

Financial Literacy and Saving Attitude among Malaysian Population

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Abstract

This research was designed to determine whether age, gender, and ethnicity have a significant effect on the saving attitude. This study aims to assess the financial literacy of Malaysian adults and identify their wealth-accumulation habits as a precondition for their retirement planning decision-making. It creates a framework based on financial capabilities, availability, accessibility, and affordability of private retirement plans, as well as individuals' awareness of these requirements. The findings will help policymakers encourage private retirement planning and the industry create retirement packages that appeal to a wider range of people. All participants were notified that their involvement was optional, and their responses would be kept confidential. The aim of the sampling method was to acquire a representative sample of the population through random selection. Based on all these findings, it will enable policymakers to incentivize private retirement planning and help the industry develop retirement packages.

Keywords

Financial Literacy, Saving Attitude, Retirement Planning

1.0 Introduction

There is an increased consideration of financial well-being by researchers and scientists since it reflects an individual's economic standing, and level of debt (Sabri, Wijekoon, & Rahim, 2020). Bottom-up spillage theory has been used in understanding individuals' well-being and measuring satisfaction and overall life satisfaction (Uysal & Sirgy, 2019). Using Norwegian administrative panel data, Fagereng et al. (2019) studied if households with more money save more of it than those with less money, and established that saving was approximately constant across the wealth distribution. Kadoya & Khan, (2020) studied the factors that influence financial literacy and established that gender, age, and occupation are among the demographic factors that had a significant impact in Japan. Also, a psychological factor of perceptions of the future significantly affects the level of financial literacy,

Submission: 1 December 2024; **Acceptance:** 27 December 2024



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2.0 Literature Review

Saving money is an important part of accumulating wealth and ensuring a stable financial future. Therefore, policy makers should ensure individuals adopt appropriate saving habits. The Employees Provident Fund (EPF) is a social security organisation established under Malaysian law, the Employees Provident Fund Act 1991 (Act 452), that offers retirement benefits to members by managing their funds in an efficient and dependable way (KWSP, n.d.). The Employees Provident Fund attempts to safeguard employees' retirement moments by encouraging them to save up a portion of their earnings. Furthermore, the Employees Provident Fund holds employers accountable to make sure their employees have adequate retirement savings. However, because the inflation rate rises throughout the year, individuals may lose money if the inflation rate goes above the interest rate on a savings account. Therefore, it is strongly advised that the Employees Provident Fund promote investment and savings programmes to individuals. The Employees Provident Fund, for example, should give a superb long-term investment opportunity with a high potential return. Because larger yields at lower extra levies allow for quicker individual wealth accumulation. Policy makers should also push the Employees Provident Fund to provide savings schemes that allow people to save, invest, and amass cash for the future. These savings strategies assist individuals in investing consistently and disciplined, resulting in consistent saving habits and considerable returns. As a result, policy makers should follow this example and encourage the Employees Provident Fund to offer a growing number of high-return savings pension plans to help a large number of individuals who are interested in saving money.

There's a significant relationship between saving attitude and retirement planning therefore government agency can launch educational campaigns to increase public awareness about the importance of saving for retirement planning. This can include seminars, workshops, and online resources to help people understand the various options available and the implications of their choices. They can also collaborate with private financial institutions to provide access to more resources and expertise on retirement planning. This is because based on OECD, financial understanding is correlated with education and income levels and this is aligned with our survey whereby the saving attitude is the lowest for people with education level of high School and below and category of household income of RM 3,000 and below (OECD, 2005). Therefore, it is important to educate about the importance of saving for retirement planning.

Besides that, it has been observed that retirement planning for females is weaker compared to males based on our result. Therefore, it could be beneficial to promote retirement planning courses specifically designed for women to address this gap. Such courses could focus on the specific challenges and barriers that women may face in retirement planning, and provide tailored strategies and solutions to help women overcome them. By promoting retirement planning courses for women, we can help to bridge the gap in retirement preparedness between genders and improve the financial well-being of women in retirement.

