into the sea and lead to coastal erosion; the mean sea level has risen about 12 centimeters since 1880.

- Increasing storms, floods, heatwaves, cold waves, wildfires, earthquakes, and changes in precipitation and humidity levels.
- Numerous studies stated that if climate change continues at the same pace, half of the plants are threatened by 2080.

The IMF's Global Financial Stability Report 2020 draws out that climate change has negative implications for several human activities, in particular economic activities. If measures are not taken to limit the negative repercussions of climate change, the direct losses of natural disasters by 2050 will approximate USD 1 trillion annually.

7-3 ECONOMIC IMPLICATIONS OF CLIMATE CHANGE

Climate change is one of the main challenges facing economic policy makers around the globe, which requires concerted international efforts to mitigate the negative repercussions of this phenomenon. In recent years, international and regional financial organizations are highly interested in promoting achieving low gas emissions and shifting towards Eco-friendly production patterns. Furthermore, countries most vulnerable to natural disasters supported by the IMF and World Bank, are focusing on developing strategies to combat the effects of disasters at the economic and financial levels.

Several studies addressed the potential impacts of global warming on the economic and financial sectors, which would adversely affect the entire global economic system. The IMF's Managing Director remarks at the end of 2021, indicated that if the global temperature rises by two degrees Celsius, the global growth will slow down by (0.2%-1.2%). In the long run, the global economic activity is expected to slow down due to adversities on vital economic sectors.

In addition to the slowdown of economic growth, climate change may exacerbate a lot of risks already exist worldwide, including water scarcity, food shortage, and high crime rates, amid the steady increase of population growth rates. In addition, climate change threatens the global agricultural production, which may push the prices of food and primary commodities, thus increasing inflation rates and dampening the purchasing power and consumption. In addition, the increasing demand for energy for cooling and heating purposes to cope with climate change will inevitably increase the costs of energy and further raise the inflation rates. Climate change also impacts the tourism sector in some countries, as the attractiveness of tourist destinations largely influenced by the climate, which will lead to diminishing returns from this sector in many countries worldwide.

It is noteworthy that the global warming will be more severe for developing countries economies, as the World Bank estimates indicate that developing countries will endure around 75-80% of the losses arising from climate change. Even two degrees rise in the global temperature, compared to the pre-industrial levels could decline the GDP by around 3-4% in Africa and South Asia, and by 1% in developed countries.

7-4 THE CLIMATE CHANGE IMPLICATIONS FOR FINANCIAL STABILITY

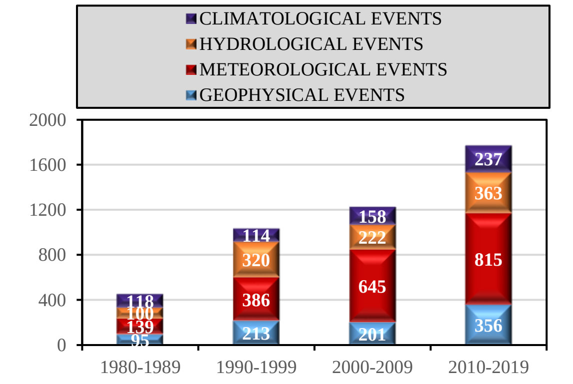
With regard to the implications of climate change on the financial sector, and as managing these risks are essential to contribute to achieving financial stability, the IMF classified the climate-related risks into two main categories:

- Physical risk.
- Transition Risk.

7-4-1 PHYSICAL RISKS

These are the risks associated with the climate changes that lead to natural disasters adversely affecting properties, assets, and infrastructures, which will impact public finance, individuals, companies, banks, financial institutions, and insurance companies. Estimates of the Financial Stability Board for 2020 indicate that losses due to damages related to climate change and natural disasters have amplified recently (Figure 7-1).

FIGURE 7-1: GLOBAL ECONOMIC LOSSES FROM NATURAL CATASTROPHE (USD Billion)



Source: the financial stability board Report 2020, The Implications of Climate Change for financial stability.
Climatological events: include long term changes such as raising earth's temperature and melting glaciers. The Meteorological events involve short term changes such as rain storms, drought, wildfires, or tornadoes. The Hydrological events include floods and avalanches, while the Geophysical events comprise of volcanos and earthquakes.

