## MACROECONOMIC VARIABLES ANALYSIS (INFLATION AND BI 7-DAY REVERSE REPO RATE) ON SHARIA BANKING FINANCING IN INDONESIA

## ANALISIS VARIABEL MAKROEKONOMI (INFLASI DAN BI 7-DAY REVERSE REPO RATE) TERHADAP PEMBIAYAAN PERBANKAN SYARIAH DI INDONESIA

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#### ABSTRACT

Macroeconomic variables are numerous, including inflation and interest rates determined by the central bank. The interest rate determined by Bank Indonesia is called the BI 7-Day (Reverse) Repo Rate. Inflation and BI 7-Day (Reverse) Repo Rate in the world of sharia banking in Indonesia are two important things that are always taken into account in carrying out the function of banks as a channel of financing to the public. It can be said that sharia banking financing directly or indirectly is greatly influenced by inflation and the BI 7-Day (Reverse) Repo Rate. To calculate the effect of inflation and BI 7-Day (Reverse) Repo Rate on sharia banking financing, this study was conducted. The data used in this study are inflation data, BI 7-Day (Reverse) Repo Rate and sharia banking financing on a monthly basis from 2010-2019 (120 months). The data is then processed by the statistic method using SPSS software with the t test and F test using. The independent variables used in this research are Inflation and BI 7-Day (Reverse) Repo Rate. Hypothesis testing shows that inflation has no significant effect on Islamic banking financing in Indonesia. Meanwhile, the BI 7-Day (Reverse) Repo Rate variable has a significant effect on Islamic banking financing in Indonesia. The results of the F test show that the inflation variable and the BI 7- Day (Reserve) Repo Rate simultaneously have an influence on Islamic banking financing in Indonesia.

Keywords: Infation, BI 7-Day Reverse Repo Rate, Sharia Banking Financing

#### ABSTRAK

Variabel makroekonomi sangat banyak, termasuk inflasi dan suku bunga yang ditentukan oleh bank sentral. Suku bunga yang ditetapkan oleh Bank Indonesia disebut BI 7-Day (Reverse) Repo Rate. Inflasi dan BI 7-Day (Reverse) Repo Rate dalam dunia perbankan syariah di Indonesia merupakan dua hal penting yang selalu diperhatikan dalam menjalankan fungsi bank sebagai penyalur pembiayaan kepada masyarakat. Dapat dikatakan bahwa pembiayaan perbankan syariah secara langsung maupun tidak langsung sangat dipengaruhi oleh inflasi dan BI 7-Day (Reverse) Repo Rate. Untuk

menghitung pengaruh inflasi dan BI 7-Day (Reverse) Repo Rate terhadap pembiayaan perbankan syariah, penelitian ini dilakukan. Data yang digunakan dalam penelitian ini adalah data inflasi, BI 7-Day (Reverse) Repo Rate dan pembiayaan perbankan syariah secara bulanan dari tahun 2010-2019 (120 bulan). Data tersebut kemudian diolah dengan metode statistik menggunakan software SPSS dengan uji t dan uji F. Variabel independen yang digunakan dalam penelitian ini adalah Inflasi dan BI 7-Day (Reverse) Repo Rate. Pengujian hipotesis menunjukkan bahwa inflasi tidak berpengaruh signifikan terhadap pembiayaan perbankan syariah di Indonesia. Sedangkan variabel BI 7-Day (Reverse) Repo Rate berpengaruh signifikan terhadap pembiayaan perbankan syariah di Indonesia. Hasil uji F menunjukkan bahwa variabel inflasi dan BI 7- Day (Reserve) Repo Rate secara simultan berpengaruh terhadap pembiayaan perbankan syariah di Indonesia.

Kata Kunci: BI 7-Day (Reserve) Repo Rate, Inflasi, Pembiayaan Perbankan Syariah

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# INTRODUCTION

The Islamic banking system has competitors, namely the conventional banking system. Islamic and conventional banking systems differ in many ways (Ahmad, Presley, Elgari, Wilson, & Yousri, 2016). Islamic banking implements almost the same operational process when compared to conventional banks, however, Islamic banking does not add interest (whatever the conditions) from the borrower and does not pay interest (regardless of the conditions) to depositors; profit is the result of a contract that is based on profit sharing between depositors and borrowers (Bader, Ramadilli Mohd, Syed Mohamed, & Hassan, 2008). In carrying out its operational activities, Islamic banking has unique risks. Islamic banks have two forms of risk: the same risks when faced with conventional banks (traditional financial intermediaries) and typical risks related to compliance with activities with sharia law (Sundararajan, 2011). As is the case with conventional banks, a strong risk management framework can also

help Islamic banks reduce risk, and improve their ability to compete in the market (Zammir & Mirakhor, 2008). In banking activities, there are three main types of risk: market risk, credit risk and operational risk. Like conventional banks, Islamic banks are subject to this risk (Ahmad et al., 2013). These three risks can have an impact on the function of Islamic banking as а fundraiser. intermediation and distribution of financing.