Financial institutions can encourage voluntary savings tools to offer a broader range of investment and income options. Financial institutions can complement EPF savings for retirement by providing additional low-risk investment products, such as unit trusts, fixed-income bonds, and fixed deposits, while insurance firms can advertise low-risk long-term investments in endowments

and annuities. These platforms for voluntary savings are critical, especially for younger generations, before spending money on temptations and leaving individuals vulnerable to financial disasters.

Life insurance and medical insurance have also grown in popularity in recent years. Individuals become increasingly amenable to the idea of purchasing insurance as a hedge against financial troubles during illness or the loss of a loved one as a society develops in financial literacy. As a result, it broadens the chances for insurance companies to provide more inexpensive, innovative, and comprehensive insurance products in order to reach a larger number of people. Even though it is strongly recommended that every Malaysian have at least one insurance policy, we believe that insurance companies should also focus on providing medical coverage to younger generations. It is also more cost-effective to begin obtaining insurance at a younger age.

The efforts of the government to promote healthy financial planning and develop financial literacy among the general population can be bolstered by the efforts of private companies that offer insurance and investment services. In response to market developments and requests, many novel insurance and investment solutions might be launched. Financial decision-making is facilitated by having a higher level of financial literacy, which helps people handle their money more effectively.

3.0 Analysis and Results

For the methodology of this report, a random sampling method was employed to gather data. The study utilized a Google Sheets form sent to friends and family to participate in the study. The location for data collection was online, as the participants were requested to fill out the Google Sheets form. This method of data collection provided a simple and convenient way for participants to engage in the study. The form was shared with participants through email, as well as social media platforms like Facebook and WhatsApp. The data collection process lasted from 14 April to 22 April, and the researchers collected 100 samples before concluding the study. The duration of data collection was chosen based on the researchers' availability and the desired sample size.

Descriptive Analysis

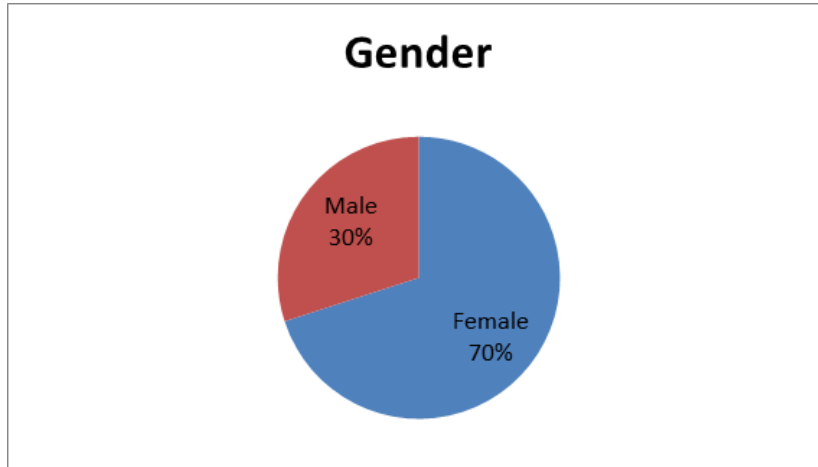
Table 1: Ethnic distribution

Ethnic	Frequency	Percent
Malay	7	7%
Chinese	66	66%
Indian	20	20%
Bumiputera	1	1%
Eurasian	1	1%
Punjabi	4	4%
Sikh	1	1%
Grand Total	100	100.00%

Table 1 shows that there are 100 total participants; the largest ethnic group is Chinese, making

up 66% of the total. 20% of our participants are Indian. The remaining 7% of participants are of other ethnicities.

Figure 1: According to Figure 1, only 30% of the participants were male, whereas 70% of the responders were female.



