# CHAPTER II LITERATURE REVIEW

#### **2.1 Introduction**

This chapter is intended to review the existing literature regarding the factors influencing stock return. It begins with a review of the relevant empirical studies and theoretical underpinning for the research. The empirical review and the underpinning theory concentrates on things that relate with factors influencing stock return. This chapter is concluded by developing a suitable research framework and hypotheses for the research.

# 2.2 Theory of the Study

# 2.2.1 Purchasing Power Parity Theory

The PPP is related to Cassel (1918), and it is an exchange rate determination theory that compares average product prices across countries. The Purchasing Power Parity hypothesis holds that the ordinary equilibrium exchange rate between two inconvertible currencies is dictated by their purchasing power ratios. As a result, the exchange rate is likely to be conventional at the point of equality between the PPs of the currencies (Ebiringa & Anyaogu, 2014).

According to the Purchasing Power Parity theory, when one country's inflation rate rises in comparison to another, increased imports and lower exports weaken the high-inflation currency due to worsening current and trade account balances. The PPP serves as a baseline for calculating the rate of equilibrium exchange and determining whether real exchange rate shocks fade with time (Zhang & Dou, 2014).

The PPP Theory is used in this study as an appealing empirical and theoretical instrument for explaining the increase and decrease in exchange rates over a certain time period.

#### **2.2.2 Interest Rate Parity Theory**

The IRP theory, connected with Keynes (1923), describes the relationship between two countries interest rates and exchange rates. It is assumed that the interest rate differentials between the two countries will have an impact on their exchange rates (Ebiringa & Anyaogu, 2014). IRP is a no-arbitrage condition that describes a state of equilibrium in which investors are unconcerned with the interest rates on two countries' bank deposits. The domestic interest rate should be the same as the international interest rate and the predicted change in exchange rates, according to this parity requirement. Risk-averse investors with rational expectations are more likely to have future exchange rates that adapt exactly given the current rate of interest differential (Zhang & Dou, 2014). IRP takes two distinct forms: uncovered interest rate parity, which is the state in which contact to foreign exchange risk is not habitual, and covered interest rate parity, which is the state in which a forward contract has been used to eliminate exposure to exchange rate risk (Zhang & Dou, 2014). The IRP theory is used in this study since it is a commonly used strategy in forecasting exchange rates. The theory is also used because it predicts the relationship between interest rates and spot exchange rates in home and foreign countries.

# 2.3 Dependent Variable

#### 2.3.1 Exchange Rate

The exchange rate is the price of one currency in relation to another, or the value of one currency in relation to the value of another (Salvatore 1997). The exchange rate is the definition of another currency exchange rate. According to Paul R. Krugman and Maurice (1994), the exchange rate is the price of a country's currency measured or represented in another currency. According to Nopirin (1996),

an exchange rate is an exchange between two separate currencies that allows for a comparison of the value/price of the two currencies.

Hooper et al. (1998) and Chinn (2004) discovered that real exchange rates had a considerable impact on dollar trade flows. Thorbecke (2006) stated in his study that, while the above is correct, the exchange rate elasticities for trade between the US and Asia are not large enough to give confidence that a depreciation of the US dollar will improve the US trade balance with Asia. When compared to the multilateral trade balance approach, Oguro et al (2008) found that aggregate bias issues are reduced in bilateral trade analysis. Breuer and Clements (2003) concluded in their analysis of trade between the United States and Japan that exchange rate elasticities affect commerce between the two nations.

According to Christopher et al. (2010), a study titled Inflation and exchange rates on small open economies in Latin America. Christopher used variable Inflation, money supply, and exchange rate. The findings of this study indicate that the two independent variables influence the exchange rate. According to a study by Pattnaik and Mitra (2001), there is a strong correlation between interest rates, inflation rates, and currency rates. Central banks control inflation and exchange rates through managing interest rates, and shifting interest rates has an effect on both inflation and currency values.

According to Mankiw (2000), the exchange rate is divided into 2, namely the nominal exchange rate and the real exchange rate. The nominal exchange rate is the relative price of the currencies of two countries. Meanwhile, the real exchange rate is the relative price of the goods of the two countries.

Tri and Hidayat (2005) investigated the factors influencing the rupiah exchange rate from January 2000 to 2005. They used the exchange rate, the Indonesian and US Wholesale Price Index (WPI), the money supply, real GDP, interest rates, and trade balance as factors. The variables that affect the Rp/dollar

exchange rate are the difference in real income between Indonesia and America, the difference in inflation between Indonesia and America, the difference in interest rates between Indonesia and America, and the exchange rate of the rupiah against the dollar one month earlier. Meanwhile, the differential in money supply between Indonesia and the United States has had no substantial impact on the exchange rate. Mahmoud et al. (2015) investigate the impact of inflation, interest rates, and money supply on exchange rate volatility. The findings show that there is a long-run link between exchange rate volatility and inflation. It was discovered that raising interest rates creates inflation, which causes exchange rate volatility to rise.

