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Floating Exchange Rate Regimes and Macroeconomic Indicators: Evidence from Mena Region and Outlook for the Moroccan Case

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ABSTRACT

Many emerging economies have significantly changed their economic policies by adopting floating exchange rate regimes. In this sense, we examine their effect on the Middle East North African (MENA) region, and based on similarities and differences in macroeconomic structure and fundamentals, the potential effect on the Moroccan economy would be projected. The study provides an overview of the MENA region's experience with exchange rate regimes, looking at their historical development and effects on regional economic stability and growth. If the adoption of floating exchange rate regimes for the emerging economies in the MENA region has benefits including enhanced flexibility, decreased vulnerability to external shocks, and increased competitiveness; however, the considered countries recognize difficulties in setting them up and running them, as well as the requirement for supportive policy measures. This paper underlines the significance of additional research to examine the effects of floating exchange rate regimes on other MENA economies, mainly Morocco, and to determine the most efficient policy measures to maximize the advantages of this regime.

Introduction

The MENA region is known for its dynamic economic landscape, shaped by many factors such as oil production, geopolitical tensions, and diverse economic structures. Within this complex context, exchange rate regimes, including fixed pegs, managed floats, and flexible exchange rates, have emerged as critical economic stability and growth determinants for these countries. Jbili and

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Kramarenko (2003) state that understanding the background and implications of exchange rate regimes in the MENA region is vital for policymakers and economists alike. Edwards (2019) points out that many nations in the region have opted for fixed exchange rate regimes, which come with low volatility and low inflation levels, to maintain stability, facilitate international trade, and attract foreign investments. Yet, global economic shifts and changing market dynamics have always led to a permanent reevaluation of exchange rate policies in the MENA region. Obstfeld and Rogoff (1996) emphasize that a cogent and effectively implemented exchange rate regime can help countries absorb external shocks, secure price stability, strengthen export competitiveness, attract foreign direct investment, and encourage economic diversification. Conversely, inappropriate exchange rate policies can lead to macroeconomic imbalances and put the country through many crises. As an example, exchange rate policies in Egypt, Turkey, and Tunisia, which we aim to analyze in this paper, have undergone significant developments and challenges in recent years, shaping their respective economic landscapes under different macroeconomic fundamentals.

Morocco, located on the western edge of the MENA region, has been actively considering a transition from its current managed float exchange rate regime towards a more flexible floating exchange rate system. This potential shift has garnered significant interest and necessitates a comprehensive analysis of its implications for Morocco's economy. Khan et al. (2017) highlight the importance of studying the impact of exchange rate regimes on economic stability and growth in the MENA region. By allowing market forces to determine the value of its currency, a floating exchange rate regime holds the potential to enhance Morocco's economic resilience, ensure price stability, encourage export diversification, attract foreign investment, and promote overall economic growth. However, it also presents challenges such as increased exchange rate volatility and the need for effective monetary policy management, as mentioned by Kumar (2022). Therefore, this research article examines the potential benefits and challenges associated with adopting a floating exchange rate regime in Morocco while providing insights into the implications for the MENA region. By analyzing the case of shifting to a flexible exchange rate regime in Turkey, Egypt, and Tunisia as a MENA region benchmark, the historical path and implications of floating on their economic situation, this study seeks to contribute to the ongoing discourse on exchange rate regimes and offer valuable insights into the implications of a flexible exchange rate regime on the Moroccan economy.

To meet these objectives, we would start with a brief background of fixed and floating exchange regime definitions while emphasizing the benefits and challenges of floating ones. The following section would be an overview of exchange rate regimes in the MENA region, where we will analyze the case of Egypt, Turkey, and Tunisia when they shifted to floating exchange rate regimes while shedding light on the fundamental factors influencing the adoption of floating exchange rate regimes. Based on those factors, we would project the potential impact of the floating exchange rate regime on the Moroccan economy after briefly iterating the evolution of exchange rate policy in the nation. Lastly, we aim to point out the potential challenges to face and highlight some recommendations for policymakers during this shifting period.

Taxonomy of exchange rate regimes

According to The International Monetary Fund (IMF) in its annual report on exchange arrangements and exchange restrictions, there are three main categories of exchange rate regimes:

1. Fixed pegs: Give legal tender status to another country's currency (full dollarization) or require the central bank to hold foreign assets in an amount at least equivalent to the local currency in circulation and bank reserves. A tight peg goes hand in hand with sound fiscal and structural policies and low inflation.

2. Soft pegs: Currencies that maintain a stable value relative to an anchor or composite currency unit. The exchange rate may be pegged to the anchor currency over a tight or wide band; in certain instances, the peg varies over time, often in response to variations in inflation rates across countries.
   - Crawl-like arrangements
   - Stabilized arrangements
   - Conventional pegs
   - Pegged exchange rates within horizontal bands.

3. Floating: As the name implies, the floating rate is a market-driven system. In countries with this regime, the central bank acts (buying or selling currency against the local currency) mainly to restrict short-term fluctuations in the exchange rate. Almost all advanced economies have floating regimes, as do most emerging market economies.

Floating exchange rate regimes offer several benefits but also have certain challenges, as shown in Table 1.

Table 1.

Synthesized table of benefits and challenges of floating exchange rate regimes

Benefits	Challenges
Absorbing external shocks: By allowing automatic adjustments in response to external shocks, such as changes in international trade patterns or fluctuations in capital flows, the currency's value is permitted to adjust freely, thus reducing the impact on the domestic economy.	**Exchange rate volatility:** frequent fluctuations in currency values can create uncertainty for businesses operating in international trade, making it challenging to plan and budget effectively. This volatility can also affect investors' confidence and lead to capital outflows during high periods of uncertainty.
Enhanced competitiveness: when a currency depreciates, exports become relatively cheaper, which increases demand for domestically produced goods and services, which stimulates export-oriented industries, boosts economic growth, and creates more jobs	**External imbalances:** a long period of depreciation can increase the cost of imports, potentially driving up inflationary pressures and lowering the purchasing power of the population. This can also widen trade deficits, potentially pressuring a country's current account balance.

Monetary policy autonomy: the central bank can freely adjust interest rates and implement monetary measures to manage domestic economic conditions. This flexibility permits more effective monetary policy responses to domestic inflationary pressures or economic imbalances.	**Speculative movements:** speculators can arbitrage short-term fluctuations in exchange rates, leading to increased volatility and potential instability of currency values. Central banks must monitor such speculative activities to maintain stability and prevent excessive currency's fluctuations.
Market efficiency: floating exchange rates reflect market forces, referring to supply and demand dynamics, investor sentiment, and economic fundamentals. Consequently, they tend to align more closely with a country's economic fundamentals and market condition, which enhances market efficiency.	**Need for effective monetary policy management:** it includes monitoring inflation, interest rates, and capital flows, as well as coordinating fiscal policies to ensure an appropriate balance between domestic stability and external competitiveness.

In conclusion, while floating exchange rate regimes offer many benefits such as shock absorption, enhanced competitiveness, and increased policy flexibility, they undeniably present challenges related to exchange rate volatility, external imbalances, speculative movements, and the need for effective monetary policy management. Policymakers must carefully consider these factors when evaluating the suitability of a floating exchange rate regime for their respective countries.

Macroeconomic factors across Egypt, Tunisia, Turkey, and Morocco

Before going into the qualitative analysis, we will give the state of the macroeconomic factors in each country, and based on which, we will make a comparison of impacts on macroeconomic indicators:

Economic model

Morocco, as well as Egypt, have a mixed market-oriented economy, with the government playing a significant role in the economy through state-owned enterprises and intervention in key sectors such as energy, transportation, and telecommunications. Tunisia, on the other hand, has a social market economy, with a strong welfare state and a large public sector but with a growing private sector. Turkey, meanwhile, has a mixture of market and state-led economy, with state-owned enterprises playing a significant role in the economy and the government playing an active role in promoting investment and growth.

Economic fundamentals

All four countries have experienced steady growth in recent years, with Morocco and Tunisia having relatively low inflation and stable currencies, while Turkey has experienced higher inflation and currency volatility, followed by Egypt with moderate inflation. Morocco and Tunisia also have relatively low debt-to-GDP ratios, while Turkey and Egypt have higher debt-to-GDP ratios.

Diversification

Morocco has tried to diversify its economy away from agriculture and into automotive, aerospace, and renewable energy industries. Tunisia and Egypt have relatively diverse economies, with strong manufacturing and growing service sectors. Turkey has a well-diversified economy with a strong manufacturing sector and a growing service sector and has also made efforts to develop its technology sector in recent years. Egypt has also made efforts to develop its tourism sector in recent years.

Autonomy

All three countries have some level of dependence on foreign trade and investment, but Morocco and Tunisia are more dependent on these factors compared to Turkey, which has a more autonomous economy. Morocco and Tunisia are both heavily dependent on exports and remittances from abroad, while Turkey has a more diversified economy with a strong domestic market. Egypt is moderately dependent on foreign trade and investment but has a more autonomous economy than Morocco and Tunisia. The country has a diversified economy with a strong domestic market and has made efforts to reduce its dependence on imports and increase its exports.

Openness of the economy

All four countries have made efforts to open their economies to foreign investment, with Morocco and Egypt being particularly successful in attracting foreign direct investment (FDI) and portfolio investment. Tunisia has also made progress in attracting FDI, but Turkey has experienced some challenges in attracting investment due to political and economic uncertainty. Morocco, Tunisia, and Egypt have both implemented reforms to improve the business environment and make it easier for foreign companies to invest, while Turkey has made efforts to streamline regulations and improve the investment climate.

