

THE MACROECONOMIC EFFECTS OF EXCHANGE RATE MOVEMENT IN INDIA

**Dr. Vijay D. Joshi, Assistant Professor, Dr. Ambedkar Institute of
Management Studies & Research, Deekshabhoomi, Nagpur**

ABSTRACT

The relationship between the values of local currencies in terms of foreign currencies and export competitiveness of any country is very complex. This relationship will become more complex if there is the heavy dependence on imported resources in the exported products. During last five years Indian rupee has weakened many times and reached to a level of 65.1806 for a dollar in March 2018. Since April 2013, the local currency lost around 18% to the US currency. Indian economy which already suffered from large fiscal and current account deficit adversely affected by relatively exchange rate pressure. This paper attempt to explore the effects of exchange rate movement in India and its impact on the Indian economy. The circumstances which have been created for the economy due to the depreciation of rupee against dollar reveals that there has been a strong and significant negative impact of this currency volatility on many sectors.

KEYWORDS

Impact of Rupee, Dollar Fluctuations, Exchange Rate.

India's Trading Partners in International Trade [1] [2]

International trade is characterized by import and exports between the countries. At present India's top four trading partners are the US, China, UAE and Saudi Arabia.



It was observed that during the period 2005 to 2018, India's merchandise trade has shown growth trend. According to UNCTAD Stat, the merchandise exports have shown a growth of 8.5% in 2018.

Total Merchandise Trade (In US \$ Million)				
Description	2005	2010	2015	2018
Merchandise Exports	99616	226351	267951	324778
Merchandise Imports	142870	350233	394131	514464

Merchandise Trade Balance	-43254	-123881	-126180	-189686
---------------------------	--------	---------	---------	---------

It may be noted that the international trade (comprising of the imports and exports) is further influenced by several factors. One of them is changes in the exchange rates referred to as 'currency fluctuations'.

Introduction to Exchange Rate Concept [3] [4] [5] [6]

Currency fluctuations are a natural outcome of the floating exchange rate system that is the norm for most major economies. The exchange rate between two currencies is that rate at which one currency will be exchanged with another currency. It is also known as a foreign-exchange rate, forex rate. Exchange rate of one currency versus the other is influenced by numerous fundamental and technical factors.

These include relative supply and demand of the two currencies, economic performance, outlook for inflation, interest rate differentials, capital flows, technical support and resistance levels, and so on. As these factors are generally in a state of perpetual flux, currency values fluctuate from one moment to the next. But although a currency's level is largely supposed to be determined by the underlying economy, the tables are often turned, as huge movements in a currency can dictate the economy's fortunes.

In simple terms exchange rate is nothing but the value of one country's currency in terms of another currency.

In the context of international trade, an exchange rate (also known as a foreign-exchange rate, between two currencies is the rate at which one currency will be exchanged for another. It is also regarded as the value of one country's currency in terms of another currency. E.g.an interbank exchange rate of 66 Indian Rupees (INR) to the United States Dollar (USD) means that INR 66 will be exchanged for each USD 1 or that USD 1 will be exchanged for each INR 66. In this case it is said that the price of a dollar in terms of rupee is INR 66, or equivalently that the price of a rupee in terms of dollars is USD 1/66.

Exchange rates can be either fixed or floating. Fixed exchange rates are decided by central banks of a country whereas floating exchange rates are decided by the mechanism of market demand and supply.

Exchange rates are determined in the foreign exchange market, which is open to a wide range of different types of buyers and sellers, and where currency trading is continuous: 24 hours a day except weekends. The spot exchange rate refers to the current exchange rate. The forward exchange rate refers to an exchange rate that is quoted and traded today but for delivery and payment on a specific future date.

The exchange rate is a key financial variable that affects decisions made by foreign exchange investors, exporters, importers, bankers, businesses, financial institutions, policymakers and tourists in the developed as well as developing world. Exchange rate fluctuations affect the value of international investment portfolios, competitiveness of exports and imports, value of international reserves, currency value of debt payments, and the cost to tourists in terms of the value of their currency.

Movements in exchange rates thus have important implications for the economy's business cycle, trade and capital flows and are therefore crucial for understanding financial developments and changes in economic policy.