#### 2.4 Independent Variable

#### 2.4.1 Inflation

According to Sadono Sukirno (2015), general price increases occur in an economy from one time to the next. The inflation rate is the percentage rise in prices over the previous year in a given year. As a result, the stock price fell in line with the year's inflation rate. According to Abdullah (2013), inflation is a persistently appealing pricing trend. As a result, stock values fluctuate in response to the inflation rate. According to Anwar (2017), inflation is the process of continuously lowering the purchasing power of money for goods and services. In other words, if the cost of goods and services rises, so will the stock market. So, inflation is one of the factors that affect stock performance, then inflation must be controlled by stock investors.

Inflation also denotes a decline in the amount of money relative to the overall cost of goods and services. The Consumer Price Index (CPI) figure is used to calculate inflation. The Consumer Price Index (CPI) is an index that determines the average price change of a package of goods and services used by households over a given time period. Changes in the CPI represent the rate of increase (inflation) or the quality of decrease (deflation) of goods and services over time. The increase in

inflation is a negative signal for investors. From the consumer side, high inflation will reduce the purchasing power of consumers.

Several studies relationship between inflation and stock prices, Khan (2019), demonstrates that the rate of inflation has a considerable negative impact on the Shenzhen Stock Exchange in China. Wismantara (2017) and Lusiana (2020) have a considerable yet unfavorable influence on JCI inflation. According to Ramasamy and Abar (2015), high inflation causes the home currency to lose value, and vice versa; thus, exchange rates and inflation are negatively associated. Morosan and Zubas (2015) argue that inflation, exchange rates, and interest rates are all inextricably linked and that when central banks manipulate interest rates, exchange rates and inflation suffer.

# 2.4.2 Interest Rate

This interest rate is seen as one of Bank Indonesia's measures for controlling inflation and stabilizing the exchange rate. According to Ira Rosita Dewi and Sri Artini (2016), interest rates reflect Bank Indonesia's financial policy. Tiryaki et al. (2017), Oshaibat (2017), Ghosh et al. (2018), and Putra (2020) demonstrated that interest rates and stock index returns have a strong negative bond correlation. Nisha (2015) and Nanayakkara & Darshi (2015) research, corroborated by Lim & Sek (2014), show that the return on equity in stock markets in various countries such as Indonesia, South Korea, Philippines, and Thailand has an impact on the exchange rate.

According to Amata, Muturi, and Mbewa (2016), they investigated the relationship between interest rates, stock market volatility, and inflation in Kenya. The study used monthly interval series data for 14 years, from January 2001 to December 2014. The vector error correction model was used to analyze time series data for the long-run causal association between interest rates, inflation, and stock market volatility, while the Granger causality test was utilized to analyze the short-

run relationship. The findings demonstrated a positive and significant long-run association between the rate of inflation and stock market volatility, as well as a positive and significant short-run relationship between inflation and stock market volatility. The study discovered that relation amid the stock market. According Hamid et al.(2017) evaluated the effect of interest rate, inflation, and GDP on the volatility of the exchange rate in Pakistan and observed that interest rate, inflation rate, and GDP are significantly related to exchange rates. However, Sarac and Karagoz (2016) studied the impact of short-term interest rates on exchange rates and found no evidence that higher interest rates cause a weakening of exchange rates.

# **2.5 Conceptual Framework**

A Research Framework is a tool used in research to aid the person conducting the research achieve understanding and consciousness of the condition under study and be able to communicate it. It helps illustrate the causal relationship between the independent variable(s) and the dependent variable. The research framework for this study comprises of inflation and interest rates as independent variables and foreign exchange rates as the dependent variables. The research framework diagram is developed as follows:



DV



Figure 2.1 Conceptual Framework

# 2.6 Research Hypothesis

# 2.6.1 Inflation

A study by Muchiri (2015) found a significant and positive relationship between Kenya's inflation and foreign exchange rates. This shows that the exchange rate in Kenya is directly affected by inflation and rises as inflation grows. According to Kordehfrosh and Tehranchian's research (2015), there is a positive and significant correlation between inflation and foreign currency exchange rates. Based on this discussion, researchers form a hypothesis:

H1: There is a significant positive effect between Inflation and Exchange Rate in Indonesia.

# 2.6.2 Interest Rate

According to Martin (2015), the study's findings also demonstrated an insignificant negative link between interest rates and foreign exchange rates in Kenya. This means that an increase in Kenyan interest rates relative to a foreign country will result in a negligible decrease in the number of Kenya shillings necessary to convert into one unit of foreign currency. effect. This finding leads to the conclusion that there is no significant relationship between interest rates and foreign exchange rates in Kenya. Based on this discussion, the research formed a hypothesis

H2: There is a significant negative effect between the Interest Rate and Exchange rate in Indonesia.

# 2.7 Summary

Based on the conclusion of the literature review, This chapter mainly contains a summary of the literature review and how the authors came up with hypotheses in the second subtopics which also theoretical background. This chapter also contains a conceptual framework.