Upgrading of economic agents

All four countries have made efforts to modernize and improve the competitiveness of their firms, but Morocco, Egypt, and Tunisia have made more progress in this area compared to Turkey. Morocco and Egypt has implemented reforms to improve the education system and provide more training and support for businesses, while Tunisia has implemented reforms to improve the business environment and make it easier for firms to access finance. Turkey, similar to Egypt, has made efforts to improve the competitiveness of its firms but has faced challenges in implementing reforms due to political and economic uncertainty.

Speed of liberalization

Morocco has been the fastest in implementing market-oriented reforms and liberalizing its economy, followed by Tunisia and then Turkey. Morocco has implemented a series of reforms to liberalize its economy, including reducing trade barriers, deregulating industries, and privatizing state-owned enterprises. Tunisia has also implemented reforms in this sense but at a slower pace compared to Morocco. While making the same efforts, Turkey has faced challenges implementing reforms due to political and economic uncertainty. Egypt has implemented market-oriented reforms and liberalized its economy at a moderate pace, slower than Morocco but faster than Tunisia and Turkey. The country has implemented a series of reforms to liberalize its economy, including reducing trade barriers, deregulating industries, and privatizing state-owned enterprises, but has faced challenges in implementing reforms due to political and economic uncertainty.

Evolution of exchange rate regimes in MENA region: benchmark analysis

Since the financial crisis, many MENA region countries have been widening their liberalization trade and opening up their financial systems to diverse external markets. As a result, various exchange rate regimes have been employed over time, including fixed pegs, managed floats, and, more recently, flexible exchange rates. Historically, many countries in the region have favored fixed exchange rate regimes to maintain stability, facilitate international trade, and attract foreign investments, but also because of the fear of floating. Hence, global economic shifts and changing market dynamics have prompted a continuous reconsideration of exchange rate policies in the MENA region.

For so, we will study their shift from a fixed peg to a more flexible or floating regime and its impact on their economy. This benchmark would help us project the impact of a floating exchange rate regime on Morocco's economy, iterate the potential challenges policymakers could face, and we would try to give some recommendations.

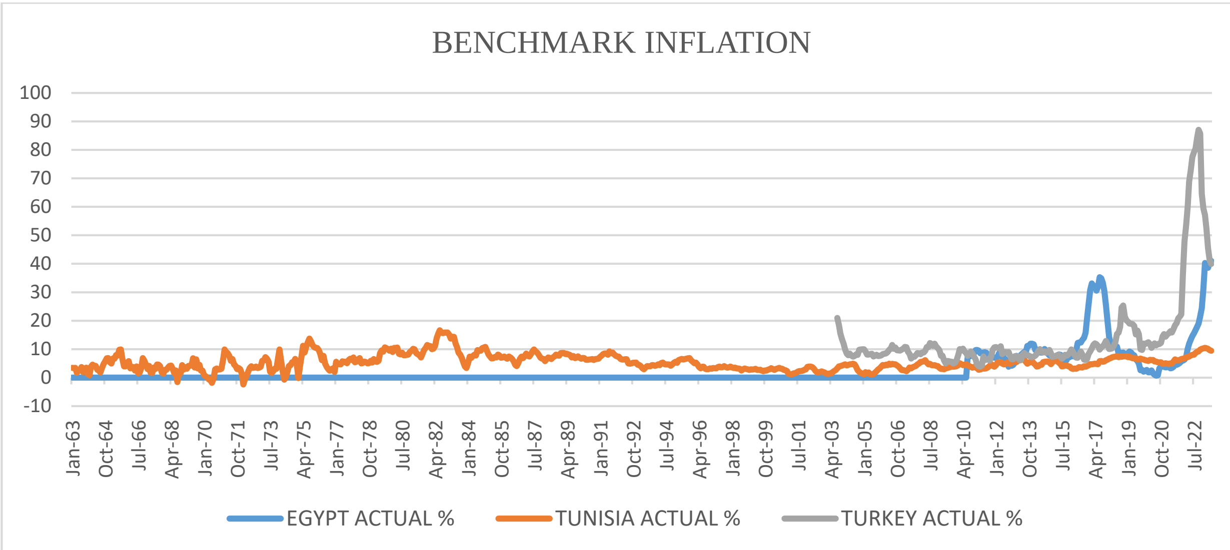
The following macroeconomic indicators for all three countries are analyzed to highlight the reasons behind the similarities but also their disparities:

Inflation

Tunisia faced a reversed case scenario with less volatility, less net foreign assets (NFA), and more net domestic assets (NDA), which left room to think about a more flexible exchange rate regime to manage economic pressures. Since 2018, Tunisia operated under a managed exchange rate regime with the central bank's interventions to control inflation and stabilize the economy. After the Covid crisis in late 2018 and the Russo-Ukrainian conflict in 2020, inflation skyrocketed for all three countries. Yet, Tunisia had inflation under control for several years, even within the uprising spring revolution of 2011, confirming the study of Sokolov et al. (2011), which concludes that countries under fear of floating policy have the lowest inflation volatility.

Unlikely for Egypt, since its rebounding reform program in collaboration with the IMF in November 2016 to switch to a floating exchange rate regime, inflation rates reached their peaks due to the Egyptian pound devaluation (EP) (40% in February 2023) (Cf. Central bank of Egypt), which increased external debt. It also happened in 2019, within the same agreement on a three-year Extended Fund Facility (EFF), where the EP continuously devaluated to reach its highest peak in June 2023. It may go even higher with the following debt coming up in late 2023, as illustrated in Figure 1.

Figure 1.
Benchmark inflation



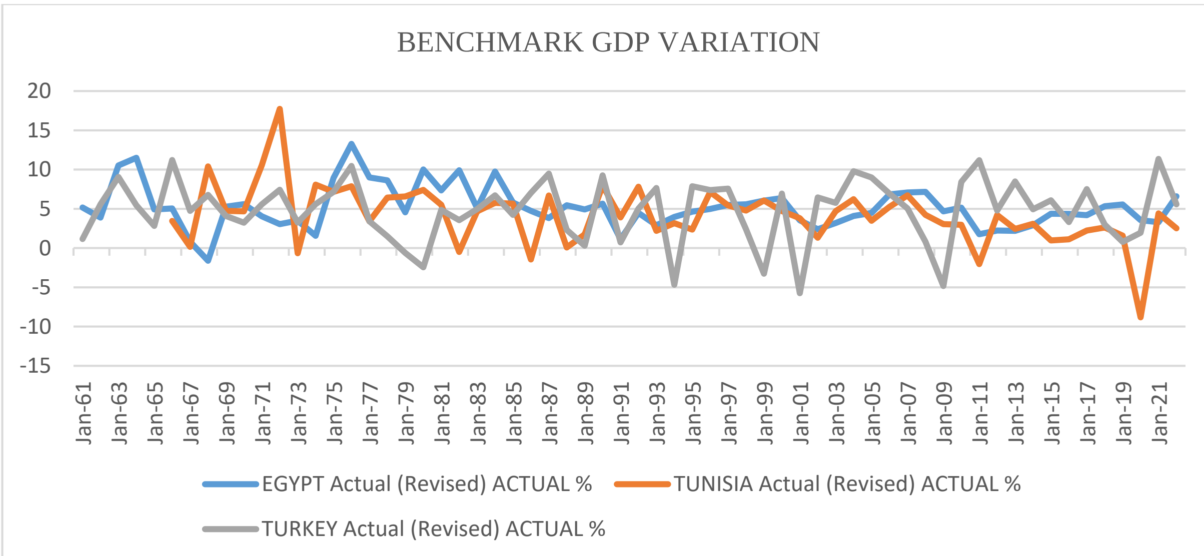
Source: Official Central Banks websites

As for Turkey, since the Turkish lira (TRY) crisis in 2018, it has experienced the highest variation of inflation because of its different monetary policies of cutting interest rates, preventing the TRY from recovering and reaching an inflation peak of 85% in November 2022 (Cf. Central bank of the Republic of Turkey). Not increasing interest rates made the debt costs higher, inflation higher, and asset quality lower and less attractive to foreign investors even though the banks are strong and economic trades are good. Inflation started decreasing after the central bank decided to raise interest rates for the currency to appreciate and gain back investor's confidence. In August 2023, it sharply increased rates by 25%, yet the TRY is still in its historical lows. Turkey's case confirms what Sokolov et al. stated in their study in 2011: Countries with matched floats witness the highest inflation rates.

Economic growth: gross domestic product (GDP)

Because of their important external debt to GDP ratio, it is hard for emerging markets to mark positive GDP variations over the years, especially for Tunisia. Yet we can notice that Egypt, thanks to its driving exporting sectors, tourism, and manufacturing sectors, has made positive variations despite rising inflation. As for Turkey, GDP has been decreasing because of the continuous TRY depreciation, leading to higher debt costs weighing on economic growth. Exports rose in 2021 amid COVID-19, making GDP increase, but it soon fell back in 2022 due to higher food prices, transport costs, and TRY reaching historical lows (See Figure 2). Yet it is still the country making the highest GDP variations in the benchmark due to lower interest rates for companies in order to help their businesses persevere and grow, especially the industrial sector (31% GDP) (C.f World Bank). After devaluating its currency in 1961, the Turkish GDP lowered to 3,78% before going up to one of its highest points, 11,50%, in 1964. After the oil crisis, Egyptian GDP reached its highest level in 1974 (13,27%) (Cf. World Bank) despite the different economic challenges during that period. In 1991, after switching to a managed floating regime, foreign reserves increased, but the GDP decreased to 1%, one of its lowest points. Floating its currency in 2016 did not really have a palpable impact on the economic growth that year.