Islamic banking is very vulnerable to risk. The risk of financing in Islamic banks can occur due to internal factors and external factors. Internal risk factors for financing in Islamic banks, for example, because there is a bank error in managing the financing provided to customers. It can also occur because of the moral hazard of customers who are given financing, resulting in default or External bad financing. factors of financing risk in Islamic banks, for caused by worsening example, are macroeconomic variables. variables Macroeconomic include inflation and interest rates set by the

central bank (BI 7-Day Reverse Repo Rate).

defined by Inflation is many researchers as an increase in the prices of goods and services simultaneously in a continuous period. An increase in the price of some goods or services does not constitute inflation, unless it extends (or affects a significant price increase) to other goods. the reverse definition of inflation is what is called deflation. Meanwhile, the interest rate set by the Central Bank of Indonesia (Bank Indonesia) is called the BI Rate. BI Rate is a policy interest rate that reflects the monetary policy stance that is processed and determined by Bank Indonesia and published to the public. The development of the BI Rate in Indonesia from the past few years up to now shows a fluctuating trend. Since 19 August 2016, Bank Indonesia has replaced the BI Rate with the BI 7-Day (Reverse) Repo Rate, in order to strengthen the monetary operation framework. This strengthening of the monetary operation framework is a common practice in various central banks and is an international best practice in the conduct of monetary operations. The monetary operations framework is continually being refined to strengthen policy effectiveness in achieving the set inflation target. The BI 7-Day (Reverse) Repo Rate instrument is used as the new policy rate because it can quickly influence the money market, banking and real sectors. The BI 7-Day (Reverse) Repo Rate instrument as a new reference has a stronger relationship to money market interest rates, is transactional or traded on the market, and encourages financial market deepening, particularly the use of instrument the repo (Ministry of Communication, 2016).

Low and stable inflation and the determination of interest rates by the central bank (BI 7-Day Reverse Repo Rate) are prerequisites for sustainable economic growth. It is hoped that this sustainable economic growth will have a positive impact on the burden of sharia, particularly in sharia banking financing to the public. Based on the description above, the aim of this study in general is to examine the effect of macroeconomic variables on Islamic banking financing in Indonesia. Specifically, the purpose of this study is to determine the effect of inflation and the BI 7-Day (Reverse) Repo Rate on Islamic banking financing in Indonesia.

## LITERATURE AND METHOD

## Sharia Banking and Financing

Islamic banking is often referred to as Islamic banking. Islamic banking is a worldwide phenomenon involving various institutions and instruments. Islamic institutions and instruments have been developed in many countries during the last few decades (Hassan, 2006). Islamic banking in a number of Muslim countries is the last resort to revive Islamic finance ((IRTI), 2011). Islamic banking does not start with a well developed theoretical model. In fact, ideological considerations are driving a movement towards interest-free finance banking (Islamic, 2009). and important point to note in all models of Islamic banking, and also for Islamic finance in general, is that finance is always related to real economic activity or investment (& Wolfman, 2013).

In a modern economy, financing has long been a determining factor in terms of growth and stability at the national and international levels (Lumpur, 2009). Financing is one of the main tasks of Islamic banks, namely providing facilities for provision of funds to meet the needs of parties who are deficit units. The term financing essentially means I Believe, I Trust, "I believe" or "I put my trust". The word financing which means trust, means that the financing institution as the shahibul mall puts trust in someone to carry out the mandate given. These funds must be used properly, fairly and must be accompanied by clear ties and conditions, as well as mutually beneficial for both parties (Prof. Dr. Rivai. V. M.B.A and AP. Veithzal B, Acct, 2008).

Sharia bank financing the is provision of funds or equivalent claims in the form (OJK, 2008); (1) Profit sharing transactions in the form of mudharabah and musyarakah; (2) Leasing transactions in the form of ijarah or lease purchase in the form of ijarah muntahiya bittamlik; (3) Sale and purchase transactions in the form of murabahah, salam and istishna receivables; (4) Lending and borrowing transactions in the form of gardh receivables; and (4) Service leasing transactions in the form of ijarah for multi-service transactions based on an agreement or agreement between a sharia bank and / or UUS and other parties requiring the party financed and / or given a fund facility to return the funds after a certain period of time in exchange for ujrah, without reward, or for the results.

