



The Differences between Murabahah and Musharakah Muatanaqisah Contract Payments Using the Time Value of Money Method (Study Case: PT Sarana Perumahan Mandiri)

Adam Arief Wibawa¹, Oktofa Yudha Sudrajad²

^{1,2} School of Business and Management, Institute Technology Bandung, Indonesia

ABSTRACT: Indonesia's population is expected to grow by 68% by 2050, with the government aiming to improve living conditions and promote economic expansion. The Million Homes Program will determine the nation's future. Islamic banks offer mortgage financing options, including Musharakah, Murabahah, and Ijarah contracts. These contracts require a thorough risk assessment and understanding of each party's responsibilities. The study aims to determine the ideal contract for Islamic bank mortgages, allowing developers to advise clients on their use before purchasing subsidized homes. The authors used contracts called Murabahah and Musharakah to calculate financing, but found that the equivalent rates on each contract varied, raising concerns about the amount of finance developers and buyers need to provide. The Time Value of Money technique was employed to calculate the cost difference between the Murabaha and Musharakah contracts. The results suggest that customers may choose Bank Syariah B or Bank Syariah A based on lower equivalent rates and stability. With a margin of 67.79% in the Musharakah contract, Bank Syariah B can be chosen with an equivalent rate of 7.5% for the first 13 years, 10.1% on the 14th year, and then falling back to 10.1% on the 15th year.

KEYWORDS: Islamic Finance, Murabahah, Musharakah Muatanaqisah, Margin, Equivalent Rate, Time Value of Money.

INTRODUCTION

Indonesia is a Southeast Asian nation composed of thousands of islands and home to more than 270 million people. The housing market has undergone tremendous growth in recent years as a result of urbanization, a growing middle-class, and government programs to encourage homeownership. Indonesia's economy has developed at an average annual rate of roughly 5% over the past decade, fueled by local consumption, manufacturing, and foreign investment (World Bank, 2020). This expansion has raised the need for housing, particularly in metropolitan regions, as people migrate from rural to urban areas in quest of employment and improved living conditions.

More than half of the Indonesia population resides in urban areas, according to the Central Bureau of Statistics (2018). This tendency is anticipated to continue, with the United Nations forecasting that 68% of Indonesia's population will reside in urban areas by 2050. (Nation, 2018). The Indonesian government has taken initiatives to provide access to inexpensive housing in response to this trend. In 2015, the government established the Million homes Program to provide low- and middle-income households around the nation with affordable homes. The program has constructed tens of thousands of new houses and flats with an emphasis on providing access to essential utilities like as clean water, sanitation, and power. According to data from the Ministry of Public Works and Public Housing (PUPR), between 2015 and 2020, 3,9 million subsidized housing units were constructed in Indonesia. The construction of social housing was a component of the Indonesian government's initiative to increase access to housing for low-income families.

In accordance with PUPR Ministerial Regulation No. 35 of 2021, the Indonesian government has implemented a subsidized housing program to address the problem of affordable housing for low-income households. This program seeks to provide eligible individuals with housing financing convenience and/or assistance. However, the demand for affordable housing exceeds the available supply, posing a number of difficulties for businesses in the housing industry. The use of Islamic financing contracts, particularly in the mortgage system, which is preferred by many Indonesians, is an important aspect of the program. These contracts include Murabahah, Musharakah, and Ijarah, each of which offers distinct benefits and drawbacks for financing the development of housing. However, it is still unclear which contract is most appropriate for this purpose.

It is essential to compare the effectiveness of Murabahah, Musharakah, and Ijarah contracts in financing housing development in order to determine the best option. This analysis should consider factors such as the varying costs incurred by customers of various



Islamic banks. In addition, it is essential to investigate the practical challenges associated with implementing these contracts, such as Sharia compliance and legal and regulatory obstacles.

As reported by the OJK in 2022, the number of consumers utilizing Murabahah and Musharakah contracts has increased significantly. To ensure the smooth execution of these contracts, however, explicit regulations and adequate oversight are necessary for their implementation.

Consequently, the purpose of this journal is to provide an introduction to a study that investigates the effectiveness of Murabahah, Musharakah, and Ijarah contracts in financing housing development. This research aims to contribute to the comprehension of the optimal financing options for affordable housing in Indonesia by analyzing the advantages and disadvantages of each contract as well as addressing legal and regulatory challenges.

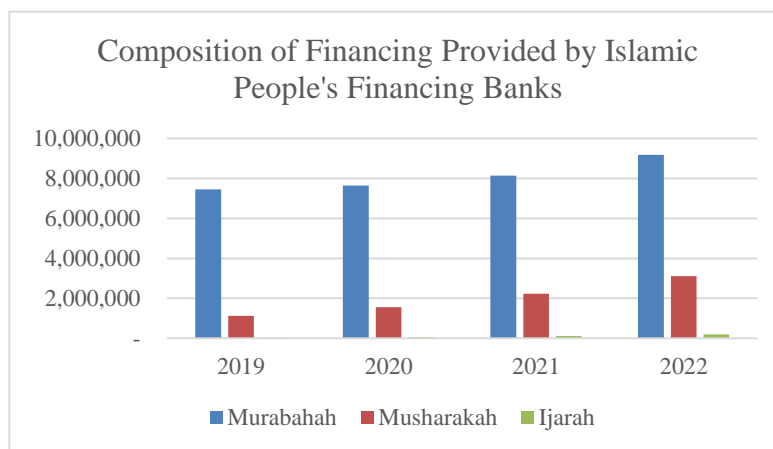


Figure 1. Composition of Financing Provided by Islamic People's Financing Banks
(Source: Sharia Banking Statistics from OJK)

In the implementation of Sharia-based housing finance, consumer preferences play a pivotal role. To comprehend these preferences, consumer perceptions and beliefs regarding Murabahah, Musharakah, and Ijarah contracts must be investigated. This study seeks to investigate the factors that influence consumer preferences, including adherence to Sharia principles and levels of satisfaction with the offered financial products. This research aims to provide a deeper understanding of the effectiveness of housing development financing through Murabahah and Musharakah contracts, particularly in the context of the challenges posed by the modern economy, by analyzing consumer preferences. This study's findings will aid in the development of effective marketing strategies and product modifications.

