

Research Paper

Determinants of Personal Financial Management Behavior: Moderating Role of Financial Literacy

Ida Nur Aeni*, Anna Kania Widiatami, Ratieh Widhiastuti, Nurdian Susilowati, Septa Perdana

Department of Economics Education, Faculty of Economics, Universitas Negeri Semarang

ORCID

Ida Nur Aeni: <https://orcid.org/0000-0002-6086-9168>

Abstract.

This study aims to investigate the effect of subjective norms and propensity to plan on personal financial management behavior, with financial literacy as a moderation. This study is a quantitative approach and data collection were done using questionnaires. The population of this study were students of Economics Education (Accounting) Department on one of University in Indonesia with a total of 235 students. In this paper, we used partial least squares to measure potential constituents as a composite index-path modeling. We used WarpPLS software version 7.0 to explore the relationships contained in the model. The structural equation model results show that subjective norms and the propensity to plan have a positive effect on personal financial management behavior. Additionally, financial literacy was able to moderate the influence of subjective norms on personal financial management behavior. However, moderating effects do not happen on the propensity to plan. This research implies that personal financial management behavior can depend on psychological aspects.

Keywords: subjective norms, propensity to plan, personal financial management behavior, financial literacy

1. Introduction

According to the results of the Global Consumer Insights 2020 PricewaterhouseCoopers (PwC) survey entitled "Before and After the Covid-19 Outbreak" 65% of Indonesian consumers have experienced a decline in their household income and 64% of Indonesian consumers are optimistic about spending most of their household income. Ease of access is also supported by innovations that never stop. Innovation in the field of financial technology is a technology that provides services in the form of financial services that are convenient, practical, easy, efficient and of course economical [1]. Then there is the convenience of meeting needs through e-commerce, namely Tokopedia, Shopee and Bukalapak. The three websites provide a variety of very complex needs, ranging from furniture, food, household needs, and much more. The ease of internet

Corresponding Author: Ida Nur Aeni; email: idanuraeni@mail.unnes.ac.id

Published 24 January 2024

Publishing services provided by Knowledge E

© Ida Nur Aeni et al. This article is distributed under the terms of the [Creative Commons Attribution License](#), which permits unrestricted use and redistribution provided that the original author and source are credited.

Selection and Peer-review under the responsibility of the 4th INCLAR Conference Committee.

 OPEN ACCESS

access is also a big pioneer in increasing a person's consumption. If these facilities are not balanced with literacy and behavioral control, it will result in poor output and can have a bad impact on personal finances.

Students are young people who are required to be able to give a positive influence on their environment. But before that, students must first improve themselves, one of which is personal financial management behavior [2]. In practice, financial management is not an easy thing, and not many students understand how to optimally manage personal finances. Students in their age range are in transition from parental finances to becoming independent, so they still have various problems in financial management [3]. In the research of [4] providing suggestions and future research agendas regarding financial personal management behavior, the article mentions many aspects that can influence a person's management behavior, one of which is the psychological aspect in the form of subjective norms and propensity to plan. These psychological aspects must be supported by various specific theories [4]. [5] research states that behavioral finance theory has recognized psychological dispositions in determining a person's financial management behavior.

This study adds financial literacy as a moderating variable. [4] also state that personal financial management behavior (PFMB) is the result of financial literacy, in line with [6] also consider financial behavior as a result of financial literacy. Therefore, the aims of this study is to investigate, analyze and describe the influence between subjective norms and the propensity to plan on personal financial management behavior directly and with financial literacy as a moderating variable.

2. Literature Review

2.1. Personal Financial Management Behavior

Personal financial management behavior is the ability and attitude skills possessed by individuals to plan, budget, audit, manage, control, search and store financial funds in their daily lives [3]. Financial management behavior is an individual's skill in managing his finances, including finding, storing financial funds, planning for future funds, budgeting, and how to process financial funds [7]. This behavior is a process that combines all the components of an individual's financial interest. The research developed by [7] is based on selective financial management behavior. Personal financial management behavior can be measured through four indicators, namely consumption, cash flow, savings and investment, and debt management.