Figure 2.
Benchmark GDP variation



Source: World Bank WDI

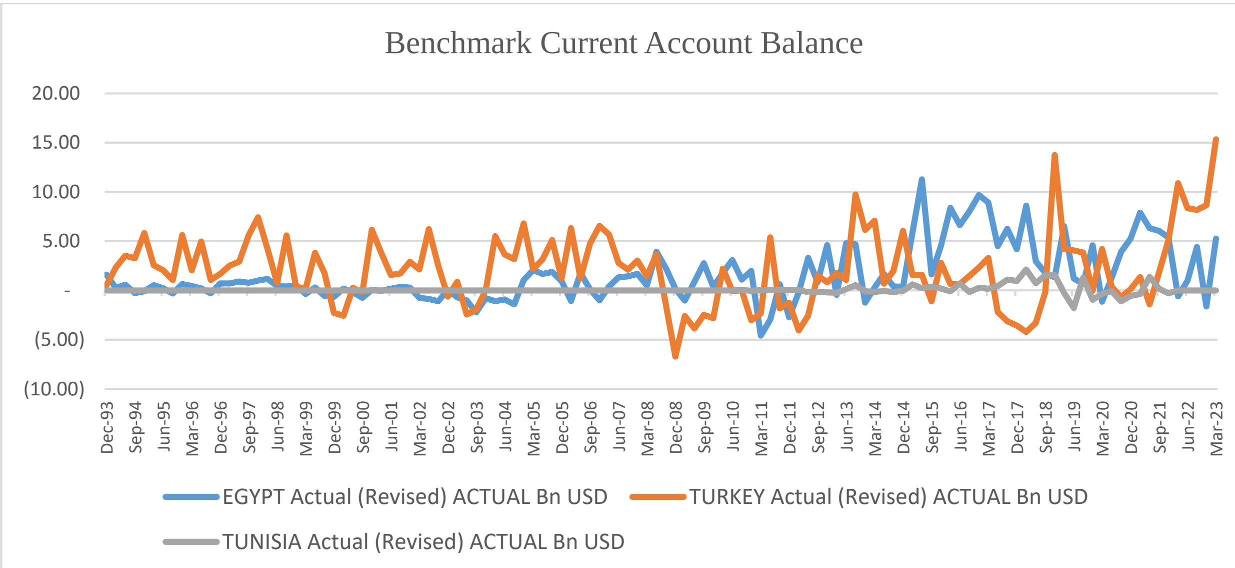
As for all countries, due to the pandemic in 2019, GDP levels lowered and started recovering in 2021 after opening the borders. Many development efforts were made to diversify the economy and become less dependable on services, which represent more than 50% of GDP contribution. Tukey's and Egypt's cases confirm what Sokolov et al. (2011) stated in their study: countries with matched float witness the lowest GDP volatility.

Current account balance

The current account balance in Turkey has sharply increased over the years, reaching its peak in 2018 due to increasing costs of external debts caused by the continuous depreciation of the Turkish Lira and more loans from the IMF and World Bank to sustain the Lira's value. Cutting interest rates is supported by the new economic team of Erdogan, who is making new decisions yet the lira has plunged too deep to recover too quickly. For Egypt, it witnesses a peak of its current account balance each time a loan from the IMF hits the balance, not due to exports increasing (which makes a part of it) but mainly from foreign aids. As for Tunisia, the current account balance has been decreasing over the last couple of years, as a sign of paying off its external debt but less attractiveness of climate business, which makes it hard for the country to keep net foreign assets in. After the Arab Spring uprising in 2011, the current account balance witnessed a free fall of its value where the trade decreased, and economic growth slowed down. Yet the variations of the Tunisian current account balance are sharp from year to year since then, interpreted by its dependence on investments and foreign trades. The Tunisian exchange rate regime being a peg confirms the results of Ostry and Ghosh (2009) about the debt crisis and sudden stop in capital inflows. As for the covid-19 crisis period, it is normal to witness a balance decrease because of the global economy's slowdown. The information is illustrated in Figure 3.

Figure 3.

Benchmark current account balance



Source: Central Banks/World Bank WDI

External debt

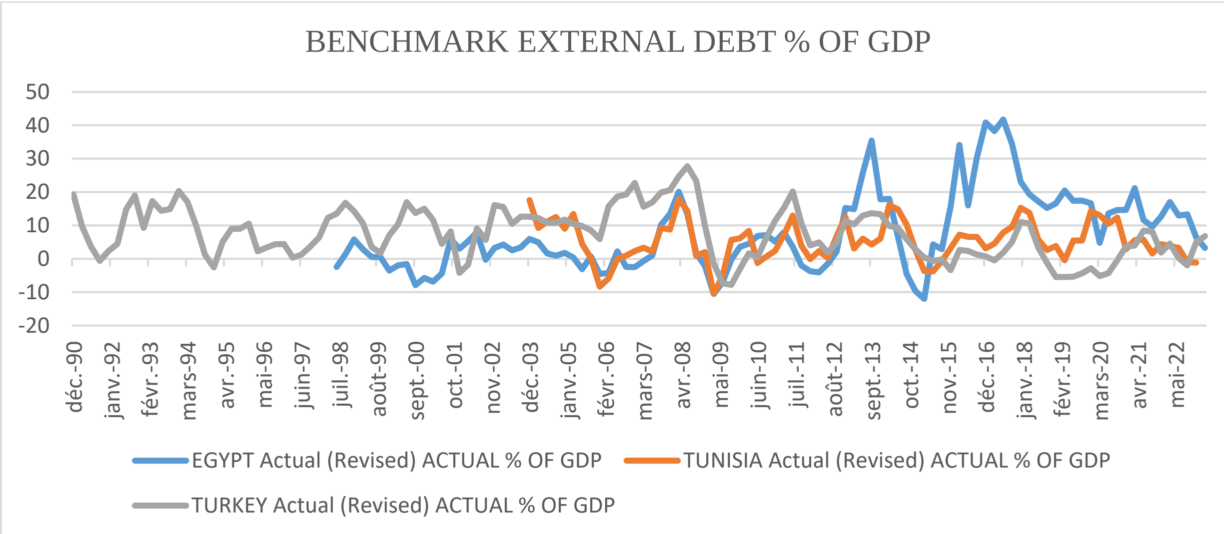
We notice that Turkey has had a significant increase in its external debt due to the TRY depreciation since the lira crisis in 2018, and it has continuously increased since the COVID-19 pandemic, making it harder for the currency to gain value. This analysis goes along with Neaime's study done in 2009: a flexible exchange rate regime is associated with higher levels of external debt sustainability in the MENA region, and countries with a higher level of external debt relative to GDP are more likely to experience debt distress.

Concerning Egypt, it peaked when it went fully floating in November 2016, with the IMF loan to escape the crisis. Later, it started to variate depending on the EP variations as well as the punctual loans from the IFM within the EFF reform program; in January 2023, when inflation peaked in Egypt after getting the newest loan from the IMF of 3 billion dollars agreement, which would eventually lead to an increase of external debt by the end of 2023.

Tunisia's debt sustainability has been a concern at various points due to its debt-to-GDP ratio and servicing costs. It faced challenges due to economic volatility, political transitions, and regional instability. Before 2011, Tunisia went from a fixed exchange rate regime to a managed floating regime, where the debt was unstable and kept being solicited from foreign aid to sustain the dinar value over this period. Moreover, the Arab Spring uprising in 2011 led to economic disruptions and challenges, impacting Tunisia's debt dynamics till today.

Figure 4.

Benchmark total external debt



Sources: Central Banks/World Bank/Refinitiv/IMF

Foreign reserves

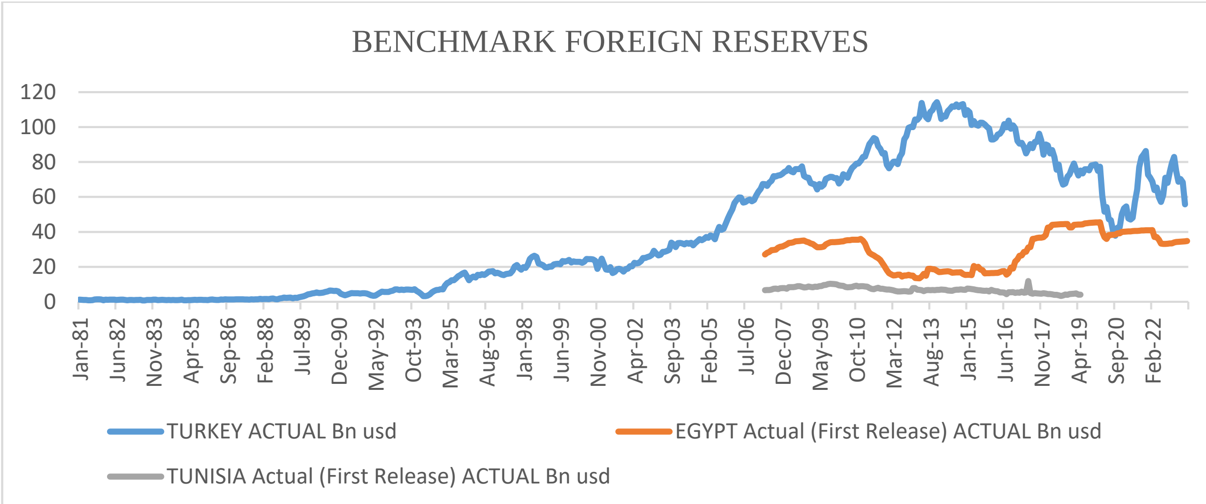
Due to currencies' volatility and instability of business climate in emerging markets after floating their exchange rate regimes, we notice a drop in foreign reserves because, first, foreign assets are used to pay off external debt, which over time increases due to currency's depreciation. And second, investors are skeptical of investing in such an unstable climate where bureaucracy is still a burden, the legal framework is not consistent, the currency is very volatile, limited access to small businesses, and sometimes time-consuming trade barriers. Moreover, we can explain that decrease with the Hot Money issue, when economic agents invest for only a short period of time to benefit from the interest rate increase in those countries; consequently, the sustainability of those inflows is not permanent. As opposed to Egypt, foreign reserves in Tunisia are decreasing over time, which can reflect the decrease of foreign assets in the country and the use of them by CBT to ensure stability and reduce the excessive decrease of its domestic currency. It also reflects a lack of confidence in the market environment, which leads to investments, which means more net outflows than net inflows of foreign assets. Figure 5 shows the foreign reserves benchmark.