Gender distribution

Figure 2: Age distribution

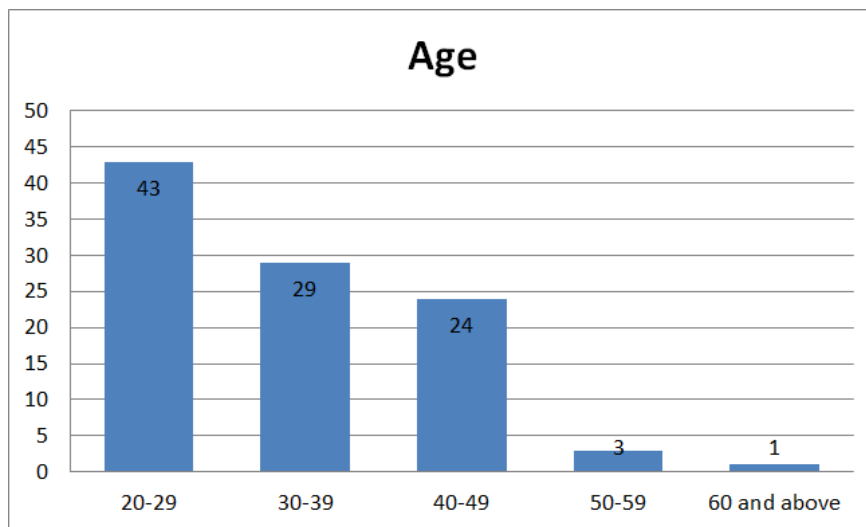


Figure 2 depicts that a significant proportion of the study's participants were between the ages of 20 and 29, while only a small fraction were 60 years or older. 43% of the participants were between the ages of 20 and 29, 29% were between 30 and 39, 24% were between 40 and 49, 3% were between 50 and 59, and only 1% were 60 or older.

Table 2: Occupation distribution

Occupation	Frequency	Percent
Self-employed	14	14%
Government sector	2	2%
Student	3	3%
Private sector employee	58	58%
Professional (lawyer, accountant, academician, etc)	18	18%
Military/Armed force	0	0%
Other	5	5%
Grand Total		100.00%

Table 2 presents the distribution of occupations among a group of 100 individuals, with 14% being self-employed, 2% in the government sector, 3% as students, 58% as private sector employees, 18% as professionals (lawyer, accountant, academician, etc.), 0% in the military/armed forces, and 5% in other occupations.

Figure 3: Education Level

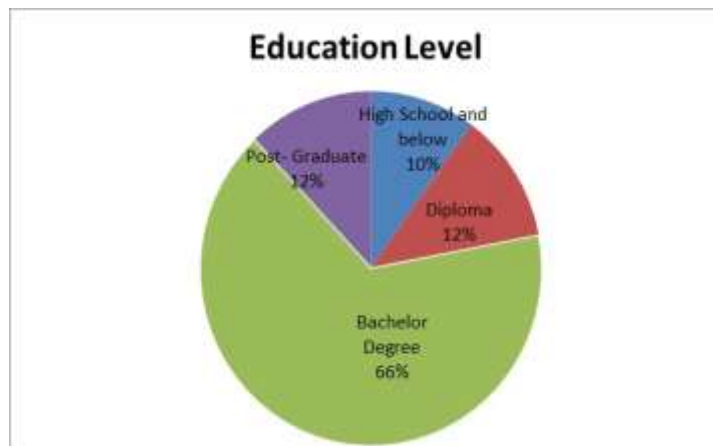


Figure 3 shows the frequency of educational attainment among a group of individuals, with 10% of individuals having a high school education or below, 12% of individuals holding a diploma, 66% of individuals holding a bachelor's degree, and 12% of individuals having a post-graduate education.