# Inflation

Al-Maqrizi stated that inflation is a natural phenomenon that has befallen the lives of people around the world from ancient times until now. According to him, inflation occurs when prices generally increase and take place continuously. Al-Maqrizi classifies inflation into 2 types (Chamid, 2010):

- 1. Inflation which is caused by natural factors that cannot be avoided by mankind, for example due to natural disasters.
- 2. Inflation caused by human error. Human error can lead to inflation, there are three. First, corruption and poor administration. Second, excessive taxes. Third, improving the circulation of currency money.

# Interest Rate and BI 7-Day Reverse Repo Rate

The interest rate is the cost of borrowing or the price paid on leasing funds (usually as a percentage of the \$ 100 per year lease of cash). There are many forms of interest rates in the economy, for example, mortgage rates, car loan rates, and interest rates for various other forms of loans (Frederic S. Mishkin, 2007). Interest rates can also be in the form of bank interest. Bank interest can be interpreted as remuneration provided by banks by conventional banks to customers who buy or sell their products. Interest can also be interpreted as the price that must be paid to customers (who have savings) and must be paid by customers to the bank (customers who receive loans). In banking activities, there are 2 types of interest given to customers, namely deposit interest and loan interest (Kasmir, 2002).

Bank Indonesia hopes that the use of the BI 7-Day (Reverse) Repo Rate as the new policy rate will have three main impacts. First, strengthening monetary policy signals with the 7-day (Reverse) Repo Rate as the main reference on the financial market. Second, the increased monetary effectiveness of policy transmission through its influence on movements in money market interest rates and bank interest rates. Third, the formation of a deeper financial market, transactions particularly and the formation of an interest rate structure on the interbank money market (PUAB) for a tenor of 3-12 month.

Based on a literature review pointed out earlier, the hypothesis tested in this study is:

**Hypotesis 1:** It is suspected that inflation partially affects Islamic Banking Financing.

**Hypotesis 2**: It is suspected that the BI 7-Day Reverse Repo Rate partially affects Islamic Banking Financing. **Hypotesis 3**: It is suspected that inflation and the BI 7-Day Reverse Repo Rate simultaneously affect Islamic Banking Financing.

## **Research Method**

The data used in this study consist of inflation data, 7-day BI (Reverse Repo Rate) and monthly Islamic Banking Financing from 2010-2019 which were obtained from the official website of Bank Indonesia and the Financial Services Authority. The data is then processed by statistical methods using SPSS software with t test and F test. The independent variables used in this study are Inflation and BI 7-Day (Reverse Repo Rate). The following is the statistical model specification for this research:

 $Y = a + b_1 X_{1+} b_2 X_2 + e$ 

- Y : Sharia Banking Financing
- a : Constant
- b : Regression line coefficient
- X<sub>1</sub> : Inflation
- X<sub>2</sub> : BI 7-Day (*Reverse Repo Rate*)
- e : Epsilon (error term)

## **RESULT AND DISCUSSION**

Multiple regression analysis was conducted to determine the effect of: Inflation (X1) and BI 7-Day Reverse Repo Rate (X2) on Islamic Banking Financing (Y). The multiple linear regression formula is as follows:

 $Y = a + b_1 X_{1+} b_2 X_2 + e$ 

- Y : Sharia Banking Financing
- a : Constant
- b : Regression line coefficient
- X1 : Inflation
- X2 : BI 7-Day (Reverse Repo Rate)
- e : Epsilon (error term)

#### Table 1 Result t test

Coefficients <sup>a</sup>									
		Unstandardized Coefficients		Standardized Coefficients					
Model		В	Std. Error	Beta	t	Sig.			
1	(Const ant)	33.828	.295		114.719	.000			
	Inflatio n	.048	.039	.147	1.220	.225			
	bi_rate	.130	.064	.245	2.042	.043			

Source: Results processed by SPSS, 2020

Table 2 Result F test

ANOVAª								
	Sum of		Mean					
Model	Squares	Df	Square	F	Sig.			
Regression	4.687	2	2.344	8.881	.000 <sup>b</sup>			
Residual	30.878	117	.264					
Total	35.566	119						

Source: Result processed by SPSS, 2020

Table 3Koefisien Determinasi (R²)

Model Summary<sup>b</sup>

Model	R	R Squa re	Adjuste d R Square	Std. Error of the Estimat e	Change Statistics		
					R Square Chang e	F Change	df1
1	.363ª	.432	.217	.51372 92	.132	8.881	2