Foreign direct investments

This chart is an illustration of what was said earlier about the lack of confidence in a market environment; the business climate is not attractive enough for investors as much as in Egypt, Turkey or Morocco, so we can easily notice less and less foreign direct investments in Tunisia which makes it hard for the country to increase its foreign reserves. As for Egypt, it first decreased after the decision of floating in 2016, which reflected the skeptical sentiments of investors.

Figure 5.

Benchmark foreign reserves

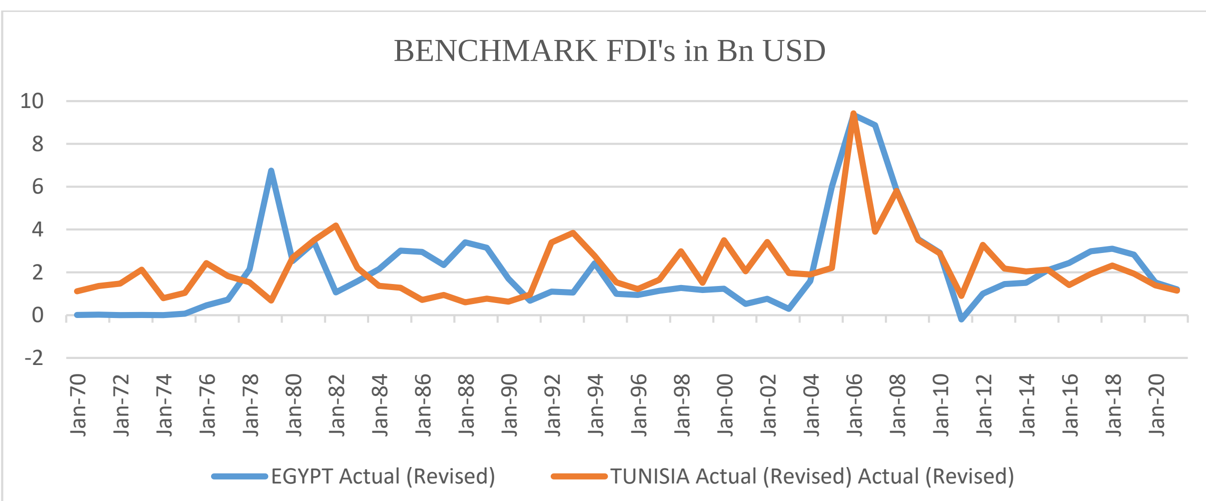


Source: Central Banks/IMF

However, starting in 2017, it started increasing significantly. Of course, when the COVID-19 crisis and the Russo-Ukrainian conflict occurred, it decreased, but right after that, the increasing momentum saw the light once again, confirming the study of Bouoiyour and Rey (2005). Indeed, floating exchange rate regimes in emerging economies can help improve investments under a positive and attractive business climate.

Figure 6.

Benchmark FDI's



Source: World Bank

These results are confirmed by Obstfeld et al. (2019) study, stating that emerging economies are strongly affected by financial shocks, especially under a fixed regime, which leads to less FDIs and other important capital inflows. However, under flexible exchange rate regimes, the effect is less damaging in terms of economic and financial growth.

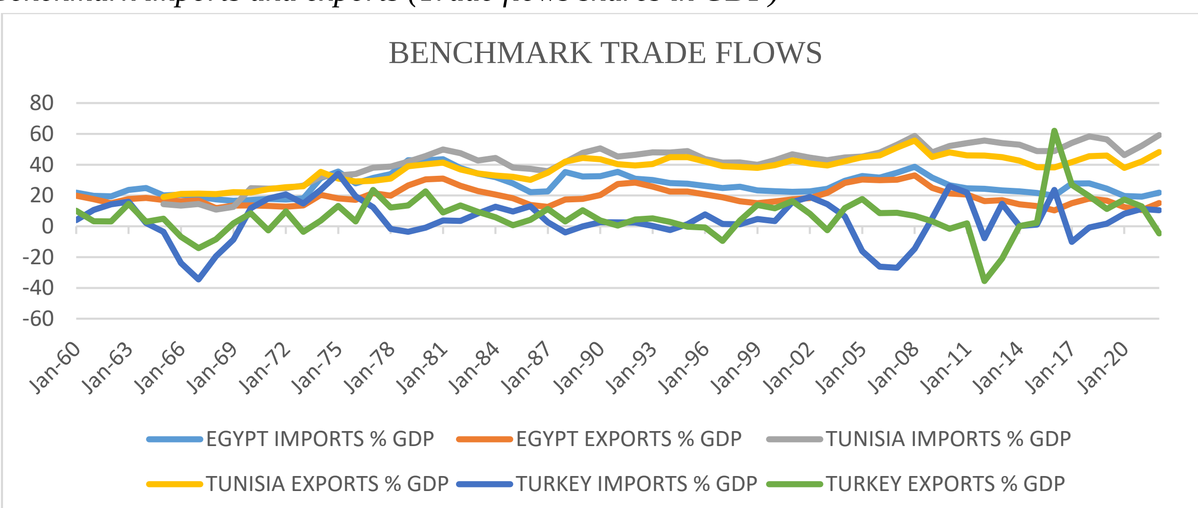
Trade balance

As with any emerging country, the trade balance is by default in deficit, and it witnesses a spike during times of crisis (After the Israeli war in 1974, the 2008 crisis, Arab Spring 2011, the Lira crisis in 2018, etc.). The more devaluated the currency is, the bigger the imports' share in GDP. Therefore, exports become more competitive; as stated by Bouoiyour and Rey in 2005, floating regimes help improve trade. Yet, it is always less important than imports due to exchange rate variations impacting commodities and food prices. The trade balance decrease in recent years is mainly due to a slowdown of economic growth because of Covid-19. After the devaluation of EP this year, we may also witness a decrease in the trade balance for 2023. It is the same case scenario for the Tunisian trade balance.

As Brixiova, Egert, and Hadj Amor Essid stated in 2014, a depreciation of the real exchange rate leads to an improvement in the trade balance and external competitiveness in the short term, as we noticed for all three countries. Bilgili et al. (2019) shared the same opinion in their study made in 2019, which focused on Turkey's competitiveness, where the volatility of floating regimes helped boost Turkish exports. However, Brixiova et al. (2014) found that it may lead to a deterioration in competitiveness due to the negative impact on productivity and efficiency in the long term, as shown in Figure 7.

Figure 7.

Benchmark imports and exports (Trade flows shares in GDP)



Source: World Bank

Being structurally an exporter country, a devaluation of the Turkish Lira helped the country's exports gain more competitiveness over the years and become less dependable on imports even at peak moments of inflation levels, which made domestic activity strive. But also due to foreign direct investments over the years thanks to the work done in infrastructure, having a large market considered a regional Hub between Europe and Asia, but also attractive for its young workforce that can be a good labor asset to attract foreign investors. Yet, at the beginning of 2023, we noticed an inversed case due to the sharp decrease of the lira's value in the market caused by several cuts in interest rates.

Overall, the success of the floating exchange rate regime depends on effective economic policies, the management of external shocks, and striking a balance between promoting export competitiveness and maintaining price stability, which is the case of Turkey. Despite the strength of banks, the good quality assets, and the good business culture, it has difficulty making its currency regain value because of inappropriate monetary policy decisions. Policymakers, for example, Erdogan's economic team, may need to implement measures to mitigate the challenges posed by exchange rate fluctuations and inflationary pressures.

As economic conditions and policies are subject to change, it is crucial to consult reputable financial sources and official reports for the most up-to-date information on the exchange rate regimes and their economic impacts in Egypt, Tunisia, and Turkey. In all three cases, the exchange rate regimes had implications for import and export competitiveness, inflationary pressures, foreign reserves, and overall economic stability. Each country faced its unique set of economic challenges, and the success of the exchange rate regime depended on effective policy coordination, structural reforms, and sound macroeconomic management.

For each country, maintaining economic stability and promoting sustainable growth required continuous monitoring, adjustment of exchange rate policies, and implementation of necessary structural reforms. The exchange rate is a crucial economic tool, and its management plays a significant role in shaping the economic landscape of a country. As economic conditions evolve, policymakers must adapt their exchange rate policies to achieve broader economic goals.

Morocco: road to more flexible exchange rate policy

From independence until the end of the Bretton Woods system in 1973, Morocco maintained a fixed parity with the French franc to determine the dirham's exchange rate against other foreign currencies. For this reason, from 1959 to 1969, this parity was set at 0.9756 francs to dirham, then at 1.09755 FRF to MAD on August 10th, 1969, following an 11.1% depreciation of the French currency against gold and the American dollar. Then, from 1973 onwards, a basket of 9 currencies in which the French franc always held the lion's share, to the detriment of the US dollar. This system was known as the Basket peg, and only nine countries, including Morocco, adopted it.