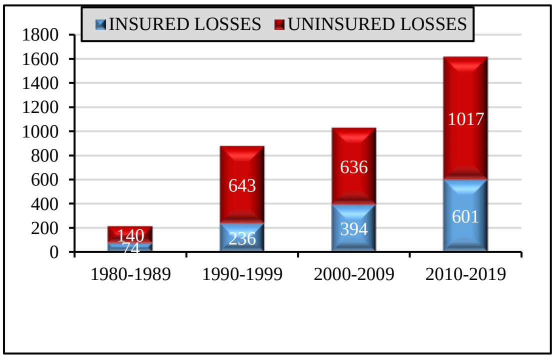
An accelerated increase in physical risks could increase market risks; the slowdown in economic growth is expected to negatively affect the performance of financial markets and decline the value of the assets of many financial and non-financial institutions. A study issued by London School of Economics in 2016, indicated that if the global temperature rises by two degrees Celsius by 2100, then around USD 1.7 trillion of financial assets will be at risk, and it is expected that the proportion of financial assets at risk will reach 0.5% of total financial assets, under the optimistic scenario, and will reach 17% according to the pessimistic scenario, which is equivalent to USD 24 trillion.

In addition, natural disasters directly affect individuals and companies, as the incurred losses and the decline in their profitability would dampen their ability to meet their obligations towards banks and other financial institutions, which will increase the NPLs in the financial sector and negatively affect the financial stability. For example, rising sea levels will lead to coastal erosion, losses to homeowners, and decrease the value of real estates, which increases the magnitude of risks in the real estate loans portfolio. On the other hand, the panic and uncertainty in the aftermath of natural disasters would increase deposits withdrawals from banks, exposing them to liquidity runs.

As for the insurance and reinsurance sector, although they endure the losses resulting from natural disasters as they are based on hedging against risks, the accelerated increase in accidents resulting from climate change may weaken the capability of this sector to cover some losses, which would amplify the negative effects of natural disasters. In the long term, it is expected that the cost of insurance will rise, some risks will be uncovered by insurance companies, and some companies will be reluctant to provide their services in areas prone to these risks.

According to the estimates of the Global Financial Stability Board for 2020, the losses in assets resulting from climate change during the period (1980-1989) reached to USD 214 billion, while it increased to USD 1,618 billion during the period (2010-2019). As for the losses insured by insurance companies, they reached to 37.1% of total asset losses resulting from climate change during the period between 2010-2019; the total losses of insured assets amounted to about USD 601 billion, compared to USD 1,017 billion for uninsured losses during the same period (Figure 7-2). At the continents level, Asia ranked first in terms of the assets losses arising from climate change, which reached to USD 65.9 billion in 2019, followed by North America with USD 45.3 billion losses, and Europe with losses amounting to USD 13.6 billion. The lowest losses recorded in Australia-Oceania and Africa, with losses amounted to USD 4.1 billion, and USD 5.3 billion, respectively (Figure 7-2).

FIGURE 7-2: GLOBAL INSURED AND UNINSURED LOSSES (USD BILLION)

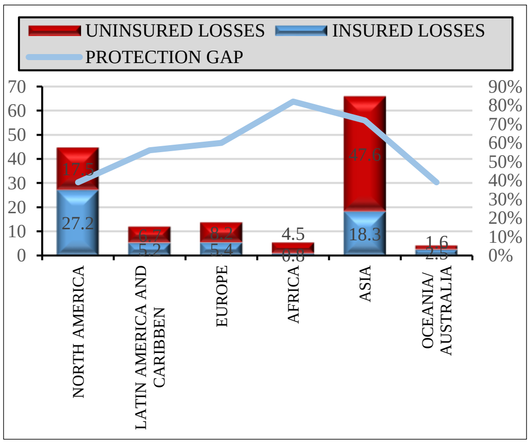


Source: the financial stability board Report 2020, The Implications of Climate Change for financial stability.

In terms of the protection gap (uninsured financial losses to total financial losses), Africa ranked first with 82%, followed by Asia with

72%, while the lowest ratio was recorded in Australia-Oceania with 39%. (Figure 7-3).

FIGURE 7-3: GLOBAL INSURED AND UNINSURED LOSSES AND PROTECTION GAP RESULTED FROM CLIMATE CHANGE (2019)



Source: the financial stability board Report 2020, The Implications of Climate Change for financial stability.

7-4-2 TRANSITION RISK

The risks associated with losses incurred when shifting from a carbon-intensive economy to a low-carbon economy or more Eco-sustainable economy.

The transition risk entails that several operating companies using traditional energy methods are exposed to a significant decline in the value of their financial assets in the future, as several countries are adopting tax policies intended to warding off companies' environmental violations and contributing to increasing innovation, which affects the evaluation of carbon-intensive businesses and mark down the value of these companies' assets, as their prices must reflect the health and environmental costs incurred.

