Housing Financing Facility and Affordability Level of Bumiputera within Iskandar Malaysia

A. Ismail, A. A. Bujang, W. R. Anthony Jiram, H. Abu Zarin, and M. N. Jaafar

Abstract—**Housing financing is an essential element in the process of purchasing a house for individuals who want to meet their own house. This study was conducted to identify the purchaser affordability level of bumiputera against housing financing facility provided by financial institutions. Therefore, this paper presents the analysis of affordability level of bumiputera against housing financing facility provided by financial institutions. The findings show that a bumiputera with middle income can afford a house below RM250, 000 with monthly installments below RM1, 000**

Index Terms—**Housing price, affordability, financing, bumiputera, income.**

I. INTRODUCTION

The decision to purchase a house is very important and is a big step in one's life. It requires a high financial commitment and the benefits of buying a house is a great long-term investment. There are many elements needs to be considered in purchasing a house, including income, household expenditure, the date of purchase, advances, loans and repayment period and amount of monthly installments. However, if we look, today, to have a low-priced house needs a high struggle.

The high price of residential properties has been causing difficulties to bumiputera to buy and own their own house, especially in Johor Bahru [1]. Although based on the Johor State government policy, 15 percent discount was given; the price that has been offered is still high. The possession and the purchasing of a home are often associated with bank financing through financial institutions, whether public or private. Bank financing that's been obtained will help prospective buyers and owners in financial terms, and the majority of buyers prefer to seek financing from financial institutions to finance their housing purchase. However, the number of home buyers who fail to obtain bank financing situation is getting worse and will affect the housing sector in the country [2]-[5]. Does house in Iskandar Malaysia is affordable for bumiputera? The ownership of the assets for the Malays is 18 percent or 12.7 billion, equivalent to RM24, 618 a person in Iskandar Malaysia [6]. Rises in property prices in Iskandar Malaysia increased significantly in line with demand for residential property buyers in the country and abroad.

This is supported by the Property Market Report 2012 which shows the movement of the residential price rose up significantly in a number of areas such as Nusajaya, Taman Bukit Indah, Taman Century, Taman Perling, Bandar Baru Permas Jaya, Nusa Bestari and Bandar Seri Alam.

II. BUMIPUTERA INCOME IN ISKANDAR MALAYSIA

The housing issue in Malaysia arises after the migration of the rural population to urban areas [7]. The arrival of the rural population to urban areas has increased the demand for housing, particularly low and middle-income groups [8]. Due to the increase in housing demand, house prices also rose up and give the burden to the immigrants, especially the bumiputera since the house prices beyond their income.

Bumiputera income is the lowest compared with other races. When income rises, household living also increased [9]. People will definitely want a better life and comfortable. In the ownership, the change in income will have a direct impact on the price of the property. Income not only affects the ability of ownership directly, but it affects the demand for residential properties [10]. Therefore, it can be concluded the higher the income, the easier to get a loan from the bank. This is because the higher the income, the better the ability to repay the loan and thus reduce the risk to the bank. Table I shows the income by ethnicity in Iskandar Malaysia.

TABLE I: INCOME BY ETHNICITY IN ISKANDAR MALAYSIA

| Year	Ringgit Malaysia (RM)		
	2007	2009	2012
Bumiputera	3686	3624	4457
Chinese	4356	5011	6366
Indian	2283	3999	5233

Source: Investigation reports on household income 2007, 2009 and 2012

Income needs to be upgraded in order to conform with the requirements, including the products and services of the property [11]. Although income per capita in Malaysia has grown, but the fact, it slowed down due to high inflation exceeds the rate of income growth. Due to revenue constraints in the purchase of real estate, most buyers decided to rent a house because they could not buy their own houses. Although revenue increased, bumiputera's income clearly shows a defect against the Chinese and Indians. The income of Malaysians still has a big gap with income per capita for bumiputera [12]. This indirectly proves NEP to reduce the differences in income between people is still not satisfactory.

## III. BUMIPUTERA HOUSING AFFORDABILITY IN ISKANDAR MALAYSIA

The ability to buy a home is measured by the amount of

income earned by an individual's ability to pay back all the costs involved in the process of buying the house [13]. The costs involved with home ownership usually do not exceed 30 percent of household income. Fig. 1 and Fig. 2 show the value of the property owned by an ethnic and income level in Iskandar Malaysia.
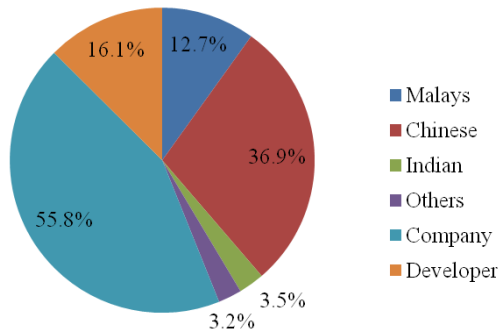
Source: Comprehensive development plan IRDA (2012)

