

Analysis of Indian Economic Situation and Influencing Factors of the Exchange Rate of Rupee

Qingci Zhang^{1,a,*}

¹*Chongqing University No.174 Shazhengjie, Shapingba, Chongqing, 400044, China
a. 20215801@stu.cqu.edu.cn*

**corresponding author*

Abstract: With the turmoil in the international foreign exchange market and the rapid development of the Indian economy, the role of the Indian rupee in the international exchange rate market has gradually increased. At the end of May 2024, the Reserve Bank of India announced its plan to allow rupee accounts to be opened outside India. This move has led to speculation about a big change in India's foreign exchange policy. This article provides some analysis of the Indian rupee based on these hot events, and also includes forecasts of its exchange rate changes. The whole analysis will be divided into some parts of the ruble exchange rate, monetary policy, GDP composition, and forecasts for the future ruble exchange rate. It finds that the rupee's exchange rate is influenced by a multitude of factors, including the strength of the US dollar, domestic monetary policy, economic growth, inflation, trade deficits, and political stability. This paper also highlights the importance of understanding the rupee's behavior, which may offer some references for investors and policymakers.

Keywords: Foreign exchange, India, rupee, exchange rate.

1. Introduction

1.1. Current Situation

For nearly a decade, Rupee has been on a downward trend. Indian rupee, which recently fell to a record low against the dollar due to the strengthening of the dollar, fell to 83.79 rupees against the dollar and is expected to continue its decline. At present, judging from the public statements of the Federal Reserve and other parties, it seems that the Federal Reserve will not relax its policy soon, or even rule out the possibility of further interest rate hikes in the future. Given this, the US dollar will continue to strengthen in the near future, and Asian currencies including rupee will undoubtedly be further severely impacted.

The Indian rupee fell to an all-time low on March 27 as local oil companies and importers snapped up dollars, as well as stock-related capital outflows [1]. On April 19, India's general election kicked off. At the end of May 2024, the Reserve Bank of India announced its plan to allow rupee accounts to be opened outside India. During the general election, stabilizing the national economy is the main task [2]. The current round of rupee devaluation will affect India's domestic manufacturing industry, especially industries that rely heavily on imports. If not handled properly, the ruling party will

inevitably be affected. Therefore, strengthening market intervention and curbing the fluctuation of the US dollar against the rupee exchange rate are the top priorities [3].

However, it is especially worth mentioning that India is currently sitting on historically high foreign exchange reserves, which provides the Indian Central Bank with sufficient "ammunition" to deal with exchange rate fluctuations. Therefore, the Indian Central Bank has greater flexibility and space in regulating exchange rate pressure and can effectively slow down the rate of rupee devaluation through market operations such as selling US dollar reserves and buying Indian rupees, thus maintaining the stability of the currency market.

1.2. Purpose and Significance

This paper aims to provide a comprehensive analysis of the Indian rupee's exchange rate dynamics and the influencing factors shaping its movements. The study's primary purpose is to gain insights into the intricacies of the Indian economy's relationship with the global foreign exchange market.

The significance of this research lies in its timely relevance and potential impact on policymakers, investors, and the public. Firstly, by examining the rupee's exchange rate from multiple angles, including its historical evolution, monetary policy, and economic structure, the study contributes to the understanding of the currency's behavior and future trajectory. Secondly, it highlights the intricate interplay between domestic and international factors influencing the rupee's value, providing a framework for predicting and mitigating potential risks. Lastly, the analysis of hedging strategies using foreign exchange forwards and options offers practical guidance for investors looking to protect their portfolios against exchange rate fluctuations.

2. Turnover Rate

2.1. Concept

The trading volume of the Indian rupee in the global foreign exchange market is an important measure, and the trading volume data of major currency pairs can usually be obtained through the Bank for International Settlements (BIS) or other financial data providers. In the domestic market, the trading volume of the Indian rupee is mainly reflected in banking, financial market and daily economic activities, which can reflect the trading activity level of the Indian rupee.