Indian Rupee Movement [7] [8]

In the recent past it may be observed that there are fluctuations in the value of Indian Rupee against US Dollar. It is observed that INR prices keep fluctuating all the time. Sometimes we need more rupees to buy one unit of foreign currency and sometimes we need fewer rupees to buy one unit of foreign currency. This change in rupee price is known as rupee appreciation or depreciation. INR appreciation is when value of rupee increases (becomes expensive) and fewer rupees can buy one unit of foreign currency. This is also known as strengthening of rupee as now INR is worth more than foreign currency. Suppose exchange rate changes to 1 USD = INR 64, it may be said that rupee has appreciated as 1\$ can buy fewer INR.

Conversely, INR depreciation is when rupee value decreases (becomes less expensive) and more rupees can buy one unit of foreign currency. This is also known as weakening of rupee as now INR worth is less than foreign currency. If exchange rate changes to 1 USD = INR 68, it may be said that rupee has depreciated as 1\$ can buy more INR.

Currency price is always stated in relation to another currency. So when one currency appreciates the other currency depreciates.

Exhibit 1 indicates effects of exchange rate changes (either positive or negative) in general.

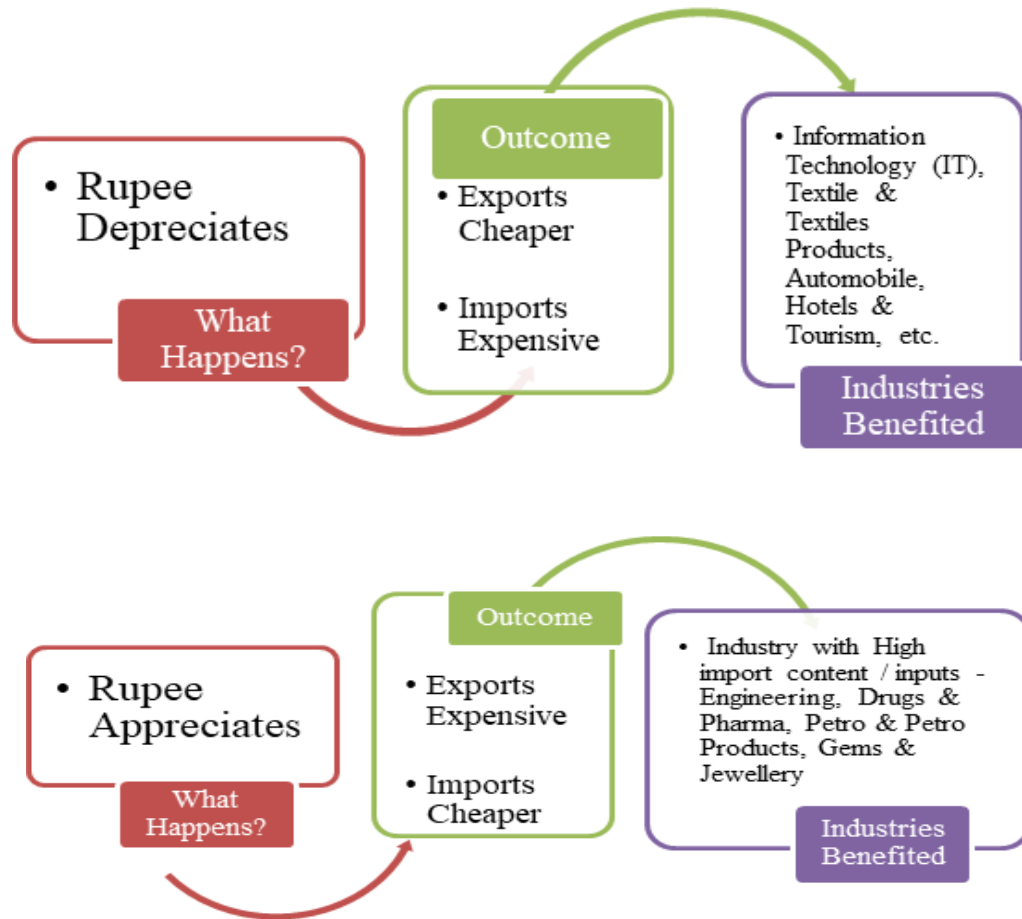


Exhibit 1: Effects of exchange rate changes in general [7]

Currency price is always stated in relation to another currency. So when one currency appreciates the other currency depreciates.