Fig. 1. Value of the property owned by ethnic 2012 (RM billion).
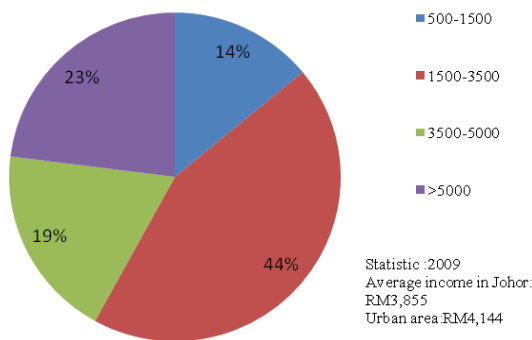
Source: Comprehensive development plan IRDA (2012)

Fig. 2. Income level in Iskandar Malaysia.

According to HNZC (2004), the ability to purchase a house not only involves calculating the cost of housing and income, but also to retain ownership of the house and the potential buyers also should have sufficient income to buy other basic needs.

Low purchasing power has caused financial institutions to provide financing to bumiputera. This is supported by the finding that has been done by Bujang (2006) that shows bumiputera are facing difficulty to obtain financing as they need to pay of 10 percent and higher other costs to buy a house. Bujang (2006) found that the medium income earned by bumiputera is less than RM2, 500 and this value is lower than the national median income of RM2, 830. This indirectly affects the ability of bumiputera to repay loans.

Although giving a 5 percent discount from the actual sales price was also given to the natives to own a home, however, bumiputera funding application is often rejected and not approved by the banking and financial institutions (Workshop on Bumiputera's Ownership in Iskandar Malaysia, 2013). Buyer who has been offered a home eventually has difficulty for their loan to be approved due for not meeting the conditions and criteria set by the bank, and they will find it tough for them to own and buy your own home, especially for the bumiputera in Iskandar Malaysia.

IV. MEASURING THE ABILITY TO PAY BACK THE LOAN

To measure the ability to pay back the loans, financial institutions have set the amount to be allocated for the loan payment. This is because the determinants of housing purchase depend on loans from financial institutions or through government loans to accommodate the financing [14].

Financial provisions for owning a house is not more than 1/3 of income and the maximum rate of 30 per cent of total household income can be reserved to the expenses of housing loan payments for a certain period. Here is the formula for calculating the price of the house based on the provision of financing repayment of 30 percent of gross annual income:

$$Hg = Y(X\%) \times \frac{1 - (1/(1+i)^n)}{i}$$

where, Hg:affordable price, Y: household income per annum X: household of financing expenses for a year, i: interest rate per annum, and n: funding period.

The calculation of this formula is using the Year Purchase's table or the present value of RM1.00 per annum. This calculation ability to repay the financing is for all those who want to buy a home. With this calculation, the borrower can determine their ability to repay the loan.

The interest rate is the percent of extra money (premium) paid for a period of time of the loan. The interest rate is the reward of the productivity of capital contributed by creditors. In Malaysia, the interest rate is charged at the base lending rate, also known as the BLR. Interest rate is controlled by Bank Negara Malaysia, and the implementation are up to the bank itself. Interest to be paid by the borrower is considered as the cost of borrowing the funds based on the concept of value of money, where value of a dollar to be received in the future is less than the value of a dollar on hand today. Table II shows the package of loans based on the interest rate of 6.5 percent.

Banks usually charge either a fixed rate or variable rate on housing loans. Most housing loans in Malaysia are variable interest rate loans, and the interest rate is tied to the base lending rate (BLR). In Malaysia, the number of housing loan approval depends on few aspects that should be considered including the market value of the property or the purchase price of the house, type of property, location of property, and the borrower's profile, such as age and income level.

Loan period is important for determining the ability of a financing. This is because the loan repayment is depended on the repayment period applied by the purchaser, and in accordance with the conditions set by the financial institution or bank. The loans are usually limited to 30 years or until the person has reached the age of 65 years [15]. For home buyers who make a loan repayment period in a short time had to isolate the most revenue for the monthly payment, and if the length of the repayment period, the interest rate payable is higher. Although there is a 1 percent difference in the interest rate, it will cause a lot of difference in the amount of loan payments at the end of the payment period. Therefore, in considering the financing ability of a buyer, the loan period should be taken into account to avoid low-income buyers to feel burdened by this condition.