In order to improve the practices and provide greater benefits to the community and financial institutions involved, the research also seeks to identify the obstacles associated with implementing Sharia-based housing finance. This study aims to advance Sharia-based housing finance by investigating consumer preferences, evaluating the efficacy of financing methods, and addressing the challenges posed by a dynamic economy.

THEORITICAL FONDATION

A. Islamic Finance

Islamic finance is a distinct financial system that adheres to Sharia (Islamic law) as its guiding value system. Islamic financial institutions seek to promote inclusive growth, fair risk allocation, social justice, and equitable wealth distribution through the use of financial instruments that adhere to Islamic principles and Shariah regulations. Therefore, Islamic finance and Islamic financial institutions are an ethical alternative to conventional banking and financial systems (Harison & Ibrahim, 2016).

The largest category, Islamic finance, encompasses Islamic banking, financial management, and risk management in accordance with Islamic principles. Includes Islamic finance assets as well as consumer perceptions of Islamic financial services and products. Islamic finance, also known as sharia-compliant finance, is a financial system that adheres to Islamic principles and regulations. It



is founded on the Sharia principles that prohibit interest (riba), speculation (gharar), and investment in prohibited activities (haram). Aligned with Islamic values, Islamic finance promotes ethical and socially responsible investment practises (Hassar & Aliyu, 2017). According to Ghulamallah et al (2021), Islamic finance generally refers to financial practises governed by Islamic or Sharia law, such as conducting business activities without interest or usury by utilising a profit-sharing mechanism (mudrabah and Musharakah contracts). Islamic finance is the result of a discrepancy between conventional law and the regulatory framework of Islamic finance under the country's legal system (Mustapha, Kunhibava, & Muneeza, 2020). In Islamic finance, there are Three Principles of Governing Islamic Finance that serve as a guide; the following are the Three Principles of Governing Islamic Finance according to the International Monetary Fund (Hussain, Shahmoradi, & Turk, 2015).

1. Principle of equity:

Scholars typically cite this principle as the justification for the prohibition of predetermined payments (riba) in order to safeguard the weaker contracting party in a financial transaction.

2. Principle of participation:

Although commonly referred to as interest-free financing, the prohibition on usury does not imply that capital should not be rewarded. According to a key Shari'ah ruling that "reward (that is, profit) comes with risk-taking," investment returns must be earned in tandem with risk-taking and not merely with the passage of time, which is also the basis for prohibiting usury.

3. Principle of ownership:

The rulings "do not sell what you do not own" (such as short-selling) and "you cannot be dispossessed of a property except on the basis of right" require asset ownership prior to a transaction.

B. Contract in Islamic Finance

Islamic Finance and Islamic Banking are two key concepts of the Islamic sharia-based financial system. The contract, which governs the relationship between parties involved in financial transactions, is one of the most essential aspects of Islamic Finance and Islamic Banking (Khan, 2005). Based on research and relevant journals, we will explain the concept of contract in Islamic Finance and Islamic Banking.

In Islamic Finance and Islamic Banking, a contract refers to a valid agreement governed by Islamic sharia principles between two or more parties. Contract in this context entails agreement and the fulfillment of sharia's conditions (Al-Omar, Fuad, & Mirakhor, 2009). In Islamic Finance and Islamic Banking, financial transactions are based on contracts that guarantee impartiality and adherence to sharia principles. The varieties of contract in Islamic Finance and Islamic Banking are as follows (Siddiqi & Nejatullah, 2006):

a) Mudharabah

Mudharabah contract is an agreement between an investor (rab al-mal) and a capital manager (mudharib), wherein the investor provides capital and the capital manager administers the business. Losses are sustained by investors, while profits are split in accordance with a predetermined ratio.

b) Musharakah

A Musharakah contract is an agreement between two or more parties to share capital, management, and risks in a joint venture. Profits and losses are distributed in accordance with the agreement.

c) Murabahah

A Murabahah contract is a sale and purchase agreement with profits disclosed. The bank purchases products at the client's request and sells them at an agreed-upon price. Credit cards or other payment methods agreed upon in advance are accepted.

d) Ijarah

An Ijarah contract is a rental agreement involving the transfer of usufructuary rights over products or services for a specified time period. The party who rents (mu'jir) pays the party who rents (mu'jir) rental fees.

e) Istisna

An Istisna contract is an agreement to manufacture products in accordance with particular specifications. The party ordering (mustasni) and the party making (sani) concur on a price and completion date for the goods.

The contract is a crucial contract in Islamic Finance and Islamic Banking. In Islamic Finance, the contract ensures that all financial transactions adhere to the principles of Islamic sharia. Islamic Finance and Islamic Banking employ numerous contract varieties,

including Mudharabah, Musyarakah, Murabahah, Ijarah, and Istisna. Islamic Finance and Islamic Banking can conduct business ethically and in accordance with Islamic sharia principles if they comprehend and implement the correct contract.

C. Murabahah Contract

Murabahah is a well-known Shari'ah-compliant sale transaction utilized primarily in commerce and asset financing. The bank purchases the products and delivers them to the customer while deferring payment until a mutually agreed upon date. Typically, the expected return on murabahah is aligned with interest payments on conventional loans, making murabahah sales comparable to asset-backed loans. However, murabahah is a sale with deferred payment in which the intention is to facilitate the acquisition of products and not to exchange money for more money (or monetary equivalents) over time (Hussain, Shahmoradi, & Turk, 2015).