Figure 4: Household Monthly Income

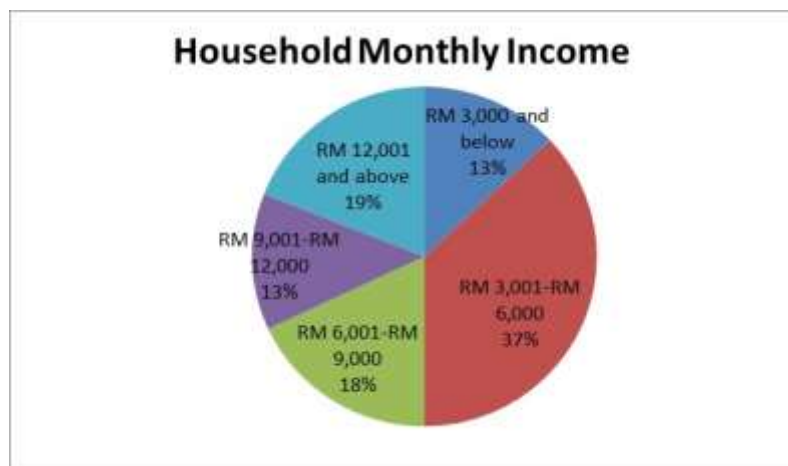


Figure 4 shows the distribution of household monthly income among a group of individuals, with the highest percentage of individuals (37%) having a household income between RM 3,001 and RM 6,000. The next highest percentage of individuals (19%) had a household income of RM 12,001 and above, followed by 18% of individuals with a household income between RM 6,001 and RM 9,000. Similarly, 13% of individuals had a household income between RM 3,000 or below, and 13% of individuals had a household income between RM 9,001 and RM 12,000.

Normality Test

The analysis of normality for the variables was conducted using the skewness and kurtosis coefficients. In a normally distributed data set, the skewness coefficient falls between ± 1.5 , and the kurtosis coefficient falls between ± 2.0 .

After conducting the normality analysis, it was found that all variables had skewness and kurtosis coefficients within an acceptable range for normal distribution. Therefore, it is assumed that all variables are approximately normal in distribution.

	<i>Retirement planning</i>	<i>Saving Attitude</i>	<i>Materialism</i>	<i>Future Orientation</i>	<i>Propensity Pl</i>
Mean	4.1625	5.0225	3.0625	4.3225	3.995
Standard Error	0.074058	0.07369	0.108209	0.075486	0.122009
Median	4	5.25	3	4.25	4
Mode	3.75	6	2.25	3.75	4
Standard Deviation	0.740576	0.736919	1.082094	0.754862	1.220087
Sample Variance	0.548453	0.543049	1.170928	0.569817	1.488611
Kurtosis	0.322222	-0.11611	-0.16324	-0.54997	-0.08479

Skewness	0.530316	-0.60178	0.430172	0.315749	-0.38346
Range	3.5	3	5	3	5
Minimum	2.5	3	1	3	1
Maximum	6	6	6	6	6
Sum	416.25	502.25	306.25	432.25	399.5
Count	100	100	100	100	100

Table 3: Descriptive Statistics

The average scores for retirement planning, saving attitude, materialism, future orientation, and propensity to plan are 4.1625, 5.0225, 3.0625, 4.3225, and 3.995, respectively. The standard deviation for each variable ranges from 0.740576 to 1.220087, indicating some variability in the data. The range of scores varies from 3 to 5 for retirement planning, 3 to 6 for saving attitude and future orientation, 1 to 6 for materialism, and 1 to 5 for propensity to plan. The skewness values are negative for saving attitude and future orientation, indicating that these variables are slightly left-skewed, while the other variables are slightly right-skewed. The kurtosis value for all variables are close to zero, indicating that the distribution is close to a normal distribution.

Hypotheses Testing

t-Test for Retirement Planning for Male and Female Population

A hypothesis of whether there's a significant difference between the two genders when it comes to retirement planning were tested as below:

H_0 = There is no significant difference between the two genders when it comes to retirement planning

H_1 = There's a significant difference between the two genders when it comes to retirement planning

Table 4: F-Test Two-Sample for Variances

	Female	Male
Mean	4.079	4.358
Variance	0.544	0.520
Observations	70.000	30.000
df	69.000	29.000
F	1.047	
P(F<=f) one-tail	0.459	
F Critical one-tail	1.740	

According to the information presented in Table 4, since the calculated p-value for the f-test is greater than 0.025 (p-value = 0.459), we will fail to reject the null hypothesis (H_0). This

suggests that there is no significant difference in the variance of the mean score of retirement planning between both genders.