TABLE II: FUNDING BASED ON THE INTEREST RATE OF 6.5 PERCENT

Total loan (RM)	5 Year	10 Year	15 Year	20 Year	25 Year	30 Year
	Monthly repayment					
100,000	1,969	1,141	877	751	681	639
150,000	2,942	1,711	1,315	1,127	1,022	958
200,000	3,923	2,281	1,753	1,503	1,363	1,277
250,000	4,903	2,851	2,192	1,879	1,704	1,597
300,000	5,883	3,422	2,630	2,254	2,044	1,916
350,000	6,865	3,992	3,068	2,630	2,385	2,235
400,000	7,845	4,562	3,506	3,006	2,726	2,555
450,000	8,826	5,133	3,945	3,381	3,067	2,874
500,000	9,807	5,703	4,383	3,757	3,407	3,193
550,000	10,788	6,273	4,821	4,133	3,748	3,513
600,000	11,767	6,843	5,260	4,509	4,089	3,832
650,000	12,748	7,414	5,697	4,885	4,430	4,151
700,000	13,729	7,984	6,136	5,260	4,770	4,471
750,000	14,710	8,554	6,575	5,636	5,111	4,790
800,000	15,690	9,125	7,013	6,012	5,452	5,109
850,000	16,671	9,695	7,451	6,388	5,792	5,429

Source: Bank Negara Malaysia (2013).

V. HOUSING FINANCE FACILITY

Sources of financing can be obtained from financial institutions or banks. Institutions that are classified as financial institutions in Malaysia consist of commercial banks, merchant banks, representative offices of foreign banks, finance companies and banks.

The financial institution involved in mortgage financing is Maybank, Bank Rakyat, Public Bank, Ambank, Bank Islam, CIMB Bank, OCBC Bank, Bank Muamalat, BSN and others. Financial institutions affect the decision to purchase a home. This is because the determinant of the purchase depending on the facilities, and the amount of funding approved by the financial institution.

A source of financing for the purchase of residential property can be divided into two types, namely:
1) Government housing loans, especially for government employees or the public that has been qualified in accordance with the prescribed conditions.
2) Banks and private financial institutions, open to all qualified individuals regardless of whether the individual is a public employee or working in the private sector.

Housing finance system in Malaysia is divided into two, namely the banking system and the non-banking system [16]. The banking system, such as Bank Negara Malaysia, while the non-banking system consists of the institutions associated with financial development, such as the EPF, the Credit Institute of Housing, Malaysian Building Society Berhad (MBSB) and Institutional Trust as ASB and ASN.

Conventional banking system is a banking system based on the system using interest rates in each transaction. In conventional financing, the bank or lender to provide the loan to the borrower to obtain a profit from the interest charged. This is because the conventional banking system, the grant funding is the main source of revenue [17], [18].

There are several objectives of conventional banking, which is a major bank, lender, as the provider of the best trade in services.

For Islamic finance, the banking system is based on Syariah, through partnerships offer the principles of fair and equitable, sensitive and accurate in the transaction. In Islamic banking financing, various Shariah contracts are used, which is Bai Bithamin Ajil (B.B.A.), Murabahah (cost-plus financing), Mudharabah (profit sharing) and Musharakah Mutanaqisah (joint venture).

The methods commonly used in Malaysia are Bai Bithamin Ajil (BBA) and Musharakah Mutanaqisah (MM). According to statistics from Bank Negara Malaysia (2005), Bai Bithamin Ajil (BBA) is a very popular method that widely used in Malaysia with a total of 52.9 percent compared to other methods.

VI. METHODOLOGY

In achieving the objective of this study, two types of data will be used, namely primary data and secondary data. To achieve the objectives of this study, a field survey is carried out. The field survey is carried out to collect primary data. The instrument used to collect primary data is questionnaire. The questions in the questionnaire are close ended. The data are informed of quantitative. Apart from the survey, secondary data are also required in this paper, especially for the literature reviews. The secondary data are acquired from references such as journals and seminar papers. The target sample size will be based on 90 percent level of confidence using Taro Yamane Formula (1973). The data will be analyzed by using Descriptive Statistic, Cross Tabulation, Chi Square and Correlation.

VII. FINDINGS

Bumiputera middle income can afford to buy and own a house below RM250, 000 with monthly installments under RM1, 000. Table III shows the factors influence bumiputera problems to obtain financing.

Housing loans are important even the buyer can afford to buy the house. Even the bumiputera middle income earning more than RM3, 000, they are still cannot afford to buy house.

Housing loans are important even the buyer can afford to own. Even the bumiputera middle income earning more than RM3, 000, they are still cannot afford their own house.

Table IV shows the relationship between affordability and housing finance problems.