In Indonesia, there are two categories of murabahah purchase orders: non-binding and binding. A client who orders assets from a supplier is currently considered to owe the supplier cash. The bank repays the debt, and the supplier transfers the debt to the bank (Gholamreza, Mohd, Ariffin, & Shahabi, 2012). In Islamic financing, the murabaha contract's operational mechanism is as follows:

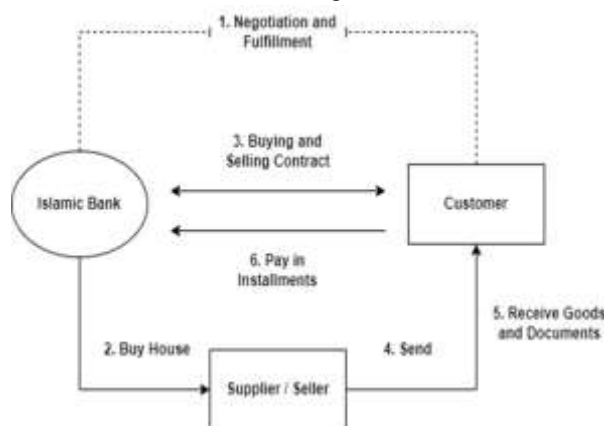


Figure 2. Murabahah Contract Scheme

Information:

- 1) Islamic institutions and clients negotiate the sale and purchase transaction plans to be executed. The type of goods to be purchased, the quality of the goods, and the selling price are all negotiating points.
- 2) Islamic banks enter into sales and purchase agreements with customers, with Islamic banks acting as vendors and customers as purchasers. In this sale-and-purchase agreement, the customer determines both the products to be sold and their selling price.
- 3) On the basis of the contract between Islamic banks and their clients, Islamic banks purchase products from their suppliers. Purchases made by Islamic banks are in accordance with contractually stipulated consumer preferences.
- 4) Suppliers fulfill customer orders placed with Islamic institutions.
- 5) The customer receives products and documentation from the supplier, and then makes payment. Typically, consumers make payments through installments.
- 6) Following receipt of the products and paperwork, the customer makes payment. Installment payments are a typical method of payment for customers.

Banks revalue debt from cash prices to installment prices despite the prohibition on revaluing debt. The higher price typically extends the payment period, which increases the risk exposure. The Sharia concern on murabahah contract is the tenor used for installment period in consumer financing such as multi-finance and mortgage. Many Islamic scholars contend against the use of the murabahah scheme for terms longer than five years (Al-Zuhayli, 1989). As a form of finance, Murabahah is utilized in the majority of Islamic nations, including Indonesia, when the bank purchases a commodity only after the consumer agrees to purchase it from the bank at a markup (Chapra, 1985).

D. Musharakah Contract

Musharakah Mutanaqisah is a derivative of the Musharakah contract, which is a cooperation agreement for the proprietorship of an item or asset between two or more parties (Julianti & Wibowo, 2021). In this cooperation, the ownership rights of one party will diminish, while the ownership rights of the other party will increase. The transfer of ownership is accomplished through the payment of other property rights (Waluyo, 2014).

Musharakah Mutanaqisah (MMQ) is a product development of a product based on profit-sharing, namely the Musharakah contract. Musharakah Mutanaqisah can be used as a sharia banking financing product based on the principle of syirkah 'inan, in which the portion of capital (Hishshah) of one of the syarik (partners), namely the bank, is gradually transferred to the sharik (partners), namely the customers (OJK, 2016).

The quantity of Islamic bank capital is decreasing, inversely proportional to the monthly increase in customer capital resulting from instalment payments. At the conclusion of the financing period, the customer has acquired 100 percent of the bank's capital, transferring ownership of the property to the customer's name. In the Musharakah Mutanaqisah contract, there are a number of risks, and the risk associated with Musharakah financing include the following (Hosen, 2016):

- 1) Ownership Risk
In Musharakah Mutanaqisah financing, the bank and the customer continue to share joint ownership of the products. This is the result of Musharakah Mutanaqisah funding.
- 2) Risk Regulatory
In Musharakah Mutanaqisah, the financing of products is governed by the relevant laws. One of the rules governing Musharakah Mutanaqisah is the imposition of a Value-Added-Tax (VAT) on the possession of products. Based on Law No. 18 of 2000, which is an amendment to Law No. 8 of 1983, VAT is imposed.
- 3) Market Risk
The price of a product will fluctuate based on market conditions. Regional differences in Musharakah Mutanaqisah cooperation result in price differences that prevent banks from equating prices, and financing ownership of products through the Musharakah Mutanaqisah scheme is a form of joint purchase between Islamic banks and customers.
- 4) Risk of Credit (Financing)
The monthly installments of the Musharakah Mutanaqisah financing process will pose a credit risk. If the consumer is unable to fulfill his monthly obligations, there may be a decrease in performance.

However, the lessee is also responsible for the asset's maintenance, unless the lessee's negligence causes harm to the leased asset. This risk component is required for Musharakah payments to be permissible. The scheme known as Musharakah Mutanaqisah can be described as follows:

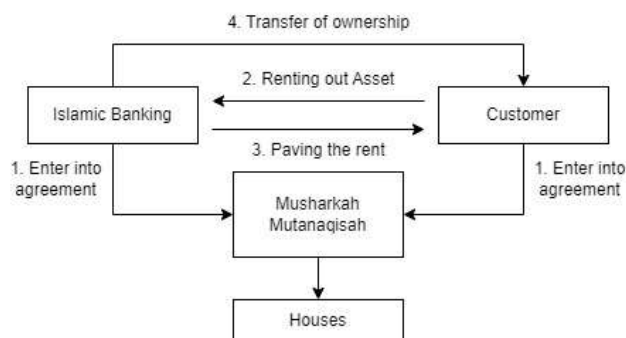


Figure 3. Musharakah Contract Scheme
Source: (Asadov et al (2018))

According to research conducted by Asadov et al (2018), the agreement between the bank and the customer regarding the Musharakah Mutanaqisah contract must pass through the following stages:

- 1) The consumer and the bank work together to manage capital for the purchase of a home or property.
- 2) The bank and the consumer become co-owners of a property or home based on the ratio of payment for the purchase of the property or home.