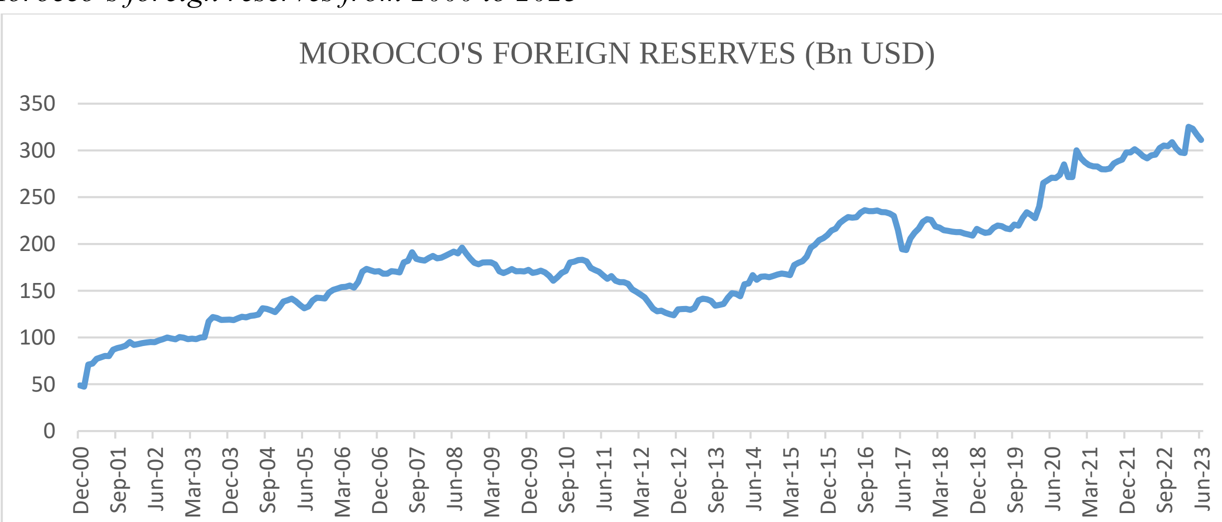
From 1980 to 1986, the Moroccan political exchange rate entered a new cycle divided into two phases (1980-83) and (1983-86), during which the dirham underwent value adjustments to compensate for the inflation differential between Morocco and its partners and to correct the overvaluation of the dirham's real price recorded at the end of the 1970s. In 1999, the European currencies in the basket were replaced by the single European currency, the EURO, which depreciated steadily against the dollar in its early days, prompting the Moroccan authorities to devalue the dirham once again to maintain the competitiveness of exports, the tourism sector and the positive trend in flows of Moroccans living abroad, and to encourage foreign investment flows. Bank Al Maghrib's revision of the basket on April 25, 2001, increasing the euro's participation to 80%, enabled the dirham to return to its real 1996 level after 2001. The currency basket contains the euro and the dollar, leaving the dollar with the remaining 20% according to this weighting.

As part of the reform of the exchange rate regime, and in order to achieve this gradual abandonment of the fixed parity, the authorities have requested technical assistance from several central banks to share their experience and expertise. Morocco, as a member country of the IMF, is seeking technical assistance from the IMF in a number of areas: monetary policy, financial stability, payment systems, modeling, financial inclusion, reserve management, etc. At present, the Moroccan dirham is pegged to the Euro and the US Dollar, with proportions that have changed over time, from respective weightings of 80% and 20%, respectively, to 60% and 40%. This strict determination of the exchange rate by BAM came to an end on January 15, 2018, when the exchange rate began to fluctuate within a band of 5% wide. This transition of the exchange rate regime is motivated, on the one hand, by the desire to boost the national economy, strengthen its international position, and encourage foreign investment. Secondly, the fixed exchange rate protects the Moroccan economy from external currency shocks. However, foreign exchange reserves alone suffer the damage and consequences of these shocks.

Since the financial crisis of 2007-2008, foreign exchange reserves have declined until 2014, when they began to improve thanks to new revisions to the exchange rate regime. However, we note that Bank Al-Maghrib's foreign exchange reserves fell by 5.8% from over 240 billion DH to 223 billion, covering only five months' imports of goods and services. As for the banks, their foreign exchange position fell from 11 billion MAD to 5.3 billion MAD. This situation seems worrying; however, bankers claim that it is reassuring and that the central bank's reserves will be less important than the foreign currency flows directed by local banks.

Figure 8.

Morocco's foreign reserves from 2000 to 2023



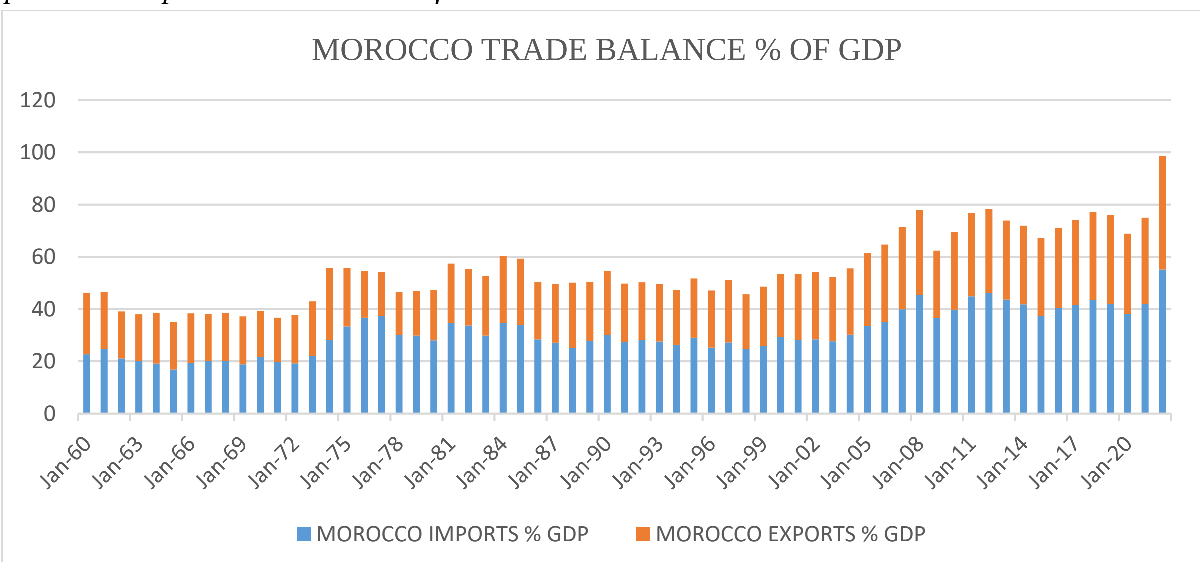
Source: Bank Al-Maghrib, Morocco

In the Moroccan case, the decision to make the exchange rate regime more flexible (or to switch to an intermediate regime) was taken to improve the current economic situation rather than to respond to major concerns disrupting the dynamics of the economy, as was the case in Turkey or Egypt. The aim is to relieve pressure on foreign exchange reserves and attract foreign investors.

As we notice here, foreign reserves in Morocco have increased through the years, even during the COVID-19 pandemic. The loans taken from the IMF started in December 2018 with the two-year Precautionary Liquidity Line (PLL) agreement of 2,97 Billion dollars. Then, in May 2020, The IMF provided Morocco with financial assistance through the Rapid Credit Facility (RCF). This was in response to the COVID-19 pandemic's economic impact. The financial assistance totaled roughly $3 billion. Yet the increase of foreign reserves is due to FDIs, since the macroeconomic climate in Morocco is stable, and tourism inflows amid Covid-19. An increase in foreign reserves is explained here by import cover in the country, and due to its monetary policy of progressive floating exchange rate regime in the country, it kept the investors confident in the market due to the controlled volatility of MAD. This, as stated by Jeanneney (2019), would, besides increasing the external debt, help get through transitional shocks.

Figure 9.

Imports and exports shares in GDP from 1960 to 2022



Source : Haut-Commissariat au plan, Morocco/Refinitiv

We note that imports clearly exceed the country's exports, which explains the structural deficit in the Moroccan trade balance, similar to Egypt and Tunisia, and its subsequent impact on the country's growth rate, but it should also be noted that inflation remains stable and under control, except during Crisis. Consequently, and with a view to boosting the country's economic growth, Morocco has embarked on a new, more flexible reform of the exchange rate regime. Yet, the more depreciated the currency, the more competitive the exports, as confirmed by Brixiova, Egert, and Hadj Amor Essid in 2014, but also the higher the import costs, especially the rising cost of oil and gas bills for all four countries, which leads us to a permanent deficit that can only be regulated by improving existing export sectors and developing new ones, by diversifying the manufacturing sector like Egypt and Turkey, but also improving labor productivity as underlined by Brixiova, Egert and Hadj Amor Essid in the same study, in order to maintain the competitiveness. If efforts are made in this sense, the positive impact on exports would be stronger during the shift period, as Bilgili et al. (2019) indicated.

As of January 15, 2018, the fixed parity system has been abandoned, and Morocco has officially adopted a more flexible, intermediate regime. The transition process to a more flexible exchange rate regime is gradual and orderly. It will be spread over several phases to enable the various market players to adapt to this change and support them in this transition. Of course, the transition from one phase to the next will depend on the satisfaction of a number of prerequisites. The first step would be to widen the dirham's fluctuation bands and see how the market reacts to this change. Secondly, the dirham's parity would be gradually defined by market forces, eliminating the need for it to be fixed and pegged to a basket of currencies, albeit with limited state intervention. Lastly, the dirham would be freely convertible, although, for the moment, no timetable has been set. Morocco currently adopts a floating regime with a fluctuation band of fluctuation band (10%). However, the national currency, the Moroccan dirham (MAD), is quoted on the basis of a basket made up of the two main international currencies, the euro and the US dollar. The weighting coefficients are calculated by referring to the importance of trade between Morocco and its main partners, hence the 60% for the EUR and 40% for the USD declared by Bank Al-Maghrib.