2.2. Factors

Generally speaking, the turnover rate of a currency is affected by the following three factors.

2.2.1. Economic Factors

The growth status of the Indian economy is a key factor affecting the currency turnover rate of the rupee. When economic growth is strong, it is usually accompanied by higher trade activities and capital flows, thus driving the increase in the trading volume of the rupee. At the same time, high inflation may lead to a decline in investor confidence in the rupee, which may reduce trading activities. Low inflation helps maintain market stability and attract more transactions.

Apart from this, India's trade balance (especially trade deficit) affects the supply-demand balance in the forex market. The trade deficit may lead to an increase in the demand for foreign exchange, thus pushing up the rupee's trading volume and turnover rate.

2.2.2. Monetary Policy

The interest rate policy of the Reserve Bank of India has an important impact on the currency turnover rate of the rupee. When the central bank raises interest rates, it will attract foreign capital inflows and increase demand for the rupee, thus pushing up the trading volume and turnover rate. On the contrary, cutting interest rates may lead to capital outflows and reduce the trading volume and turnover rate. At the same time, ample foreign exchange reserves can boost market confidence in the Indian economy and attract more trading activities. At the same time, the central bank can also use foreign exchange reserves to intervene in the foreign exchange market and stabilize the exchange rate and trading volume of the rupee.

2.2.3. Political Factors

Political stability is an important factor affecting the turnover rate of rupee currency. Political instability may lead to a decline in investor confidence and reduce trading activities; while political stability helps maintain market confidence and promote the increase of trading volume.

The continuity and predictability of government policies can also affect rupee trading. Frequent changes or unpredictability in policies can lead to increased market volatility and reduce traders' confidence and willingness to invest.

3. Exchange Rate System

India has a managed floating exchange rate system.

3.1. History

The historical evolution of India's exchange rate management system has gone through many stages. From strict exchange control in the early days after independence, to the later crawling peg to a basket of currencies, to the managed floating exchange rate system implemented in the 1990s, India's exchange rate system has gradually moved towards marketization. In particular, a series of reforms carried out by the Indian government in 1991 to deal with the balance of payments crisis, including the reform of the exchange rate system, made India successfully enter the era of managed floating exchange rate in which market supply and demand determine the rupee exchange rate.

3.2. Institutional Provisions

The regulation governing foreign exchange in India is the *Foreign Exchange Management Act (1999)*, which came into force in June 2000 and provides the legal basis for the operation of the Indian foreign exchange market.

The Reserve Bank of India does not set a fixed target for the exchange rate but is ready to intervene in the foreign exchange market at any time. At the same time, the exchange rate fluctuates within a certain range, which helps to reflect changes in market supply and demand. Methods such as open market operations and liquidity adjustment mechanisms maintain price stability, ensure appropriate credit to the productive sector and promote economic growth.

4. Economic Structure

The composition of India's GDP is mainly composed of three major industries: agriculture, industry and services. Among them, the tertiary industry service industry accounts for the vast majority of GDP, close to 60%, while agriculture and industry account for a lower proportion, about 14% and 28% respectively.

4.1. Service Industry

The service industry is the core driving force of the Indian economy. Its high proportion is mainly due to India's opportunity to seize opportunities in globalization and the imbalance between supply and demand in overseas labor markets, especially the rapid development of IT services and outsourcing industries. India has a large number of high-quality IT talents, which gives it significant advantages in software development, data processing, call centers, etc. In addition, industries such as finance, education, medical care, and tourism have also made important contributions to the growth of the service industry.

However, the service sector's high dependence on external markets also makes it vulnerable to fluctuations in the global economy. For example, factors such as an unstable international economic environment, intensifying US foreign trade frictions and slowing global economic growth may impact India's service sector.