- 3) The bank begins to share and agree on profits and losses with customers for a predetermined period (during which the customer must pay a monthly rent to the bank).
- 4) The customer progressively acquired the bank-owned property during this period.
- 5) Furthermore, the bank's ownership is transferred to the customer, who now has entire ownership of the property

E. Ijarah Contract

Ijarah is a contract that facilitates the transfer of use rights (benefits) to an item or service for a specified period of time in exchange for rent or wages, without the subsequent transfer of ownership. The ijarah contract is manifested in ijarah financing products, such as applications for financing for education costs, medical expenses, shop or kiosk rentals, and others (Neli, 2022). According to Hussein et al (2015), Ijarah is a contract for the sale and purchase of the right to use an item for a specified time period. The lessee is required to retain ownership of the leased asset for the duration of the lease. Since the lessee retains ownership, assets can be repossessed if the lessee fails to make payments.

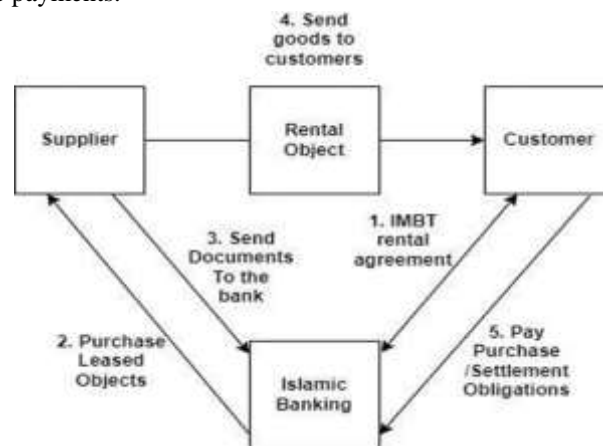


Figure 4. Ijarah Contract Scheme

Source: (Neli, 2022)

Information:

- 1) Islamic banks and their clients engage into Ijarah Muntamiyyah Bit Tamlik agreements. In the contract, the subject of the lease, the duration of the lease, the imbalance owed by the lessee to the lessor, the lessee's option rights after the lease period expires, and other provisions are specified.
- 2) Islamic institutions acquire leased assets from vendors. The assets acquired by Islamic banks correspond to the requirements of the tenants.
- 3) After preparing the goods for rental, the supplier sends the Islamic bank documentation of the goods purchased, and the Islamic bank pays the supplier.
- 4) The supplier ships the leased item to the customer per the instruction of an Islamic bank. Because the products' documents are submitted to Islamic banks, they are not accompanied by shipping documents.
- 5) Following receipt of the leased products, the customer begins making payments for the contract's unpaid balance. The fees that Islamic institutions collect are known as rental income. Monthly, customers pay rental fees to Islamic institutions in general. If the lease period expires and the customer chooses to purchase the leased object, the customer will pay any remaining balance and the Islamic bank will deliver ownership documents.

F. Time Value of Money

The time value of money is a concept stating that money today is worth more than the same quantity of money in the future due to the earning potential of that money when invested or saved. The concept is founded on the premise that, due to inflation and interest rates, a money today is worth more than a money in the future. The concept is founded on the premise that, due to inflation and interest rates, a money today is worth more than a money in the future.



According to research by Kieso et al (2019), the time value of money is a fundamental concept in finance and accounting that enables individuals and businesses to make prudent financial decisions. The time value of money can be used to calculate the present value of future cash flows and to determine the interest rate required to invest a sum of money to attain a specific future value (Jr, 2019).

Aside from its function as a justification for a modern financial decision, TVM is expressly forbidden in Islamic economics. In Islam, it must be acknowledged that humans have inherent requirements based on their inherent characteristics (Baehaqi, Nasution, & Hudaefi, 2020). To meet these requirements, however, individuals (owners of capital) are constrained by sharia law and religious and moral values (Muda & Hasibuan). Positive Time Preference is legally recognized through the permissibility of contractual increases in deferred sales. On the premise of usufruct rights (manfa'ah), some argue that an increase in deferred sales is permissible. Under a sales agreement with TVM, the purchaser receives both the asset and its use, and is therefore anticipated to pay more for immediate use.

With capital guarantee, IFI (Islamic Financial Institution) receives a predetermined increase in BBA (al-bai' bitsaman ajil) with margin. Therefore, it is essential to determine why predetermined returns are not permitted in loans (currency now for more money in the future) or murabahah, but are permitted in BBA (al-bai' bitsaman ajil). As previously explained, murabahah and Musharakah are classified as qardh if the principal is guaranteed and the increase (return) is predetermined; consequently, they are subject to the same laws as qardh, particularly with regard to TVM.

BBA (al-bai' bitsaman ajil) is a sale and purchase contract, which must be founded on fairness, as explained by al-Kasani and other jurists, whereas qard and Murabahah (which also take the same law) are loans. qardh (if the increment is predetermined) is determined by ihsan (virtue). If an increase is predetermined, the principle of ihsan is violated, as ihsan entails going above and beyond what is required and thus requires no counter-value.

Murabahah is the sale of products in which the buyer sets the purchase price and then pays the same price plus profit. According to Sharia Banking, murabahah is a contract for the sale and purchase of commodities that specifies the acquisition price and agreed-upon profit (margin). In contrast, bai bitsaman ajil is a sales agreement and not a loan. Since BBA is a firm sale and purchase rather than a spot sale and purchase (Bai= purchasing and selling, Tsaman= price, Ajil= suspension), it falls within the category of transactions permitted by sharia. Therefore, the profit from purchasing and selling BBA is permissible under sharia, while the profit from borrowing is usury, which is prohibited.

The temporal value of money refers to the observation that receiving money sooner rather than later is preferable. Today's capital can be invested for a reasonable rate of return, earning more money tomorrow. There are two methods for estimating the Time Value of Money: Future Value and Present Value, as explained below.