Table 5: t-Test: One-Sample Assuming Equal Variances

	<i>Female</i>	<i>Male</i>
Mean	4.078571429	4.358333333
Variance	0.544461698	0.520186782
Observations	70	30
Pooled Variance	0.537278304	
Hypothesized Mean Difference	0	
df	98	
t Stat	-1.749035288	
P(T<=t) one-tail	0.04170791	
t Critical one-tail	1.660551217	
P(T<=t) two-tail	0.08341582	
t Critical two-tail	1.984467455	

Based on the calculated p-value from Table 5, since the p-value is less than 0.05 (p-value =0.042), therefore we will reject H₀. Thus, it would mean that there is a significant difference between both genders when it comes to retirement planning. This is supported by the mean of male (4.358) is higher than the mean of female (4.078)

t-Test for Saving Attitude between Male and Female Population

Another hypothesis of whether there's a significant difference between the two genders when it saving attitude was also tested:

H₀= There is no significant difference between the two genders when it comes to saving attitude
H₁= There's a significant difference between the two genders when it comes to saving attitude

Table 6: F-Test Two-Sample for Variances

	<i>Female</i>	<i>Male</i>
Mean	5.0143	5.0417
Variance	0.4744	0.7245
Observations	70.0000	30.0000
df	69.0000	29.0000
F	0.6548	
P(F<=f) one-tail	0.0773	
F Critical one-tail	0.6128	

P-value for the f-test is greater than 0.025 (p-value = 0.0773), we will fail to reject the null hypothesis (H0). This suggests that there is no significant difference in the variance of the mean score of retirement planning between both genders.

Table 7: t-Test: Two-Sample Assuming Equal Variances

	Female	Male
Mean	5.0143	5.0417
Variance	0.4744	0.7245
Observations	70.0000	30.0000
Pooled Variance	0.5484	
Hypothesized Mean Difference	0.0000	
df	98.0000	
t Stat	-0.1694	
P(T<=t) one-tail	0.4329	
t Critical one-tail	1.6606	
P(T<=t) two-tail	0.8658	
t Critical two-tail	1.9845	

Based on the calculated p-value from Table 7, since the p-value is more than 0.05 (p-value= 0.432), therefore we can accept H0 which means there's no significant difference between the two genders when it comes to saving attitude. This indicates that both male and female population have similar values and attitude when it comes to saving behaviour.

One-Way ANOVA Analysis

ANOVA test for Retirement Planning between races

A hypothesis testing using One-way ANOVA was conducted to test if there is a significant difference between the races (Malay, Chinese, Indian and others) when it comes to retirement planning.

H₀= There is no significant difference between the races when it comes to retirement planning
 H₁= There is a significant difference between the races when it comes to retirement planning

Table 8: Anova: Single Factor

SUMMARY

Groups	Count	Sum	Average	Variance
Malay	7.000	29.250	4.179	0.244
Chinese	66.000	276.250	4.186	0.672
Indian	20.000	83.000	4.150	0.246
Others	7.000	27.750	3.964	0.696

ANOVA

Source of Variation	SS	df	MS	F	P-value	F crit
Between Groups	0.315	3.000	0.105	0.187	0.905	2.699
Within Groups	53.982	96.000	0.562			
Total	54.297	99.000				

We can conclude from Table 9 that the p-value is more than 0.05 (p-value=0.905), hence we can accept H0 that there's no significant difference between the races when it comes to retirement planning. Based on the average, we can make an assumption that all the races have similar values range from 3.964-4.18

Multiple Regression Analysis

A multiple regression model is a mathematical function showing a relationship between variables. The function is helpful since it can be used to predict one variable using the others (Gambhir et al., 2020). In this case, retirement planning, materialism, future orientation, and propensity to plan are used to predict the saving attitude among the respondents. The regression model would help test the following four hypotheses;

H1: There is a significant relationship between saving attitude and retirement planning

H2: There is a significant relationship between saving attitude and materialism.