Source: Result processed by SPSS, 2020

#### **T** Test Result

The t test or partial significance test is used to test whether an independent variable (independent) has an effect on the dependent variable or not. In this study, the t test was used to determine the effect of Partial Inflation (X1) and BI 7-Day Reverse Repo Rate (X2) on Islamic Banking Financing (Y). If sig t> 0.05 then there is no significant effect and if sig t <0.05 then there is a significant effect (Sujarweni, 2014). The test results are as follows;

a) Testing Hypothesis 1 (Effect of Inflation on Islamic Banking Financing))

The significance value for inflation (X1) is 0.225 which means sig t (0.225)>

0.05. This shows that partially inflation (X1) does not have a significant effect on Islamic Banking Financing (Y). The results of this study support what has been done by (RAB, 2004) and (Dahlan, 2015) which states that inflation has no effect on financing in Islamic banks. Inflation has no influence on Islamic bank financing, due to the financing scheme that has been implemented by the Islamic bank itself. For example, Islamic bank financing with а mudharabah contract. With а mudharabah contract, the profit sharing will be distributed according to the agreed proportion (not nominal benefits based on interest). Thus, inflation will not affect the profit sharing between mudarib (customers) and sahibul mal (Islamic banks). In contrast to the case of interestbased financing in conventional banks, the bank as a creditor will experience more losses due to inflation than the losses suffered by customers.

# b) Testing Hypothesis 2 (Effect of BI 7-Day Reverse Repo Rate on Islamic Banking Financing)

The significance value for the BI 7-Day Reverse Repo Rate (X2) is 0.043 which means sig t (0.043) < 0.05. This means that partially the BI 7-Day Reverse Repo Rate (X2) has a significant effect on Islamic Banking Financing (Y). This result strengthens the research conducted by (Sanica, Nurcita, Mastra, & Sukarnasih, 2018) which states that the implementation of the BI 7-Day Reserve Repo Rate is the right step in monetary policy which has an impact on reducing loan interest rates, thereby encouraging financing growth. The BI 7-Day Reserve Repo Rate is a substitute for the BI Rate previously applied by BI in determining the benchmark interest rate. The BI 7-Day Reserve Repo Rate has a stronger relationship to money market rates, which has resulted in lower financing Thus, it is hoped that the rates. implementation of the BI 7-Day Reserve Repo Rate will increase financing in

banks, including financing in Islamic banks.

# F Test Result

The F test is also called the global test or simultaneous significance test intended to see the overall ability of the independent variables to be able or able to explain the behavior or diversity of the dependent variable (Suharyadi and Purwanto, 2013). The F test in this study is intended to see the effect of inflation (X1) and BI 7-Day Reverse Repo Rate (X2) simultaneously or simultaneously on Islamic Banking Financing (Y). If the sig value> 0.05, there is no significant effect. If the sig value <0.05, there is a significant effect.

c) Testing Hypothesis 3 (Effect of Inflation and BI 7-Day Reverse Repo Rate on Islamic Banking Financing)

The significance value for the F test is 0.00 <0.05. This means that there is a simultaneous influence between inflation and the BI 7-Day Reverse Repo Rate on Islamic Banking Financing. The coefficient of determination (Adjusted R Square) is 0.217 or 21.7%. This value indicates that the movement of Islamic Banking Financing in the 2010-2019 period was influenced by the inflation variable and the BI 7-Day Reverse Repo Rate of 21.7%. While the remaining 78.3% is influenced by other variables.

# CONCLUSION

Based on the results of hypothesis testing, it shows that the partial level of inflation has no significant effect on Islamic Banking Financing. This is indicated by a significance value of 0.225 which is greater than the significance level (0.05). Meanwhile, the BI 7-Day Reverse Repo Rate partially has a significant effect on Islamic Banking Financing. The BI variable 7-Day Reverse Repo Rate partially has a significant and positive effect on Islamic Banking Financing. This is indicated by a significance value of smaller which is 0.043 than the significance level (0.05) and a positive value of 2.042. The results of this study indicate that the relationship between the BI 7-Day Reverse Repo Rate and Islamic Banking Financing is unidirectional or positive, where when the BI 7-Day Reverse Repo Rate increases by 1 unit, Financing the Sharia Banking will increase by 2.042 points. Finally, the simultaneous test results (Test F) show that the inflation variable and the BI 7-Day Reverse Repo Rate simultaneously have a significant effect on Islamic Banking Financing during the 2010-2019 period. This is indicated by a significance value of 0.00 which is smaller than the significance level (0.05). The coefficient of determination (Adjusted R Square) is 0.217 or 21.7%. This value shows that Islamic Banking Financing during the 2010-2019 period was influenced by the inflation variable and the BI 7-Day Reverse Repo Rate of 21.7%, while the remaining 78.3% was influenced by other variables.