1) Future Value

The future worth of a present amount is calculated by compounding interest over a set time period. Compound interest yields of x percent or x percent interest compounded annually, semi-annually, quarterly, monthly, weekly, daily, or even constantly are advertised by savings banks. The fundamental relationship can be generalized to calculate the future value after any number of time periods. For the various inputs, use the following notation:

$$FV_n = PV \times (1 + r)^n$$

Note:

- FV_n = Future value at the end of period n
- PV = Initial principal, or present value
- r = Annual rate of interest paid
- n = Number of periods (typically years)

2) Present Value

The process of determining present value is also known as discounted cash flow. This relates to the following question: If I can earn r percent of my money, what is the most I am ready to spend now for the chance to receive n period FV_n dollars beginning today This procedure is the inverse of compound interest. Rather than determining the future value of a current dollar invested at a specific rate, discounting determines the present value of a future amount, assuming a specified return on investment.



This yearly rate of return is also known as the discount rate, the needed return, the cost of capital, and the opportunity cost. The equation for PV can be used to calculate the present value of a future quantity. In other words, the present value, PV, of some future amount, FV_n, to be received n periods from now is calculated as follows, assuming an interest rate (or opportunity cost) of r:

$$PV = \frac{FV_n}{(1+r)^n}$$

Note:

- FV_n = Future value at the end of period n
- PV = Initial principal, or present value
- r = Annual rate of interest paid
- n = Number of periods (typically years)

3) Ordinary Annuity

Obviously, annuities are identical periodic cash distributions. The method for calculating the present value of an ordinary annuity is comparable to the method described previously. One method entails calculating the present value of each financial flow in the annuity and then adding those values together. Or, an algebraic shortcut for determining the present value of an ordinary annuity that renders the annual CF payments over n years as:

$$PV_n = \left(\frac{CF}{r}\right) \times \left[1 - \frac{1}{(1+r)^n}\right]$$

Note:

- FV_n = Future value at the end of period n
- PV = Initial principal, or present value
- CF = Cash Flow
- r = Annual rate of interest paid
- n = Number of periods (typically years)

RESULT

In this reaserch, the price of KPR houses was taken based on the price of the house being sold by PT Sarana Perumah Mandiri, which is located in Pekanbaru City, Riau, at a price of Rp. 170,000,000. Then the tenor is 10 years specifically for Murabahah contracts and 15 years for Musharakah contracts. At Bank Syariah A, the equivalent rate is set at 8%. At Bank Syariah B, the equivalent rate for Murabahah contracts is 6.75% for 10 years, while for Musharakah contracts for a tenor of 15 years, the equivalent rate in the first thirteen years is 7.50% and will be floated in the 14th year until 10.10% (following the Bi rate plus the rate at BCA Syariah) at the last year decrease until 10%, and finally at Bank Syariah C for Murabahah contracts, the equivalent rate is set at 8.75% with a tenor of 10 years, and for Musharakah contracts, the equivalent rate in the first ten years is 8.75% and will be floated in the eleventh year 11.25%, after that in year 12 the rate flat in 11.25%, in the year 13 that rate increase until 11,45%, next in year 15 that rate decrease slightly to 11.85%, and at the end of year the rate slightly decrease at the past year is 11.75%

A. Bank Syariah A

a) Murabahah Contract Scheme

The following data are utilized in the calculation of Murabahah contracts at Bank Syariah A:

Property value: Rp. 170,000,000

Down payment (DP): Rp. 51,000,000 (30% of the property value)

Loan amount: Rp. 119,000,000 (70% of the property value)

Annual profit rate: 8.00%

Monthly profit rate: 0.67%

Loan tenure: 10 years (120 months)

The conclusion of loan repayment is a fixed monthly payment (annuity) over the life of the loan.



Table 3.1 The Results of The Calculation of The Murabaha Contract of Bank Syariah A

Instalment Payment/month	Rp	1,443,798
Total Principal Loan Instalment	Rp	119,000,000
Total Instalment Payment Rate	Rp	54,255,805
Total payment	Rp	173,255,805
Rate Value		0.67%
Margin		45.59%

The result of these calculations is a loan of Rp. 119,000,000 with a tenor of 10 years (120 months) and a Murabahah contract rate of 8.00% provided by Bank Syariah A. The monthly payment is Rp. 1,443,798. and the annual payment is Rp. 17,734,509.15. The loan can be repaid with monthly payments over a period of ten years, until the ultimate balance reaches Rp 0.00.

Consequently, based on the calculated data, the margin of the principal installment is Rp. 119,000,000.-. and installments based on the provided rate are Rp. 54,255,804.-. This yields a margin of 45.59%. In accordance with the equivalent rate calculation, the result is 0,67%/month or 8,00%/year.

B. Bank Syariah B

a) Murabahah Contract Scheme

The following data are utilized in the calculation of Murabahah contracts at Bank Syariah B:

Property value: Rp. 170,000,000

Down payment (DP): Rp. 51,000,000 (30% of the property value)

Loan amount: Rp. 119,000,000 (70% of the property value)

Annual profit rate: 6,75%

Monthly profit rate: 0,56%

Loan tenure: 10 years (120 months)

Table 3.2 The Results of The Calculation of The Murabaha Contract of Bank Syariah B

Instalment Payment	Rp	1,366,407
Total Principal Loan Instalment	Rp	119,000,000
Total Instalment Payment Rate	Rp	44,968,835
Total payment	Rp	163,968,835
Rate Value		0.56%
Margin		37.79%

The result of these calculations is a loan of Rp. 119,000,000 with a tenor of 10 years (120 months) and a Murabahah contract rate of 6,75% provided by Bank Syariah B. The monthly payment is Rp. 1,366,407 and the annual payment is Rp 16,747,657. The loan can be repaid with monthly payments over a period of ten years, until the ultimate balance reaches Rp 0.00.