Exhibit 2 indicates past five year chart for Indian Rupee against US Dollar.



Exhibit 2: Past five year chart for Indian Rupee against US Dollar [8]

From the above chart, it was observed that value of Indian Rupee against US Dollar has grown from 61.6300 in Feb. 2015 to 71.8468 in Feb. 2020. This indicates that INR is depreciated over the last five years.

Effect of Exchange Rate Changes [3] [9] [10] [11] [12]

Effects of exchange rate changes are wide spread and affect any country's economy irrespective of its status such as developed, developing or underdeveloped. It has a direct impact on the following aspects of the economy:

- **Merchandise Trade:** As stated earlier, this is related with any country's international trade, or its exports and imports. In general terms, a shaky currency will push the exports and make imports pricier. This in turn reduces the country's trade deficit (or increasing surplus) over time. For example, assume you are a U.S. exporter who sold a million items at \$10 each to a buyer in Europe two years ago, when the exchange rate was €1=\$1.70. The cost to your European buyer was therefore € 5.88 per item. Your buyer is now negotiating a better price for a large order, and because the dollar has declined to 1.80 per euro, you can afford to give the buyer a price break while still clearing at least \$10 per widget. Even if the new price is €5.55, which amounts to a 5.61% discount from the previous price. The depreciation in the domestic currency is the major reason why the export business has remained competitive in international markets. Now in case of the situation opposite to this, significantly stable currencies makes the exports dearer, thus lowers the export competitiveness and in turn make imports inexpensive. Now this may result in widening of the trade deficit.

- **Economic Growth:** The basic formula for an economy's GDP (Gross Domestic Product) is $C + I + G + (X - M)$ where:

C = Consumption or consumer spending, the biggest component of an economy

I = Capital investment by businesses and households

G = Government spending and

(X - M) = Exports minus imports, or net exports

From the above, it is evident that the more the value of net exports, the more is the country's GDP.

- **Capital Flows:** Foreign funds inflows are attracted by the countries that have stable governance mechanism (in place), progressive economies and steady currencies. A country is required to maintain relatively steady currency to attract more external investments such as foreign investors. Otherwise, the prospect of investment deletion imposed due to currency downgrading may deter external investments. Capital flows may be divided into categories viz. FDI (Foreign Direct Investment) and foreign portfolio investment.
 - **FDI (Foreign Direct Investment):** In this case, external investors have stakes in existing organizations and / or creation of new facilities overseas.
 - **Foreign Portfolio Investment:** in this case external investors invest in overseas securities.

It is observed that FDI is a decisive basis of investments for emerging markets such as China and India, whose growth would be hampered if such investments were unavailable.

Any country or governing authorities tend to prefer FDI as compared to foreign portfolio investments, since the latter are often akin to “hot money” that can run off the country when the business hits rough ride. This fact is commonly referred to as “capital flight”. This may be initiated due to any unwanted causes such as planned or anticipated depreciation of the currency.

- **Inflation:** A devalued currency can result in “imported” inflation for countries that are substantial importers. The exchange rate affects the rate of inflation in a number of direct and indirect ways:
 - **Changes in the prices of imported goods and services** – this has a direct effect on the consumer price index. For example, an appreciation of the exchange rate usually reduces the price of imported consumer goods and durables, raw materials and capital equipments.
 - **Commodity prices:** Many commodities are priced in dollars – so a change in the Rupee - Dollar exchange rates has a direct impact on the Indian price of commodities such as petro products and engineering goods. A stronger dollar makes it more expensive for India to import these items.

- Interest Rates: As mentioned earlier, the exchange rate point is a key aspect for most central banks in the context of formulation of the monetary policy. A stable domestic currency exerts a drag on the economy, achieving the same end result as tighter monetary policy (i.e. higher interest rates).
- Unemployment: The exchange rate affects unemployment in many ways:
 - An exchange rate appreciation may lead to slow economic growth of real GDP because of a reduction in net exports (reduced injection) and a rise in the demand for imports (an increased leakage in the circular flow).
 - A reduction in demand and output may cause job reduction as organizations seek cost control. Some job reductions are provisional – indicating short term variations in export demand and import penetration. Others may be enduring in nature when an import constitutes a major part of the domestic market. Thus a higher exchange rate can have a negative multiplier effect on the economy.
 - Some industries are more exposed than others to currency fluctuations – e.g. sectors wherein a large proportion of total output is exported and where demand is highly price sensitive (price elastic).