H3: There is a significant relationship between saving attitude and future orientation

H4: There is a significant relationship between saving attitude and the propensity to plan

Table 9: SUMMARY OUTPUT

<i>Regression Statistics</i>	
Multiple R	0.681098
R Square	0.463895
Adjusted R Square	0.441322
Standard Error	0.550808
Observations	100

ANOVA

	<i>df</i>	<i>SS</i>	<i>MS</i>	<i>F</i>	<i>Significance F</i>
Regression	4	24.93985	6.234963	20.551	3.18E-12
Residual	95	28.82202	0.30339		
Total	99	53.76188			

	<i>Coefficients</i>	<i>Standard Error</i>	<i>t Stat</i>	<i>P-value</i>	<i>Lower 95%</i>	<i>Upper 95%</i>
Intercept	1.80142	0.427327	4.215557	5.68E-05	0.953069	2.649771
Retirement planning	0.269615	0.079644	3.385232	0.001035	0.111501	0.427729
Materialism	0.046203	0.053916	0.856938	0.393636	-0.06083	0.153239
Future Orientation	0.227086	0.078726	2.884502	0.00485	0.070795	0.383378
Propensity to Plan	0.244239	0.050856	4.802529	5.83E-06	0.143276	0.345201

The result of the regression model fitted is statistically significant ($F(4, 95) = 20.551$, p -value = 0.4413). This model accounts for 44.13% of the variance of the saving attitude among Malaysians. Based on the fitted model, the following conclusion is drawn regarding the stipulated hypothesis.

There was evidence to conclude that saving attitude has a significant impact on retirement planning since the p -value is less than 0.05 ($b = 0.2696$, $t = 3.38$, $p < 0.05$). Saving attitude is not linked to materialism since the p -value associated with this coefficient is greater than 0.05 ($b = 0.0462$, $t = 0.857$, p -value = 0.3936). Further, it was established that there is a significant relationship between saving attitude and future orientation ($b = 0.2271$, $t = 2.885$, p -value < 0.05) and also there is a significant relationship between saving attitude and propensity to plan ($b = 0.244$, $t = 4.802$, p -value < 0.05).

Limitations

Although the research was well-designed, there were some limitations that could impact the interpretation of the results. The limited time available for data collection led to a small sample size that did not adequately represent the country's demographics, thereby diminishing the veracity of data analysis. In addition, the questionnaire was not reviewed prior to distribution, and respondents' inability to comprehend the queries may have affected the reliability of their responses. Lastly, the objectivity of the results depended on the cooperation and truth-seeking spirit of the respondents. To enhance future studies, researchers can employ representative sampling, pilot test questionnaires, and ensure that participants comprehend the significance of their participation. Recognising the limitations and their effects can enhance the study's credibility and validity.

4.0 Conclusion

"Rakyat Quality of Life" is at the heart of Malaysia's New Economic Model, and advances in healthcare and social services boost life expectancy, requiring private wealth. This research aims to assess the financial literacy of Malaysian adults and identify wealth accumulation behaviour as a prerequisite for retirement planning decision making. Based on our findings, we have found that there's a significant difference between gender when it comes to retirement planning whereby male has mean that's higher than female. Whereas, both male and female population have similar values and attitude when it comes to saving behaviour and all races have similar behaviour when it comes to retirement planning. Furthermore, we can conclude that saving attitude has a significant impact on retirement planning, saving attitude is not linked to materialism, saving attitude and future orientation has a significant relationship and also there is a significant relationship between saving attitude and propensity to plan.

We provide advice for current Malaysian financial and retirement plans based on our data research. Whenever these proposals are put into action in practical terms, people will have a more optimal manner of saving. Data collection was limited due to a small sample size, inadequate questionnaire review, and respondents' inability to comprehend queries. Researchers should employ representative sampling, pilot test questionnaires, and ensure participants comprehend the significance of their participation to enhance the study's credibility and validity.

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