Consequently, based on the calculated data, the margin of the principal installment is Rp. 119,000,000.-. and installments based on the provided rate are Rp. 44,968,835.-. This yields a margin of 37.79%. In accordance with the equivalent rate calculation, the result is 0,56%/month or 6,75%/year.

b) Musharakah Contract Scheme

The following data are utilized in the calculation of Musharakah contracts at Bank Syariah B Syariah:

Property value: Rp. 170,000,000

Down payment (DP): Rp. 51,000,000 (30% of the propertyvalue)

Loan amount: Rp. 119,000,000 (70% of the property value)



Fixed 13 years rate: 8,75%
 Rates in year 14: 10,10%
 Rates in year 15: 10%
 Loan tenure: 15 years (180 months)

Table 3.3 The Results of The Calculation of The Musharakah Contract of Bank Syariah B

Installation Fee for 13 years (7,50%)	Rp	1,103,145
Installation Fee 14th Year (10,10%)	Rp	1,132,354
Installation Fee 15th Year (10%)	Rp	1,131,755
Total Principal Loan Installment	Rp	119,000,000
Total Installment Payment Rate	Rp	80,259,881
Total payment	Rp	199,259,881
Rate Value		0.63%
Margin		67.45%

This calculation yields a loan of Rp. 119,000,000 with a term of 15 years (180 months) and a fixed Musharakah exchange rate for 13 years of 7.50% provided by Bank Syariah B resulting in a monthly payment of Rp 1,103,145 Then, in the fourteenth year, the rate fluctuates to 10.10%, causing the monthly payment to increase to Rp 1,132,354; at the end of the year, the rate fluctuates to 10%, causing the monthly payment to decrease to Rp 1,131,755; and by the end of the year, the total principal loan is paid off, or Rp 0.00.

Consequently, based on the calculated data, the principal installment margin is Rp. 119,000,000 and the installments based on the provided rate are Rp. 80,259,881 Consequently, the margin is 67.45%. The result of the equivalent rate calculation is 0.63 percent per month or 7.56 percent per annum.

C. Bank Syariah C

a) Murabahah Contract Scheme

The following data are utilized in the calculation of Murabahah contracts at Bank Syariah C:
 Property value: Rp. 170,000,000
 Down payment (DP): Rp. 51,000,000 (30% of the property value)
 Loan amount: Rp. 119,000,000 (70% of the property value)
 Annual profit rate: 8,75%
 Monthly profit rate: 0,73%
 Loan tenure: 10 years (120 months)

Table 3.4 The Results of The Calculation of The Murabahah Contract of Bank Syariah C

Instalment Payment	Rp	1,491,388
Total Principal Loan Instalment	Rp	119,000,000
Total Instalment Payment Rate	Rp	59,966,600
Total payment	Rp	178,966,600
Rate Value		0.73%
Margin		50.39%

The result of these calculations is a loan of Rp. 119,000,000 with a tenor of 10 years (120 months) and a Murabahah contract rate of 8,75% provided by Bank Syariah C. The monthly payment is Rp. 1,491,388 the loan can be repaid with monthly payments over a period of ten years, until the ultimate balance reaches Rp 0.00.



Consequently, based on the calculated data, the margin of the principal installment is Rp. 119,000,000.-. and installments based on the provided rate are Rp. 59,966,600.-. This yields a margin of 50,39%. In accordance with the equivalent rate calculation, the result is 0,73%/month or 8,75%/year.

b) Musharakah Contract Scheme

The following data are utilized in the calculation of Musharakah contracts at Bank Syariah C:

Property value: Rp. 170,000,000

Down payment (DP): Rp. 51,000,000 (30% of the property value)

Loan amount: Rp. 119,000,000 (70% of the property value)

Fixed 10 years rate: 8.75%

Rates in year 11: 11.25%

Rates in year 12: 11.25%

Rates in year 13: 10.45%

Rates in year 14: 10.85%

Rates in year 15: 10.75%

Loan tenure: 15 years (180 months)

Table 3.5 The Results of The Calculation of The Musharakah Contract of Bank Syariah C

Installation Fee for 10 Years (8.75%)	Rp	1,189,344
Installation Fee 11th Year (11.25%)	Rp	1,260,234
Installation Fee 12th Year (11.25%)	Rp	1,260,234
Installation Fee 13th Year (11.45%)	Rp	1,263,878
Installation Fee 14th Year (10.85%)	Rp	1,256,351
Installation Fee 15th Year (10.75%)	Rp	1,255,688
Total Principal Loan Installment	Rp	119,000,000
Total Installment Payment Rate	Rp	99,277,896
Total payment	Rp	218,277,896
Rate Value	0.75%	
Margin	83.43%	

This calculation yields a loan of Rp. 119,000,000 with a term of 15 years (180 months) and a fixed Musharakah contract rate for 10 years of 8,75% provided by Bank Syariah C, resulting in a monthly payment of Rp. 1,189,344. Then in the 11th year, the rate fluctuates to 11.25%, so that the monthly payment increases to Rp. 1,260,234; then in the 12th year the rate still flat in 11.25%, and the monthly payment is Rp. 1,260,234; Then in the 13th year the rate slightly increases to 11.45%, causing the monthly payment to rise to Rp. 1,263,878; after that Then in the 14th year the rate drops until 10.85%, causing the monthly payment to fall to Rp. 1,256,351; and at the end of the tenor year, the rate drops to 10.75%, causing the monthly payment to fall to Rp. 1,255,688 so that the total the principal loan in the 15th year is paid off or Rp. 0.00.

Consequently, based on the calculated data, the principal installment margin is Rp. 119,000,000 and the installments based on the provided rate are Rp. 99,277,896. Consequently, the margin is 83,43%. The result of the equivalent rate calculation is 0.75% per month or 8.95% per annum.

BUSINESS SOLUTION

In accordance with the tenets of Islamic finance, it is essential for banks to provide clear information about the margin they will provide to consumers. This enables consumers to make more informed financial decisions and to comprehend the bank's profit on each transaction. Islamic finance is predicated on the tenets of openness and equity. The following are points based on murabahah contracts and Musharakah contracts.



A. Model for Financing Based on Murabahah:

- 1) The use of Murabahah contracts in subsidized KPR financing by banks. Murabaha contract is a form of transparently disclosed purchasing and selling
- 2) According to sharia principles, banks may determine margins in advance. This margin represents the bank's profit on the purchase of a home at a price higher than the original price.