# REFERENCES

- (IRTI), I. R. & T. I. (2011). Articles on Finance & MAS, Human Devt, Resource Allocatin & MAS andI-HDI. Islamic Economic Studies, 19(No.2), 147.
- & Wolfman, L. S. B. A. (2013). 済無No Title No Title. Journal of Chemical Information and Modeling, 53(9), 1689–1699. https://doi.org/10.1017/CBO978 1107415324.004
- Ahmad, K., Presley, J. R., Elgari, M. A., Wilson, R., & Yousri, A. (2016). *Islamic economic studies*. 24(2).

- Ahmad, K., Presley, J. R., Elgari, M. A., Wilson, R., Yousri, A., & Islahi, A. A. (2013). Lessons from the History. 21(2).
- Bader, M., Ramadilli Mohd, S., Syed Mohamed, M., & Hassan, T. (2008).
  Cost, revenue, and profit efficiency of Islamic versus conventional banks: international evidence using data envelopment analysis. *Islamic Economic Studies*, 15(2), 23–76.
- Chamid, N. (2010). *Jejak Langkah Sejarah Pemikiran Ekonomi Islam*. Jakarta: Pustaka Pelajar.
- Dahlan, R. (2015). Pengaruh Tingkat Bonus Sertifikat Bank Indonesia Syariah Dan Tingkat Inflasi Terhadap Pembiayaan Bank Syariah Di Indonesia. *Etikonomi*, *13*(2), 104–117. https://doi.org/10.15408/etk.v13i 2.1881
- Departemen Komunikasi. (2016). BI 7-Day Reverse Repo Rate Tetap 5,25%. Retrieved August 20, 2009, from Bank Indonesia website: https://www.bi.go.id/id/moneter /bi-7day-RR/penjelasan/Contents/Default.a spx
- Frederic S. Mishkin. (2007). *The Economics of Money, Banking, and Financial Markets.* Boston: Pearson.
- Hassan, M. K. (2006). The X-Efficiency In Islamic Banks. *Islamic Economic Studies*, 13(2), 50–78.
- Islamic, I. (2009). Islamic Finance Undergraduate Education. *Islamic Economic Studies*, *16*(1), 1–29.

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- Kasmir. (2002). Bank dan Lembaga Keuangan Lainnya. Jakarta: PT. RajaGrafindo Persada.
- Lumpur, K. (2009). Professor of Economics at the International Centre for Education in Islamic Finance (INCEIF), Kuala Lumpur, Malaysia (earlier version of the paper was presented to the Islamic Finance Education Symposium 2008, held in the International Islamic University . 16(1).
- OJK. Undang-Undang Republik Indonesia Nomor 21 Tahun 2008 Tentang Perbankan Syariah. , Pub. L. No. 21, المجلد 49 Otoritas Jasa Keuangan 69 (2008).
- Prof. Dr. Rivai. V. M.B.A dan AP. Veithzal B, Acct, M. B. (2008). Islamic Financial Management "Teori, Konsep dan Aplikasi untuk Lembaga Keuangan, Nasabah, Praktisi dan Mahasiswa. Jakarta: PT. RajaGrafindo Persada.
- RAB, H. (2004). Impact of Inflation on Mudarabah Profits: Some Observations. Journal of King Abdulaziz University-Islamic Economics, 17(2), 21–25.

https://doi.org/10.4197/islec.17-2.2

- Sanica, I. G., Nurcita, I. K., Mastra, I. M., & Sukarnasih, D. Μ. (2018). Effectiveness and Forecasting of Interest Rate Reversal BI 7-Day Repo Rate in Indonesia: Lower Bound Monetary Policy? on Mediterranean Journal of Social 171-180. Sciences, 9(1), https://doi.org/10.2478/mjss-2018-0016
- Suharyadi dan Purwanto. (2013). Statistika untuk Ekonomi dan Keuangan Modern. Jakarta: Salemba Empat.
- Sujarweni, V. W. (2014). SPSS untuk Penelitian. In *SPSS untuk Penelitian*. Yogyakarta: Yogyakarta.
- Sundararajan, V. (2011). Supervisory Implications of Profit Sharing Investment Accounts. *Islamic Economics Studies*, 19(1), 41–62.
- Zammir, I., & Mirakhor, A. (2008). Pengantar Keuangan Islam: Teori dan Praktik. In *Jurnal Ekonomi Islam* (Vol. 4). Jakarta: Kencana.