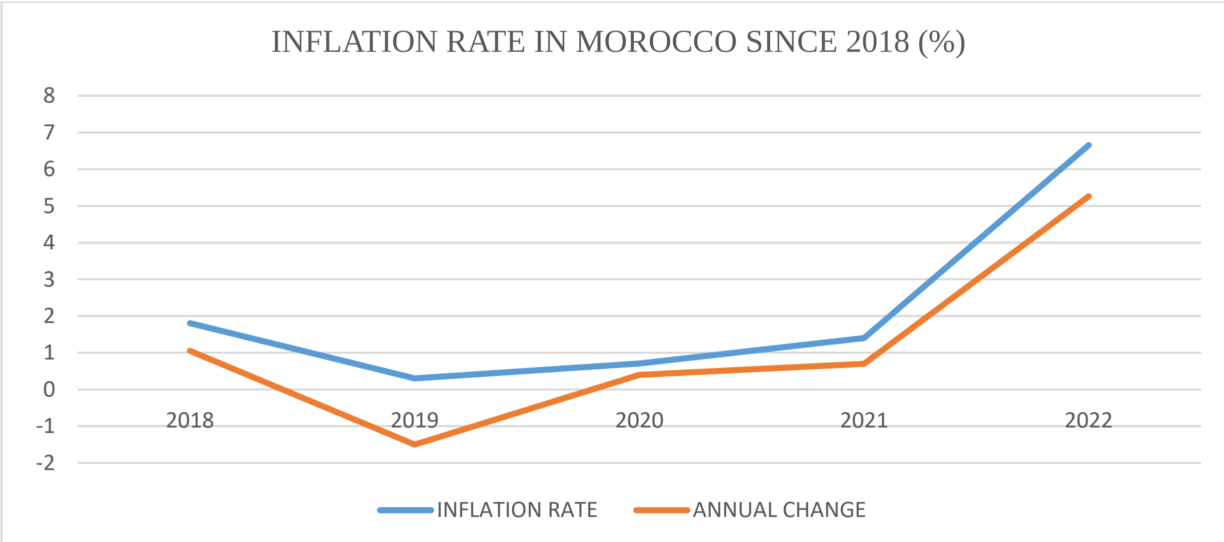
As we noted earlier and confirmed by Mezene and Echkoundi (2020) in their study, motivations for such a new exchange rate reform include:

- Improving the current economic situation;
- Easing pressure on foreign exchange reserves and attracting foreign investors;
- Supporting Morocco's opening up to the standards of the international economy and making its economic capital a true financial hub;
- Strengthening the national economy to ensure resilience to external shocks;
- Supporting the competitiveness of the national economy;

In order to verify whether Morocco has been able, through this MAD’s gradual flexibilization, to achieve these objectives in part or in full, we will analyze the economic data published by the official authorities since the launch of this new monetary policy and project to potential years next to the benchmark done earlier.

In the case of Morocco, inflation did not increase during 2018, as opposed to other countries, because even within new bands of fluctuations of the MAD, the market kept fluctuating within the old range. Thanks to important foreign reserves, the Moroccan dirham had appreciated within its first flexibilization, which pushed the IMF to encourage BKAM to widen the bands even more. A decision was made to face the pandemic external shock in March 2019. Since then, inflation has been increasing for all countries, not only emerging markets. And since we cannot neutralize the COVID-19 impact in this situation, we cannot conclude that rising inflation is due to a more flexible regime.

Figure 10.
Morocco's inflation rate and annual variations from 2018 to 2022



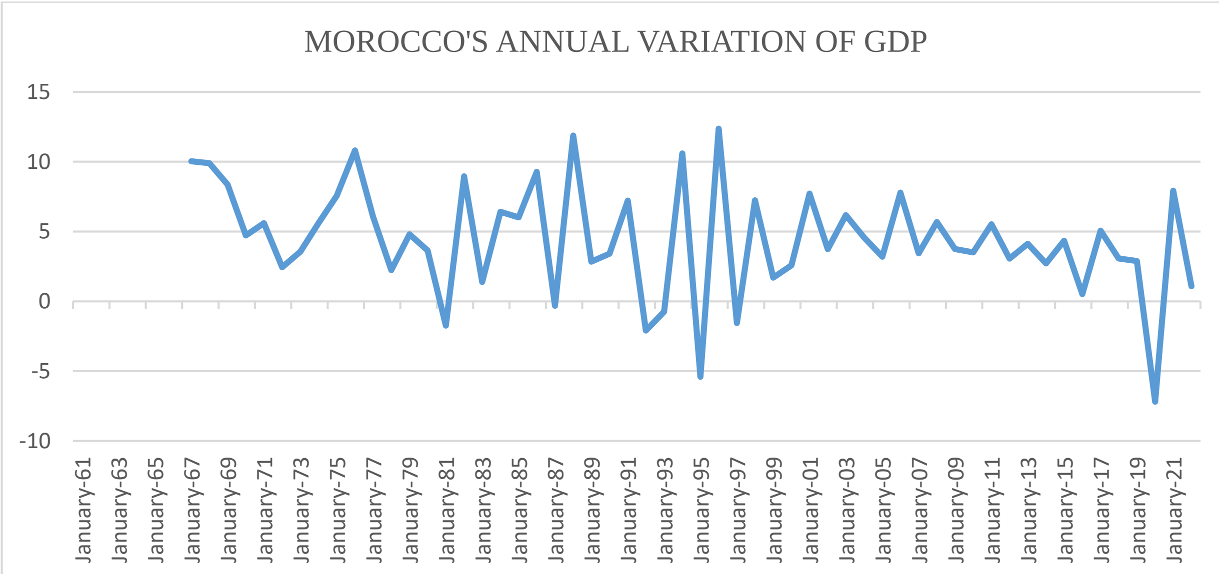
Source: Bank Al-Maghrib, Morocco

However, if we take the benchmark into account, the more loans are taken from the IFM to sustain the national economy while widening the fluctuation bands, the more inflation rises due to the depreciation of the national currency; it may not be brutal and sharp thanks to the progressive floating, but once the currency is fully floating, inflation would peak as in the three countries benchmarked. The inflation is still under control only in Tunisia because it is still under managed floating exchange rate regime and inflation targeting policy just like Morocco now; a result confirmed by Akiba (2009) when they stated a small open economy should adopt a more flexible exchange rate regime with inflating targeting policy in order to have a better tradeoff between exchange rate stability and monetary policy independence. Yet Ait Hmadouch (2022) had another opinion: Inflation targeting is not an appropriate monetary policy for the Moroccan context or the eventual economic shocks because the continuous interest rate penalizes firms and weighs more on import costs.

Even though the dirham witnessed a little appreciation during its first year of flexibilization, it did not help raise the GDP because the debt-to-GDP ratio increased that year due to the IMF PLL agreement. Then, because of COVID-19, it plunged more due to rising inflation, fewer exports, and the end of tourism, which is a sector on which the GDP depends, like the benchmark which relies highly on the tertiary sector (more than 50% added value in GDP according to World Bank data).

Figure 11.

Morocco's annual GDP variation from 1961 to 2022

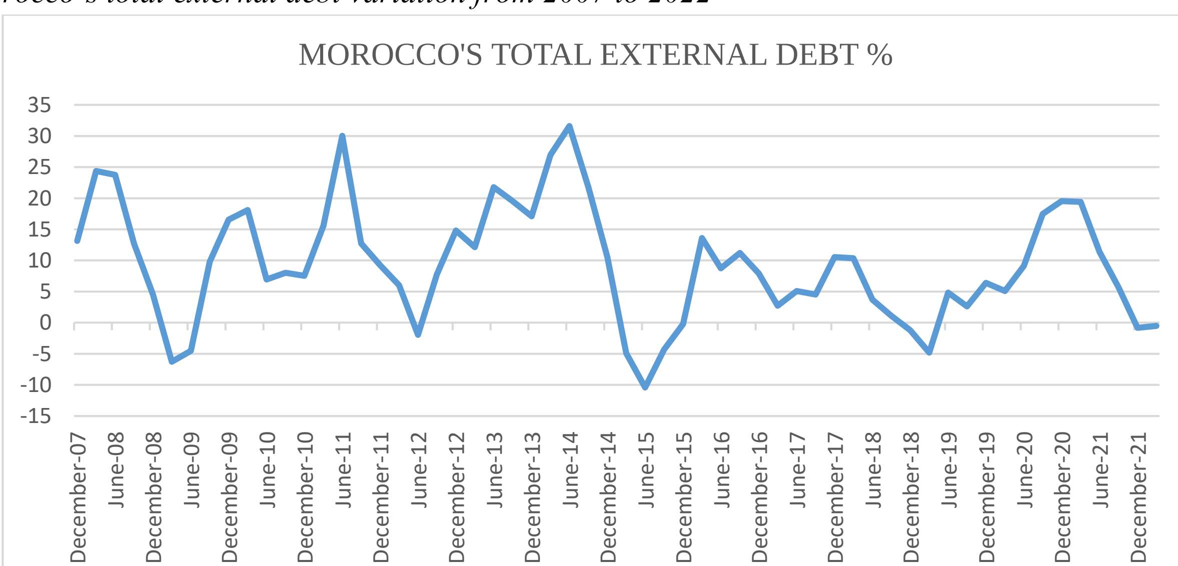


Source: World bank WDI

After opening the borders and regaining trade activities as well as tourism, the GDP started increasing during 2021, but it then decreased due to higher costs of imports, increased cost of gas because of the Russo-Ukrainian conflict in 2022, and lower export value. As Ait Hmadouch (2022) suggested, targeting nominal GDP and focusing more on economic growth through this gradual flexibilization would be a better strategy. This joins the results of Sokolov et al. (2011), underlining that countries with matched float witness better GDP performance and less volatility.

Figure 12.