B. Musharakah-Based Financing Model Development:

- 1) Banks are able to develop a Musharakah-based subsidized KPR financing model, which is a form of property ownership cooperation between banks and clients. The bank provides a portion of the funds as an equity participation, while the client serves as a co-owner.
- 2) The margins of banks can be predetermined in accordance with sharia principles. As compensation for the management and risk incurred by the bank in joint ownership with customers, banks can establish fixed margins.

By implementing this financing model, developers can adhere to the principles of Islamic finance and provide consumers with financing options that adhere to these principles. This will increase consumer confidence in developers' housing products and strengthen the developer's position as a provider of sharia-compliant housing products.

IMPLEMENTATION PLAN

In implementing sharia-based housing finance, consumer preferences must also be considered. Understanding the factors that influence consumer preferences for housing financing methods can be aided by research on consumer preferences. Their perceptions of murabaha and musyaraka contracts, including their belief in sharia principles and level of satisfaction with offered financing products, must be taken into account when formulating marketing strategies and modifying products.

This study aims to provide a deeper comprehension of the effectiveness of housing development financing through murabaha and Musharakah contracts, as well as the challenges faced in a modern economy, by examining these various aspects. This will assist in identifying necessary enhancements to sharia-based housing finance.

Murabahah-Based Financing Model Implementation Plan:

- a) Identify Islamic banks with defined policies and procedures regarding the provision of subsidized mortgage financing via Murabahah contracts.
- b) Communicate with related banks to guarantee cooperation in the development of financing products based on Murabahah.
- c) Implement a transparent system or procedure for determining bank margins and consumer selling prices.
- d) Clearly communicating to consumers the cost structure, margins, and benefits of using Murabahah financing products.

Musharakah-Based Financing Model Implementation Plan:

- a) Conduct research and studies on the implementation of the subsidized mortgage financing model based on Musharakah in which banks and consumers form property ownership partnerships.
- b) Develop explicit agreements and guidelines regarding consumer and bank rights, responsibilities, and profit sharing.
- c) Communicate with Islamic financial authorities and related banks to obtain sanction and support for implementing the financing model based on Musharakah.
- d) Providing consumers with transparent information regarding the structure of costs, risks, and profit sharing in the Musharakah financing model.

By implementing a Murabahah and Musharakah-based financing model and maintaining transparency in determining margins and costs, developers can provide consumers with financing options that comply with sharia principles, increase consumer confidence, and bolster the developer's position as a provider of high-quality sharia housing products.

CONCLUSION

On the basis of the analysis of various banks and contract types, the following conclusions can be drawn:

Bank Syariah Indonesia (BSI): BSI offers 10-year Murabahah contracts with 8% annual interest. The monthly payment for this contract is IDR 1,443,798. The principal payment margin is 45.59 percent. A developer may find BSI's Murabaha contract to be an attractive option due to the stability of interest rates throughout the entire period and the reduced margins.



Bank Central Asia Syariah (BCA Syariah): BCA Syariah offers Murabahah and Musharakah contracts. The Murabaha contract has a monthly payment of IDR 1,366,407 and an equivalent interest rate of 6.75 percent for ten years. The principal payment margin is 37.79%. The initial 13 years of a Musharakah contract have a fixed interest rate of 7.50%, which then fluctuates. Considering the lower interest rates and relatively low margins, BCA Syariah's Murabaha contracts may be a viable option for a developer.

Bank CIMB NIAGA Syariah: CIMB NIAGA Syariah offers Murabahah and Musharakah contracts. For ten years, the Murabaha contract stipulates monthly payments of IDR 1,491,388 and an equivalent interest rate of 8.75%. The principal payment margin is 50.39 percent. The interest rate on Musharakah contracts is fixed for the first ten years, at 8.75%, before fluctuating. With higher interest rates and margins, CIMB NIAGA Syariah's Murabahah contracts may not be the best option for a developer.

REFERENCES

1. Aghion, P., & Bolton, P. (1992). An Incomplete Contracts Approach to Financial Contracting. Vol. 59, No. 3 . doi:<https://doi.org/10.2307/2297860>
2. Al Bakri, Z. M. (2011). Kewangan Islam dalam fiqh Syafi'i. Kuala Lumpur: IBFIM.
3. Al-Omar, Fuad, A., & Mirakhor, A. (2009). Islamic Banking: Theory, Practice, and Challenges. *Journal of Islamic Banking and Finance*, Vol. 26, no. 4, pp. 434-445.
4. Al-Zuhayli, W. (1989). *al-'Aldqdt al-Duwaliyyah fi'l-Islam Muqaranatan bi'l-Qdnun al-Duwali al-Hadit*, Muassasah Ar Risalah.
5. Asadov, A., Sori, Z. B., Ramadilli, S., Anwer, Z., & Shamsudheen, S. (2018). Musharakah Mutanaqisah Home Financing: Issues in Practice. *Journal of Islamic Accounting and Business Research*, 9(1), 91–103. doi:<https://doi.org/10.1108/JIABR-08-2015-0036>
6. Baehaqi, A., Nasution, M. N., & Hudaefi, F. A. (2020). Time value of money in Islamic accounting practice: a critical analysis from maqāsid al-Sharī'ah. *Journal of Islamic Accounting and Business Research*. doi:10.1108/JIABR-09-2018-0155
7. Bank, W. (2017). Affordable Housing in Indonesia: Towards an Inclusive Financial System. World Bank. Retrieved from <https://www.worldbank.org/en/news/press-release/2017/03/20/world-bank-approves-new-financing-to-support-affordable-housing-in-indonesia>
8. Bank, W. (2020). housing for all realizing the social and economic benefits of addressing indonesia's housing challenges. World Bank. Retrieved from <https://thedocs.worldbank.org/en/doc/704221590233780563-0070022020/original/IDPER2020Ch10Housing.pdf>
9. Chapra, M. U. (1985). *Towards A Just Monetary System*. Leicester: The Islamic Foundation.
10. Dalimunthe, Z., Syakhroza, A., Nasution, M. E., & Husodo, Z. A. (2019). OW FEASIBLE IS A CONVERTIBLE IJARAH CONTRACT FOR SME FINANCING?: A SIMULATION APPROACH. *Journal of Islamic Monetary Economics and Finance*, Vol. 5, No.2, pp. 439-458.
11. Ghlamallah, E., Alexakis, C., Dowling, M., & Piepenbrink, A. (2021). The Topics of Islamic Economics and Finance Research. *International Review of Economics and Finance*. doi:<https://doi.org/10.1016/j.iref.2021.04.006>
12. Gholamreza, Z., Mohd, N., Ariffin, & Shahabi, A. (2012). Some issues on Murabahah practices in Iran and Malaysian Islamic banks. *African Journal of Business Management*, Vol. 6(24). doi:DOI: 10.5897/AJBM11.2859
13. Harison, T., & Ibrahim, E. (2016). *Principle, Performance, and Prospect*. Edinburgh: University of Edinburgh Business School, UK. doi:DOI 10.1007/978-3-319-30918-7
14. Hassar, M. K., & Aliyu, S. (2017). A contemporary survey of islamic banking literature. *Journal of Financial Stability*. doi:<https://doi.org/10.1016/j.jfs.2017.11.006>
15. Hosen, N. (2016). Musharakah Mutanaqisah. *Al-Iqtishad: Journal of Islamic Economics*, Vol 1, No 2 Hosen. doi:DOI: 10.15408/aiq.v1i2.2463
16. Hussain, M., Shahmoradi, A., & Turk, R. (2015). *An Overview of Islamic Finance*. International Monetary Fund.
17. INDONESIA, M. P. (2021). KEMUDAHAN DAN BANTUAN PEMBIAYAAN PERUMAHAN BAGI MASYARAKAT BERPENDHASILAN RENDAH. MENTERI PEKERJAAN UMUM DAN PERUMAHAN RAKYAT REPUBLIK INDONESIA.