In light of the increasing of the frequency and severity of the negative repercussions of climate change, many global central banks have tended to consider these risks within their macro-prudential policies, as the risks associated with climate change are part of the systemic risks. They also are obligating financial institutions to include climate-related risks scenarios in stress testing, to measure their ability and soundness to withstand these shocks, as the magnitude of risks arising from climate change and environmental factors are threatening financial stability.

Adopting proactive policies to cut harmful emissions, while considering the physical risks and transition risks, is definitely less costly than continuing to endure the consequences of global warming. This requires concerted international efforts to contain these risks, in addition to raising awareness about these risks and natural disasters, as well as the adoption of governments and central banks for policies of disaster management that take into account the risks of climate change.

7-5 THE CBJ'S EFFORTS TO MITIGATE CLIMATE CHANGE RISKS

Early at the beginning, the CBJ realized the importance of preserving the environment and encouraging renewable energy in light of the economic challenges facing the Jordanian economy, represented in the scarcity of natural resources and demographic imbalances. The CBJ included the renewable energy sector (which includes solar energy, wind energy, and energy saving projects) within its JD 1.3 billion program to support and finance the economic sectors in 2013. This program aims to provide the necessary financing for renewable energy projects at affordable costs and enhanced terms. The CBJ believes in the importance of this sector in preserving the environment, as well as promoting the use of clean energy in Jordan, which will contribute to reducing greenhouse gas emissions, and supporting the transition towards a better future for renewable energy as a part of the strategy to confront climate change.

7-6 THE CBJ'S EFFORTS TO STRENGTHEN GREEN FINANCE AND CLIMATE CHANGE RISKS MANAGEMENT

As part of the CBJ's endeavors to ward off the systemic risks of climate change and their impact on financial stability, as well as to keep abreast of the latest practices in green finance, the CBJ embarked the formulation of a strategy to promote green finance in coordination and partnership with the banking and financial sector and other related stakeholders in the public and private sectors, under the support and sponsorship of the World Bank Group, and within an integrated framework of other national efforts in this regard, in particular the Green Growth National Action Plan in Jordan (2021-2025). This strategy will serve as a roadmap to enable the CBJ and the financial sector to promote green finance and reduce the risks of climate change.

The strategy outline has recently been finalized; it will cover the banking sector, insurance companies, and MFIs, and will include the following strands:

- An overview of the risks and opportunities related to climate change in Jordan and how they are interrelated to the CBJ, financial institutions, and the local economy.
- The main scope and objectives of the strategy, as well as the CBJ's mission and vision of greening the financial sector in Jordan.
- A roadmap for greening the financial sector in Jordan, based on an integrated set of key milestones, attainable action plans, and key performance indicators.
- The main and required topics to enable the successful implementation of the road map mentioned earlier, such as building capacities in this field, providing the necessary data to manage the risks of climate change, and promoting green finance.
- Monitor and evaluate the progress of the optimal implementation of the strategy.

7-6-1 INTERNATIONAL AND REGIONAL INITIATIVES TO SUPPORT GREEN FINANCE AND CLIMATE CHANGE RISKS MANAGEMENT

On 26/10/2021, the CBJ joined the Network of Central Banks and Supervisors for Greening the Financial System (NGFS) after the CBJ's application was approved by the network, with the consent of all its members. This alliance aims to enhance the global response required to achieve the goals of Paris and Glasgow climate agreements, and to enhance the role of the financial system in managing the risks of climate change, as well as directing capital to green and low-carbon investments. To this end, the network is encouraging the adoption of international best practices in green finance, raising the awareness about climate change, in addition to conducting analytical studies and holding seminars and meetings periodically.

7-6-2 LAUNCHING THE GREEN FINANCE STRATEGY

On 2/6/2022, the CBJ in cooperation with the World Bank, organized an online event to launch the work on the strategy, in the presence of representatives from the CBJ, a team from the World Bank, in addition to representatives of the financial and banking sector, and government entities, and other relevant parties. The CBJ also held a workshop in cooperation with the World Bank Group to discuss issues related to the development of the strategy in detail, during which dialogue sessions were held with representatives of the financial sector (banks, insurance companies, and MFIs), as well as representatives of relevant government entities. They discussed the opportunities and challenges associated with climate change risks, green finance, and formulation of the strategy.

7-7 CONCLUSION

The risks of climate change gained increasing international attention due to their negative repercussions on economic and financial stability in the world. Several central banks worldwide are including climate-related risks as part of their systemic risks and adapting their prudential policies to deal with these risks and reduce their implications on financial stability. The CBJ embarked on a number of measures, in line with the latest international practices, to reduce the risks of climate change and promote green finance to achieve an Eco-friendly economy.