4.2. Manufacture

Although the secondary industry accounts for a relatively low proportion of India's GDP, its importance to economic development cannot be ignored. In recent years, the Indian government has proposed the "Make in India" goal, which aims to promote the optimization and upgrading of the economic structure by increasing the proportion of manufacturing. However, this goal faces multiple challenges, including low labor quality, imperfect manufacturing ecosystem, and especially poor industrial base, which seriously affects the further development of India's economy. In terms of logistics, due to poor road conditions and supporting facilities, India's land transportation logistics costs are about 20% to 30% higher than China's; in terms of industrial hydropower, India's electricity prices are similar to China's, but frequent power outages in India affect industrial production, and India's water price is about three times that of China [4].

In order to change this situation, the Indian government has introduced a series of policy measures, such as production-linked incentive schemes, etc., to attract foreign investment and promote the development of local manufacturing.

4.3. Agriculture

Agriculture is the traditional pillar industry of the Indian economy. Although its proportion in GDP is declining year by year, it is still of great significance to India's economic and social stability. India has vast arable land resources and abundant agricultural resources, but agricultural production efficiency is relatively low, and it is greatly affected by natural disasters and market fluctuations.

5. Factors Affecting Exchange Rate

The next section is about analyzing the factors that affect the rupee exchange rate.

5.1. Commodities

India's import dependence on commodities such as crude oil and gold is high. India and its people have a long-standing affinity towards gold. When international commodity prices are high, India's import volume will rise, resulting in a widening trade deficit. This will increase India's foreign exchange demand, which in turn will exert depreciation pressure on the rupee exchange rate [5].

5.2. Inflation

India's inflation rate has changed somewhat in recent years. In 2017, the nominal interest rate was much higher than the inflation rate, and it is possible that the interest rate for this year was overvalued; after 2020, the real interest rate has been below zero, and the nominal interest income received by investors is not enough to compensate for the loss of money purchasing power caused by inflation. At this time, the purchasing power of money decreases.

High inflation erodes the purchasing power of a currency, triggering capital outflows that reduce demand for the rupee in the foreign exchange market, causing the rupee to fall. During the general election period, political uncertainty may increase, and policy direction may be difficult to predict, which may lead investors to take a wait-and-see attitude or withdraw from the Indian market, and the rupee exchange rate may be affected.

Changes in the purchasing power of a country's currency have an impact on the exchange rate. When a country's price level is too high or rising rapidly, the purchasing power of the country's currency is relatively weak, which will inevitably promote the devaluation of the country's currency, and vice versa. In order to promote the stability of the Indian rupee exchange rate, the Reserve Bank of India has always made it one of the main tasks to contain high inflation [6].

5.3. Global economic Development

Under the influence of continued restrictive interest rates, the US economy has remained resilient despite cooling in consumption, real estate, government spending and other demand areas. At the same time, the AI technology revolution, capital markets boom and inventory recovery have provided effective support. Insufficient supply-side repair has supported residents' income and provided resilience to the wage-inflation cycle. As a result, the US economy has steadily risen.

As for European countries, interest rate cuts provide room for economic recovery, help reduce the financing costs of enterprises and residents in the euro zone, promote consumption and investment, and support relatively weak domestic demand. However, there are still many difficult factors hindering the economy in Europe, including energy independence issues, uncertainties about policy changes after elections in major countries such as Britain and France, and unsynchronized monetary policies in the United States and Europe. Europe's economy is likely to remain stable [7].

For Japan, on the one hand, the industrial chain has been basically repaired after the earthquake. On the other hand, the global semiconductor and automobile industrial chains are expected to be further integrated. The strengthening of the industrial chain alliance between the United States, Japan and South Korea will benefit Japanese multinational enterprises. There are good prospects for economic development.

5.4. Domestic Demand

The supply and demand of goods and services is also a key factor in determining the inflation rate. When there is insufficient supply, prices tend to rise; when there is insufficient demand, prices may fall. India remains the world's fastest-growing large economy, with growth projected at 6.2% in 2024, second only to 6.3% in 2023, on the back of solid domestic demand and a booming manufacturing and services sector. If India can maintain its high growth rate, this will boost market confidence in the Indian rupee and push its exchange rate up [8].