To summarize, there exists many reasons for an economy taking the rough path. It may be possible that such critical situations may arise in to economy and grabbed more attention of RBI and Indian govt. towards this scenario. It may be noted that there are numerous factors that may cause currency depreciation, i.e. economic, political, corruption etc., but some factors require greater attention and should be analyzed objectively than the others.

Conclusion [3] [4] [9] [10]

- The decrease in the value of currency money influences a considerable measure of monetary development indicators.
- Deterioration of rupee decreases the inflow of outside capital, ascent in the external debts, and furthermore increases India's oil and fertilizer subsidy liability.
- The best effect of deterioration of rupee is the spur in exports and daunting imports and subsequently enhancing the current account deficit.

- In any case, even after thrust in exports and revenue during current period, Indian organizations are revealing enormous foreign currency deficits because of the devaluation of Indian rupee. This may have lowered the general productivity of these organizations.
- In the context of imports, for country like India, imports are of absolute necessity. Dismal worldwide monetary viewpoint alongside high price rises, expanding current account shortfall and FII surges have added to this fall.
- RBI has reacted with convenient intercessions by selling dollars discontinuously.
- In any case, in the midst of worldwide volatility, investors tend toward USD as a safe bet. To pull more investments, RBI can ease capital regulations by expanding FII restrictions on investment in government and corporate debt instruments and allow higher limits in ECB's.
- Government can make a stable political and financial condition. However, a lot depends on the Global economic outlook and the future of Eurozone which will determine the prospect of INR.

To conclude, it lots depends on global economic scenario what is the future of Indian currency.

REFERENCES

India's Trade Partners. As provided by Ministry of Commerce, Govt. of India. Article published in Times of India, Pune edition dated February 24, 2020.

1. General Profile: India. As provided by UNCTAD Stat. Available from: <https://unctadstat.unctad.org/CountryProfile/GeneralProfile/en-GB/356/GeneralProfile356.pdf>.
2. Ayush Singh, Vinaytosh Mishra, Akhilendra. B.Singh (2016), Impact of Rupee- Dollar Fluctuations on Indian Economy, ResearchGate, DOI: 10.13140/RG.2.2.32831.92323.
3. Anshu Grewal (2013) "Impact of Rupee- Dollar Fluctuations on Indian Economy: Challenges for RBI & Indian Government", International Journal of Computer Science and Management Studies Vol. 13, Issue 06, August 2013 ISSN: 2231-5268.

4. Sumanjeet (2007), "Appreciation of the Indian Currency: Implications for the Indian Economy", World Affairs: The Journal of International Issues, Vol 11, No. 4, winter, pp 52-69.
5. Coric, B., Pugh, G. (2010). "The Effect of Exchange Rate Variability on International Trade: A Meta-Regression Analysis", Applied Economics, 42(20), pp. 2631- 2644.
6. Rakesh D., Dr. J K Raju and Basavangowda K. G. (2016), An Impact of Currency Fluctuations on Indian Stock Market, International Journal of Application or Innovation in Engineering& Management (IIAIEM), Volume 5, Issue 6, June 2016 [ISSN 2319 - 4847].
7. Indian Rupee against US Dollar: Trend for Last five years. Source: www.xe.com/currencycharts/?from=USD&to=INR&view=5Y.
8. The Effects of Currency Fluctuations on The Economy by Investopedia, available at <https://www.investopedia.com/articles/forex/080613/effects-currency-fluctuations-economy.asp#ixzz5B8G8FVR5>.
9. Bagella, M., L. Becchetti, and I. Hasan, 2006, "Real Effective Exchange Rate Volatility and Growth: A Framework to Measure Advantages of Flexibility vs. Costs of Volatility," Journal of Banking and Finance, Vol. 30.
10. Exchange Rates - Macroeconomic Effects of Currency Fluctuations available at <https://www.tutor2u.net/economics/reference/exchange-rates-macroeconomic-effects-of-currency-fluctuations>.