Morocco's total external debt variation from 2007 to 2022



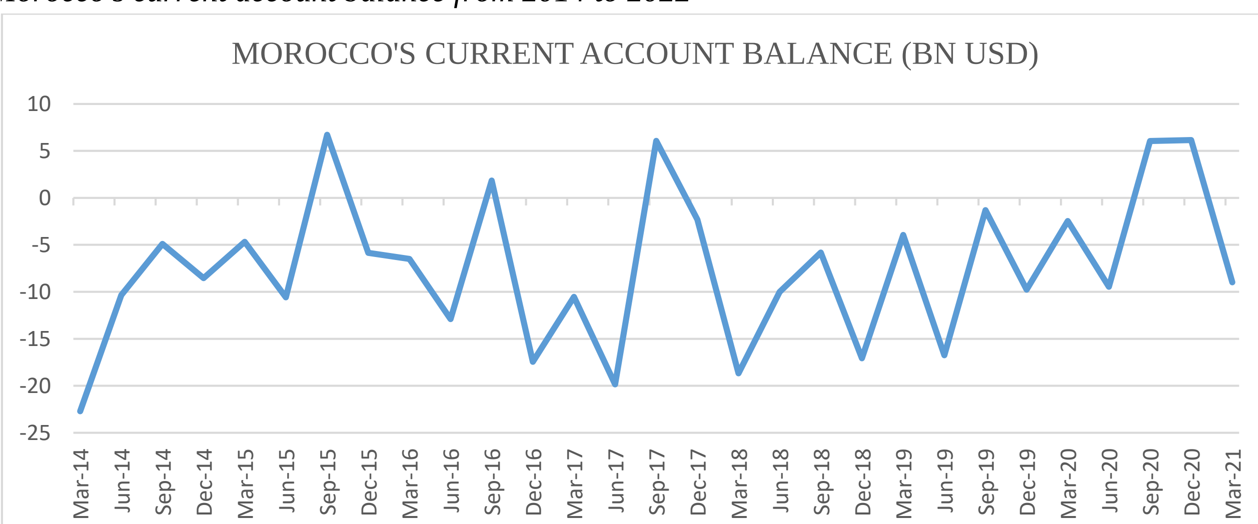
Source: Bank Al-Maghrib, Morocco/Refinitiv

Again, many external shocks occurred during the first two shifts to flexibilization in Morocco, yet if we take the benchmark cases studied earlier, and as for the economic similarities with Egypt, improving agricultural sectors and tourism but also the uprising industrial sector here in Morocco, positive variation in economic growth might occur, especially with the Moroccan business climate attractiveness and the work implemented in manufacturing sectors.

Within the first year of flexibilization of the MAD, with a slight appreciation of its value, the external debt decreased by 1,25% at the end of 2018. Starting from 2019, after the two-year Precautionary Liquidity Line (PLL) agreement with the IMF, external debt kept increasing, especially during the Covid pandemic and the tensions of the Ukrainian-Russian conflict (2019-2022), as we noticed a peak of external debt in 2020 due to the financial assistance from the IMF through the Rapid Credit Facility (RCF) where the amount of financial support was around $3 billion. Starting from 2021, the external debt decreased, a sign of import covers improving, and more economic stability helped the debt pay off. Also, more stability means less currency volatility. In fact, according to the Central Bank of Morocco, MAD finished the year 2021 with an appreciation against the two currencies of its peg (EUR 1,8% and USD 5,7%). Since the debt is labeled in USD, the debt costs have decreased. Compared to the benchmark, thanks to its creditworthiness, Morocco has, according to Fitch Ratings, a favorable credit rating (BB+), the same rating as Egypt and better than Turkey (B), which makes it a low credit risk profile and could benefit from better agreements from the IMF. Moreover, thanks to its business climate continuously improving, Morocco keeps attracting investors, which helps attract foreign assets that could be used to pay off the debt. The external debt situation has higher levels of sustainability, as underlined by Neaime (2009). If the floating is kept, as BKAM claims, progressive, the external debt to GDP ratio could be stable and improve in Morocco compared to its regional peers, and as said by Jeanneney (2019), it would help get through economic shocks.

Figure 13.

Morocco's current account balance from 2014 to 2022



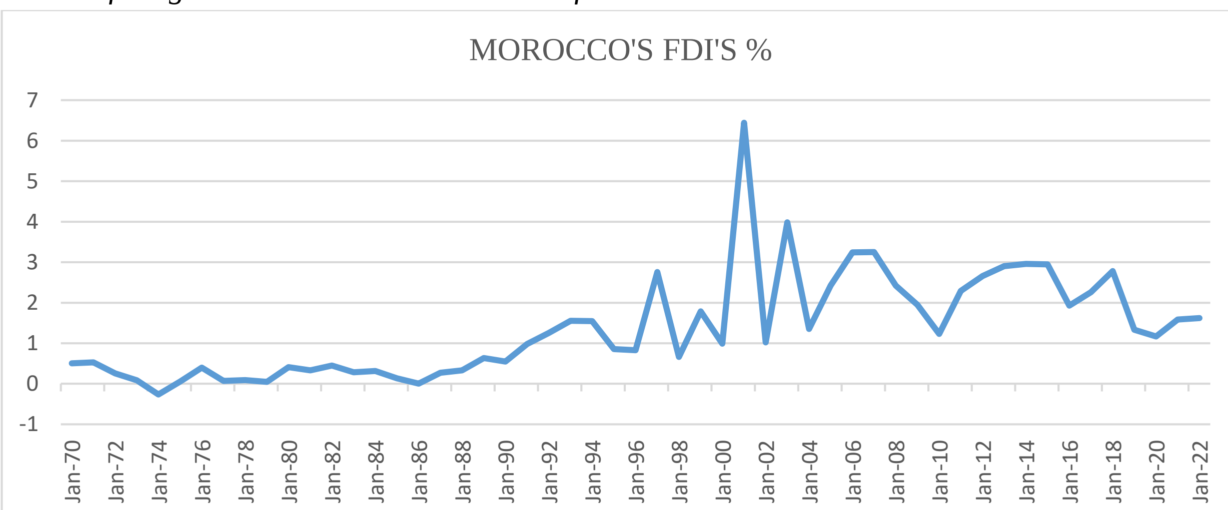
Source: Office des Changes, Morocco

Since 2018, the standard deviation of the data series has been positive, which leads us to say that values are not closely clustered and there is important variability in the data set, as we notice. If we take the momentum of these variations since 2018, we can notice that the current account balance, despite the external shocks witnessed during that period, gradually increases over time, from quarter to another, reflecting gradual improvements in exports, increasing incomes from services and more net income transfers from abroad. Yet in 2022, the deficit, according to the Office des Changes, has doubled due to the increase in the payment balance deficit.

Compared to its benchmark, Morocco has improved components of its current account balance, noticeably better net income from abroad, and is developing foreign investments. Overall, based on its better stability, the current account balance could improve while gradually widening its fluctuations' bands of exchange rate.

Figure 14.

Morocco foreign direct investments variation from 1970 to 2022



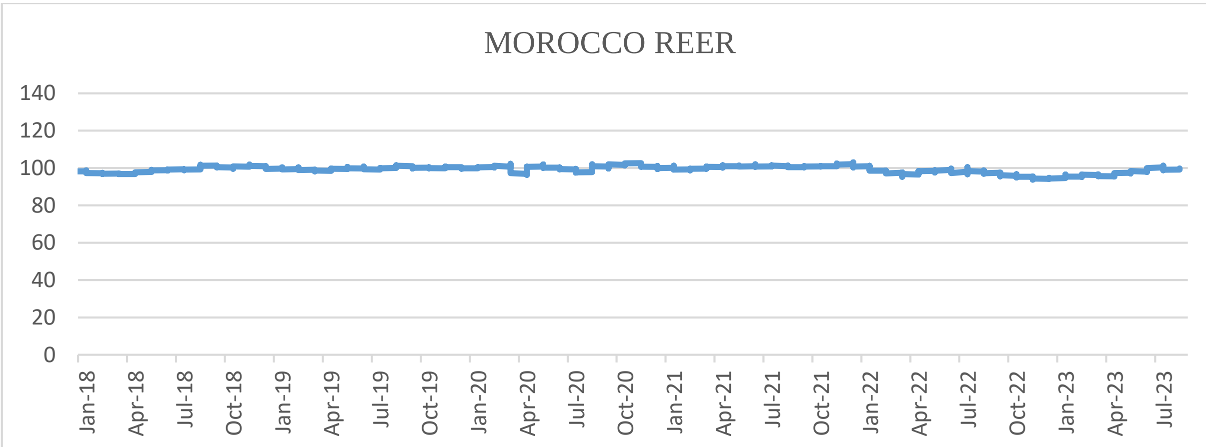
Source: World Bank WDI

Starting from 2018, unlikely for Turkey and Tunisia, and similarly to Egypt and Morocco has been, if we neutralize the effect of COVID-19 and Russo-Ukrainian conflict effects, gaining more FDIs. Like Egypt, the economic climate in Morocco is very promising for investors from abroad. It is considered the upcoming Hub in Africa with all its industrial activities, tourism, and sustainable energy programs that, under the climate change circumstances, are attracting more investors. Unlikely for Turkey, despite all the benefits it gets from its geographical position, which makes it a Hub between Asia and Europe, and facilities from the European Union, it is hard to attract FDIs because investors keep losing confidence in the economic stability due to the successive devaluations of TRY. The same is the case for Tunisia; due to its challenges faced with unemployment, economic crisis, and the Arab uprising spring, the country is less attractive to foreign investors than its peers.

Consequently, based on the developing and more open Moroccan economy, and compared to the benchmark, FDIs in Morocco could keep improving while the exchange rate regime is becoming more flexible with time thanks to its higher levels of economic stability than its regional peers.