6. Hedge Long Exposure

The next point is to advise a dollar-based investor to hedge long exposure in Rupee.

6.1. Foreign Exchange Forwards

There are two ways to use foreign exchange forwards to help investors lock in future exchange rates. This has many advantages, such as trading flexibility, and there are no restrictions on the time, place, and currency of the transaction. Good credit risk, both parties to a foreign exchange forward contract bear credit risk, that is, the risk that one party to the contract may not be able to fulfill its obligations. Hedge hedging, by locking in future exchange rates, helps businesses and investors avoid losses due to exchange rate fluctuations.

6.2. Foreign Exchange Options

The second point is that by purchasing foreign exchange options, investors can exercise options in the event of adverse changes in exchange rates. This method works similarly to the first method.

7. Conclusion

This paper has delved into the intricacies of the Indian rupee's exchange rate dynamics, exploring its historical evolution, institutional framework, and economic determinants. The analysis has shown that the rupee's exchange rate is influenced by a multitude of factors, including the strength of the US dollar, domestic monetary policy, economic growth, inflation, trade deficits, and political stability.

The paper has also highlighted the importance of understanding the rupee's behavior for investors and policymakers alike. For investors, hedging strategies such as foreign exchange forwards and options offer effective means of mitigating the risks associated with exchange rate fluctuations. For policymakers, the insights gained from this research can inform decisions aimed at maintaining economic stability and fostering growth.

Furthermore, the study has emphasized the significance of India's service sector, which, while driving the country's economic growth, also exposes it to external vulnerabilities. As the Indian economy continues to evolve, the government's efforts to promote manufacturing and reduce reliance on imports will be crucial in mitigating these risks and enhancing the resilience of the rupee.

In conclusion, this paper provides a nuanced understanding of the Indian rupee's exchange rate dynamics and the factors that shape its movements. The rupee is a relatively special currency. Even with the influence of the US dollar, the rupee's exchange rate has been falling, but the decline is relatively small, and it has developed better than other Asian currencies. India is also the fastest-growing economy in 2024 due to rising domestic demand and booming manufacturing and services sectors, and its currency, the rupee, is also expected to rise.

References

- [1] Kai Wang. *Indian Rupee Falls to Record Low*. Ministry of Commerce website, March 29, 2024. <https://d.drcnet.com.cn/?leafid=22594&docid=7410676>
- [2] Yang Lu. *Policy evolution and development prospects of the internationalization of the Indian rupee [J]*. *Banker*, 2024, (07): 88-91.
- [3] Shipuhao. *Indian Rupee Falling Tests Economic Stability*. *Economic Daily*, April 23, 2024.
- [4] Zhiyong Hu. *India is difficult to undertake large-scale industrial transfer*. *Economic Daily*, January 6, 2023.
- [5] Shahani, Rakesh and Aastha Bansal. *Is Gold an Effective Hedge and/or Safe Haven Instrument Against Stocks, rupee-dollar Rate and Crude: An Empirical Investigation from India*. *Decision (Calcutta)* 48, no. 2 (2021): 129-151.
- [6] *Economy development*, UN News. *UN flagship report: Global economic growth is expected to slow to 2.4% in 2024, China's economic recovery faces resistance*, January 4, 2024. <https://news.un.org/zh/story/2024/01/1125512>.
- [7] Shuhui Ni. *The causes and prospects of the Indian rupee exchange rate trend [J]*. *China Foreign Exchange*, 2023 (23): 50-53.

- [8] Bin Wen, Xiwen Ying. *The new equilibrium after the great changes - the outlook for the global economic situation in the second half of 2024*, July 09, 2024. <https://new.qq.com/rain/a/20240709A08Q2700>