2.2. Subjective Norms

Based on the Theory of Planned Behavior proposed by [8], subjective norm is a construct in influencing behavior and predicting intention to behave. Subjective norms are individual opinions about the perceived social pressures in their environment, and whether to take an action or not. Social pressures that arise can come from parents, friends, siblings, and the environment. Perceptions that arise from the individual or group environment can influence a person's behavior. An impulsive environment can shape consumptive behavior. As a result, their financial management behavior will also deteriorate, and vice versa [9]. It can be concluded that environmental factors and the encouragement and motivation of others have an important role in determining decisions in behavior, including how individuals manage their finances.

Subjective norms have two components, namely normative beliefs and compliance motivation [10]. The role of subjective norms is very important in determining a person's financial behavior, for example, if the people around him such as parents, friends, and relatives have good financial management behavior, the individual will also be encouraged to carry out activities similar to their environment. The better the subjective norms felt by students, the better their behavior will be. This accordance with research conducted by [11] which states that subjective norms will encourage good financial behavior such as saving behavior. The more positive the subjective norm, the higher the individual's motivation and intention to behave [12]. Furthermore, [13], [14] examined subjective norms in the form of financial socialization. Research has a significant effect on the behavior of a person's financial management. Based on the above idea, the researcher formulates the hypothesis as follows:

H1: Subjective norms affect personal financial management behavior

2.3. Propensity to Plan

Propensity to plan refers to individuals who plan for long-term goals. Individuals who have a propensity to plan will have good management behavior. Individuals who have a propensity to plan finances will have the characteristics to plan money and plan time [15]. Students who have a propensity to plan money will be able to manage and manage their financial expenses and income. Expenditures that occur can be in the form of expenses for consumption or college needs, while income is usually from pocket money from parents, scholarship money, money from part-time work or other income. The second character is a propensity to plan time, students who have time planning tend to have

a systematic behavior pattern and have a disciplined character. Activities that can be carried out can be in the form of making notes about expenses and income, planning when to pay rent and electricity bills and time to save. With good planning in terms of finance and time, it will foster good financial behavior as well [16].

Based on this idea, it can be concluded that the propensity to plan affects personal financial management behavior. The role of propensity to plan is very important for individuals, for example, if individuals tend to do money planning such as saving habits, making priorities, etc. it will result in good and planned financial management behavior for long-term goals. This statement is supported by several studies [16], [17] which state that the propensity to plan influences financial behavior. Based on the above idea, the researcher formulates the hypothesis as follows:

H2: Propensity to plan to affect personal financial management behavior

2.4. Financial Literacy

Financial literacy is the ability and knowledge possessed by a person in overcoming financial decisions. Financial literacy is closely related to financial behavior, because in everyday life the better their financial literacy or knowledge, the better the individual will manage his finances. Financial literacy can moderate the influence of subjective norms on personal financial management behavior. This statement is in line with several researchers investigating a person's financial behavior [3], [18]–[20]. These study show an effect of financial literacy on financial management behavior.

Students who have a high literacy level will be able to prioritize their daily activities. This activity can be in the form of monthly expenses, consumption needs, college needs, paying rent, paying tuition fees, and other short-term decisions as well as long-term decisions such as making savings and investment decisions. Students with good self-control based on high financial literacy will assist students in considering and making all decisions in financial aspects regardless subjective norms. It can be concluded that financial literacy can weaken the influence of subjective norms on personal financial management behavior because financial literacy is the basic concept of self-control in the financial aspect. Students who have a positive subjective norm concept in the form of belief and encouragement as well as motivation from parents, lecturers, relatives and friends regarding good and correct financial management, then supported by financial literacy as a knowledge base will produce a positive behavior in the form of good personal financial management.