TABLE III: FACTORS INFLUENCE BUMIPUTERA PROBLEMS TO OBTAIN FINANCING

Scale	Indexes	Factors influencing bumiputera problems obtain financing	Min
Strongly influence	4.42-4.53	House price	4.50
Influence	4.30-4.41	Loan facility	4.36
		Types of occupation	4.34
		Installment per month	4.33
		Expenditure per month	4.33
Moderate influence	4.18-4.29	High interest rates	4.23
		High deposit	4.22
		Short term loans	4.22
		Financing cost burden	4.21
		Finance application process	4.18
Less influence	4.06-4.17	Reputation of developer	4.17
		Income	4.15
		Government policy	4.11
Not influence	3.94-4.05	A lot of loans	4.03
		Credit score (lot of debt)	3.94

TABLE IV: THE RELATIONSHIP BETWEEN AFFORDABILITY AND HOUSING FINANCE PROBLEMS

Items	Chi Square value (x^2)	Degrees of freedom (df)	Significant value	Relationship between affordability and housing finance problems
Loan facility	16.446	3	.001	Significant
Finance application process	14.845	4	.005	Significant
Types of occupation	10.725	3	.013	Significant
Expenditure per month	12.393	3	.006	Significant
Income	13.449	3	.004	Significant
Government policy	16.910	3	.001	Significant
House price	10.144	2	.006	Significant
Installment per month	10.615	3	.014	Significant
High deposit	13.613	3	.003	Significant
Credit score (lot of debt)	2.661	3	.447	Not significant
A lot of loans	1.960	3	.581	Not significant
Short term loans	10.210	3	.017	Significant
High interest rates	7.980	3	.046	Significant
Financing cost burden	10.680	3	.014	Significant
Reputation of developer	3.814	4	.432	Not significant

Eligibility to those with incomes above RM3, 000 would qualify them to make housing loans priced above RM320, 000. However, the analysis shows the ability of financing for home owners is under RM250, 000 with monthly repayments of less than RM 1,000. This indirectly suggests that the purchasing power of the bumiputera is at a low level to buy available in the market. Table V shows the framework to estimate funding available for a house based on the interest rate of 6.5 percent (using Parry's Valuation Table).

Rationally, a buyer will choose the lower priced house, but if the price of housing is below the price floor, prospective buyers will consider carefully whether to continue or cancel the purchase intention. This is because house prices are too cheap, and indirectly prospective buyers will think the house is likely to have a problem. Conversely, if the price of the house to be purchased is above the market prices, it will affect the ability of buyers to buy the house. Therefore, prospective buyers only buy at prices deemed reasonable.

VIII. CONCLUSIONS

Based on analysis of this study, it can be concluded that the existing housing financing should be changed to ensure the financing can be done comprehensively to all levels of society. Thus, the prospective buyer will apply the house financing according to their affordability and income. Studies have shown that the middle income has a desire to buy a house, but they restricted by affordability level, in additional, they worried the loan application will be rejected.

The government should play a leading role because they have the ultimate authority to change the existing system. The suggestion can be made by the Ministry of Housing, and Local Government is to do a lot of planning and enforcement of housing projects with a comprehensive, including setting appropriate prices for the middle-income group.

Finally, the state governments and financial institutions should be aware of every problem of the people, where both agencies not only have to implement the residential development, but also implement the dreams of the people to buy their own house. Through an orderly and proper planning, ownership of housing for every citizen will be able to moving simultaneously with the population increase.

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Azizah Ismail received her B.Sc. degree from Universiti Teknologi Malaysia and is currently doing her M.Sc. at Universiti Teknologi Malaysia (UTM). Her research interests lay in the field of housing affordability and finance. She presented her current research paper at IRERS Conference held at INSPEN Kuala Lumpur.

Ahmad Ariffian Bin Bujang is currently an associate professor at Faculty Geoinformation and Real Estate in Universiti Teknologi Malaysia (UTM). He also is a registered valuer under Board of Valuers, Appraisals and Estate Agents Malaysia. He received his doctorate in Universiti Malaya. His specialization is in valuation and property investment. He is also interested in statutory valuation. He has published several research papers and books on aforementioned topics.

Wilson Rangga Anthony Jiram received his B.Sc. of property management and M.Sc. degree of real estate at Universiti Teknologi Malaysia. Currently, he is doing Ph.D. in real estate at Universiti Teknologi Malaysia, Malaysia. His current research is focused on real estate education. He also interested in housing and property management area and has published several research papers on aforementioned topics.

Hasmah Abu Zarin received her BSc degree at Franklin University, Columbus Ohio, U.S.A. in real estate and holds a master degree in Land Economy at Abeerden University, Scotland, UK. Currently, she is a senior lecturer at Universiti Teknologi Malaysia. Her current research is focused on valuation, economy and planning. She also interested in sustainability area has published several research papers on aforementioned topics. She is a member of Institution of Surveyors Malaysia from 1999 until now.

Mohd Nadzri Jaafar is currently a senior lecturer in Universiti Teknologi Malaysia (UTM). He received his doctorate in development science (land development) at Universiti Kebangsaan Malaysia. His specialization is in land development and property management.