Figure 15.

Morocco's real effective exchange rate from 2018 to 2023



Source: J.P Morgan

Since the first step of flexiblizing its currency, Morocco has maintained the same level as its REER. It has its own benefits and drawbacks; it is a good sign of economic stability and less inflationary pressures, which, as stated before, encourage foreign investors and attract more tourists (a main sector in GDP). However, it does not help improve exports because if the REER does not significantly decrease, the competitiveness of exports remains limited as well as import costs remain the same or slightly higher if the currency depreciates. The current situation can be explained by the fact that BKAM still intervenes under the managed floating regime to maintain stability whenever it is assumed to be needed. However, compared to the benchmark, if the Moroccan Dirham floats, then the REER would decrease over time, giving space for exports to rise, as stated by Jeanneney (2019), and domestic industries can benefit from such lower REER against import costs, which can lower imports shares; consequently, improve the trade balance.

Challenges, policy recommendations, and future outlook

As stated at the beginning of this article, floating exchange rate regimes come with a lot of benefits but also a lot of challenges that need to be taken into consideration within monetary policy decisions. This section aims to highlight the main challenges likely to occur and propose recommendations for a better exchange rate regime transition.

Challenges

Floating its exchange rate regime comes with a lot of challenges, especially for emerging countries, as we have seen in our benchmark example. The main challenges that Morocco can face, based on the experience of its peers, are the following:

- <u>Exchange rate volatility and its implications for trade and investment</u>

When we talk about competitiveness, we mean the attractiveness of exports. However, this competitiveness depends on the price elasticity of exports as well as other important factors such as quality, lead times, and marketing channels. However, these exports will only increase due to the depreciation of the dirham, which would automatically generate additional costs for imported products and raw materials and ultimately impact the price level (and hence vicious inflation pressures). As a result, we would experience less purchasing power and, therefore, less consumption.

- Managing capital flows and external imbalances

As stated by Muller et al. (2017), a peg regime is only beneficial when domestic shocks occur, yet flexible to floating regimes can wipe off deflationary external shocks by stimulating competitiveness. The argument for absorbing external shocks, confirmed by Obstfeld et al. (2019), seems sound, but it may not be. In theory, if import prices were to rise, the pressure on foreign exchange reserves would be offset by a depreciation of the dirham, and the shock would be averted. In reality, however, this would not be the case for energy imports, especially oil and gas, which make up the bulk of commodities in demand (the case when the eve of Russia evasion in 2021 started). If their prices continue to rise, this could not only deplete the country's foreign exchange reserves but also lead to further devaluation of the dirham to salvage the situation at a time when the price stability of these commodities is still being questioned. As for the attractiveness of Foreign Direct Investment (FDI), this would remain dubious, and investors would be wary of the volatility of the market, which could lead, following the depreciation of the MAD, the devaluation of their contributions.

- Effectiveness of monetary policy transmission in a floating regime

The effectiveness of monetary policy transmission in a floating exchange rate regime, especially in the short and medium term, according to Mezene and Echkoundi (2020), depends on several factors, including the central bank's policy instruments, the country's economic conditions, and external factors. Egypt and Turkey have experienced greater exchange rate flexibility in recent years, which has affected their ability to manage monetary conditions because of increasing inflation and sharp depreciation of their currencies. Tunisia faces challenges related to inflation and fiscal deficits, while Morocco's exchange rate regime supports price stability but limits exchange rate flexibility due to its managed exchange rate regime and inflation-targeting policy. If policymakers, as in the case of Morocco, would go fully floating, they may witness economic imbalances and political uncertainties as well as pressures from the IMF; the case for all three countries to get agreements for loans, the more loans needed to sustain the economic stability, the more monetary policy of these countries is not fully dependent after all.

Policy recommendations and future outlook for morocco

In considering the adoption and maintenance of a floating exchange rate regime in Morocco, several key recommendations could be drawn from international best practices and the experiences of regional peers. First, strengthening the institutional framework for exchange rate management should be a priority. This includes ensuring that the Central Bank of Morocco has the necessary tools, expertise, and independence to implement monetary policy effectively and manage exchange rate fluctuations.

Second, increasing exchange rate flexibility through market mechanisms is essential. Allowing market forces to play a greater role in determining the value of the Moroccan dirham can improve economic resilience and responsiveness to changing global conditions.

Third, promoting economic diversification and resilience is critical. Mezene and Echkoundi (2020) insisted that Morocco can reduce its vulnerability to external shocks by promoting economic diversification, broadening its export base, and implementing structural reforms that enhance competitiveness.

As Bilgili et al. (2019) stated, Morocco has undertaken various efforts to diversify its economy to reduce its dependence on traditional sectors and increase its economic resilience. As proven by Veganzones (2004), a fixed exchange rate regime keeps an overvaluation of the national currency, which only benefits the public sectors' interests, while the cost of manufacturing products stays high and noncompetitive. These diversification efforts have been part of a broader economic strategy aimed at promoting sustainable and inclusive growth. Some key aspects of Morocco's diversification efforts are as follows:

Industrialization and manufacturing: Morocco has actively promoted industrialization and manufacturing to diversify its economic base. The country has developed industrial zones and attracted foreign direct investment (FDI) in the automotive, aerospace, and electronics sectors. The automotive industry, in particular, has seen significant growth, with multinational companies establishing production facilities in the country.

Export promotion: Morocco has focused on expanding its exports beyond traditional sectors such as agriculture and phosphates. The government has implemented export promotion policies and incentives to encourage the growth of non-traditional export industries, including textiles, electronics, and renewable energy products. Exports to African countries have also been a focus, taking advantage of Morocco's geographic proximity to the continent.

Renewable energy: Morocco has made significant investments in renewable energy projects, particularly solar and wind power. These initiatives aim to diversify the country's energy sources and reduce its dependence on fossil fuels. The Noor Solar Complex in Ouarzazate is one of the largest solar power projects in the world and reflects Morocco's commitment to renewable energy.

Tourism and services: Tourism has been a key driver of diversification in Morocco. The country has invested in infrastructure and promoted itself as a tourist destination. In addition, the services sector, including information technology and business process outsourcing (BPO), has experienced growth and diversification, attracting international companies to set up operations in Morocco.

Agricultural modernization: While agriculture remains an important sector in Morocco, efforts have been made to modernize and diversify the sector. This includes promoting high-value agricultural products and agribusiness ventures to increase agricultural productivity and exports.

Financial sector development: Financial sector development has been a priority. Morocco has sought to expand access to financial services, encourage innovation in fintech, and deepen capital markets to support economic diversification.

Infrastructure development: Infrastructure projects such as ports, logistics hubs, and transportation networks have been undertaken to facilitate trade and economic diversification. For example, the Tangier-Med port complex has positioned Morocco as a strategic logistics and industrial hub in the region.

Fourth, monitoring and managing potential risks and vulnerabilities should be an ongoing process. Morocco should pay close attention to external factors, such as commodity prices, mostly gas and oil prices, and global economic conditions, that may affect its exchange rate stability.

Finally, it is important to consider prospects and possible adjustments to the exchange rate regime. Morocco should regularly assess the effectiveness of its chosen regime in achieving its economic objectives and be open to adjustments, if necessary, to adapt to evolving circumstances. The progressive flexibilization of its exchange rate regime while targeting its inflation seems to be the optimal way to monitor the impacts of a floating currency.

By implementing these recommendations, Morocco could effectively navigate the complexities of a floating exchange rate regime and strive for greater economic stability and resilience in the region compared to its peers.

Conclusion

In conclusion, analyzing floating exchange rate regimes and their effects on emerging economies, with particular emphasis on the MENA region, contributes to an in-depth comprehension of the intricate relationship between exchange rate policies and economic dynamics. Even though adopting floating exchange rates poses inherent difficulties, it also offers substantial prospects for emerging economies to enhance their economic durability, flexibility, and international competitiveness.

Emphasizing the imperative need to enrich research in this field is paramount. There are two pivotal dimensions to explore further. Firstly, delving into the microeconomic level, particularly examining the impact on corporate financial indicators, holds immense promise. Researchers can unravel the intricate links between currency dynamics and business outcomes by scrutinizing how floating exchange rate regimes influence a company's financial health and performance.

Secondly, for countries considering a shift towards exchange rate regime flexibilization but hesitant to fully adopt it, exemplified by the case of Morocco, leveraging advanced scientific tools, notably multi-agent systems digital twins, becomes indispensable. Such tools enable the exploration and identification of potential effects of floating exchange rate regimes on key economic indicators, even before their partial or complete adoption. This proactive approach empowers policymakers with valuable insights to make informed decisions regarding exchange rate policies.

Morocco's journey serves as an enlightening benchmark in this regard. As the nation cautiously proceeds towards greater exchange rate flexibility as part of its broader diversification efforts, it exemplifies the careful balance necessary to maintain exchange rate stability while embracing the advantages of a more adaptable system. The Moroccan experience highlights that the path to economic transformation requires nuanced strategies that align with each country's distinctive circumstances.

As Morocco continues its commitment to diversifying across sectors such as manufacturing, renewable energy, and services, its adoption of a more flexible exchange rate regime puts the country in a position to encourage innovation and respond effectively to dynamic global economic conditions. This trajectory not only inspires but also provides a valuable projection for other emerging economies within the MENA region and beyond.

Morocco's economic progress will be closely observed in the years to come, providing significant perspective and guidance for policymakers, businesses, and investors in developing nations. As countries aim to navigate the continually changing global economic climate, Morocco's commitment to achieving the optimal equilibrium between exchange rate flexibility and stability represents an impressive paradigm for realizing sustainable growth, resilience, and prosperity, through its strategy of floating its exchange rate regime progressively.

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