18. Iqbal, Z., & Mirakhor, A. (2011). An Introduction to Islamic Finance. John Wiley & Sons (Asia) Pte. Ltd.
19. Jr, H. B. (2019). Introduction To Accounting And Managerial Finance, An: A Merger Of Equals. Singapore: World Scientific Publishing Co. Pte. Ltd.
20. Julianti, W., & Wibowo, Y. K. (2021). Literature review: implementation of Musharakah Mutanaqisah partnership over the world. Bukhori: Jurnal Ekonomi dan Keuangan Islam, Vol 1, No 1, 2021, 1-10.
doi: <https://doi.org/10.35912/Bukhori.v1i1.196>
21. Khan, T. (2005). An Introduction to Islamic Banking and Finance. Journal of Islamic Banking and Finance, Vol. 22, no. 4, pp. 1-5.
22. Kieso, D. E., Weygandt, J. J., & Warfield, T. D. (2019). Intermediate Accounting, 17/E. New Jersey: Willey.
23. Muda, I., & Hasibuan, A. N. (n.d.). Public Discovery of the Concept of Time Value of Money with Economic Value of Time. doi:<https://doi.org/10.1108/978-1-78756-793-1-00050>
24. Mustapha, Z., Kunhibava, S. B., & Muneeza, A. (2020). Legal and Shari'ah non-compliance risks in Nigerian Islamic finance industry: a review of the literature. UM-INCEIF Islamic Finance Research Grant., Vol. 63 No. 2. doi:<https://doi.org/10.1108/IJLMA-03-2020-0075>
25. Nation, U. (2018). The World's Cities in 2018. United Nation. Retrieved from https://www.un.org/en/development/desa/population/publications/pdf/urbanization/the_worlds_cities_in_2018_data_booklet.pdf
26. Neli. (2022). IMPLEMENTATION OF IJARAH CONTRACT FINANCING AT BMT SAFINAH KLATEN. International Journal of Humanities, Social Sciences and Business (INJOSS), Vol. 1 No. 3, page 141-154.
27. OJK. (2016). Standar Produk Buku 1: Musharakah Buku 2: Musharakah Mutanaqisah.
28. Ozerturk, S. (2008). Risk sharing, risk shifting and the role of convertible debt. Journal of Mathematical Economics. doi:10.1016/j.jmateco.2008.04.001
29. Rachman, A., & Pratama, E. (2016). Penetapan Margin Dalam Pembiayaan Murabahah . Islaminomics: Journal of Islamic Economics, Business and Finance.
30. Rahman, Z. A. (2009). Panduan perbankan Islam kontrak dan produk asas. Kuala Lumpur: Telaga Biru Sdn. Bhd.
31. Santoso, B., & Wijaya, E. Y. (2018). Evaluasi Program Perumahan Bersubsidi di Indonesia. Jurnal Pembangunan Wilayah dan Kota. doi:<https://doi.org/10.14710/pwk.v14i1.22331>
32. Siddiqi, & Nejatullah, M. (2006). Role of Shari'ah in Islamic Banking. Journal Islamic Economic Studies, Vol. 13, no. 2, pp. 1-20.
33. Statistics, I. C. (2018). the country's population is concentrated in urban areas. Indonesia Central Bureau of Statistics. Retrieved from <https://www.bps.go.id/>
34. Waluyo. (2014). Fiqih Muamalah. CV. Gerbang Media.
35. Wulandari, P., & Putri, N. I. (2016). Contract agreement model for murabahah financing in Indonesia Islamic banking. International Journal of Islamic and Middle Eastern Finance and Management. doi:DOI 10.1108/IMEFM-01-2015-0001
36. Yusuf, M., Syakur, Syakur, A., & Ferdiansyah, R. (2021). Kendala Pengembangan Perumahan Bersubsidi di Indonesia. Jurnal Analisis Kebijakan Kehutanan. doi:<https://doi.org/10.20886/jakk.2021.18.1.77-91>

Cite this Article: Adam Arief Wibawa, Oktofa Yudha Sudrajad (2023). The Differences between Murabahah and Musharakah Muatanaqisah Contract Payments Using the Time Value of Money Method (Study Case: PT Sarana Perumahan Mandiri). International Journal of Current Science Research and Review, 6(7), 4227-4240