Financial literacy can strengthen the influence of the propensity to plan on personal financial management behavior, because increasing financial literacy can encourage someone to plan in the form of money planning and time planning. For example, if students have good money planning such as planning every expense and income, and have knowledge of finance, for example, how to make a priority scale, it will help students improve their planning so that they can form appropriate financial management behavior. Financial literacy becomes a strong influence because it provides individuals with a basic concept of self-control and knowledge of financial management. Students who have a propensity to plan supported by high financial literacy will produce positive behavior in the form of good financial management behavior. Based on the above idea, the researcher formulates the hypothesis as follows:

H3: Financial literacy moderates the effect of subjective norms on personal financial management behavior

H4: Financial literacy moderates the effect of the propensity to plan on personal financial management behavior

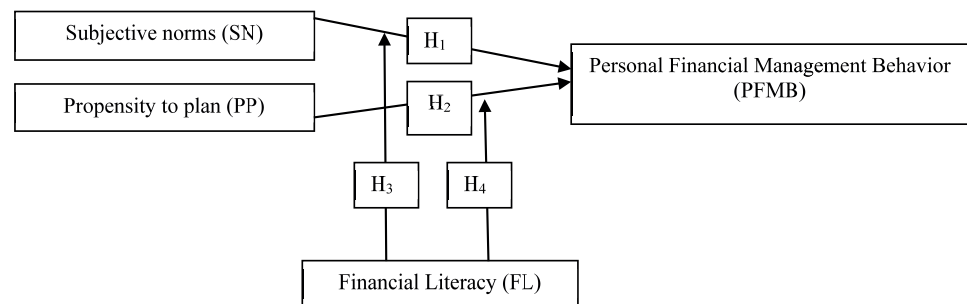


Figure 1: Research Model.

3. Methods

3.1. Sample and data collection

The population of this study were students of Economics Education (Accounting) Department on one of University in Indonesia with a total of 235 students. Students in accounting education department tend to have varied knowledge because the subjects studied are not only focus on accounting but also economics, psychology, management, and education. Therefore, researchers want to know and analyze how the personal financial management behavior. Sample of 148 students calculated through the slovin formula with a simple random sampling technique. We collected our data using a questionnaire.

3.2. Measures

The dependent variable of this study was personal financial management behavior (PFMB), while the independent variables in this study were subjective norms (SN) and propensity to plan (PP), as well as variables financial literacy moderation (FL). The personal financial management behavior variable is measured based on the indicators proposed by [7], namely consumption, cash flow, savings and investment, and debt management. The subjective norm variable is measured based on the indicators proposed by [10], namely normative beliefs and motivation to comply. The propensity to plan variable is measured based on the indicators proposed by [15], namely propensity to plan money and propensity to plan time. While the financial literacy variable is measured based on the indicators proposed by [21] namely basic knowledge in financial management, debt or credit management, savings and investment management, and risk management.

3.3. Data Analysis

We used the PLS-PM technique to analysis data through an iterative algorithm based on ordinary least squares (OLS). The PLS-PM model consists of two parts: an outer or measurement model and an inner or structural model that estimate hypothetical relationships between latent variables. The outer model evaluates the relationships of the latent constructs using their respective indicator manifest variables as composite indices, while the inner model estimates the relationships between the latent variables themselves. We used WarpPLS software version 7.0 to conduct the analysis.

4. Result

The results of descriptive statistical analysis for the behavioral variables of personal financial management behavior, subjective norms, a propensity to plan, and financial literacy are listed in Table 1.

TABLE 1: Descriptive Statistical Analysis.

Variable	N	Minimum	Maximum	Mean	Std. Deviation
Personal Financial Management Behavior (PFMB)	148	29	48	40.10	4.268
Subjective Norm (SN)	148	38	60	51.29	5.421
Propensity to Plan (PP)	148	30	56	45.76	6.048
Financial Literacy (FL)	148	0	7	4.52	1.904

Based on the results of descriptive statistics in the table 1, it can be concluded that the highest value personal financial management behavior variable is 48 and the lowest value is 29, the highest value subjective norm variable is 60 and the lowest value is 38, the variable propensity to plan the highest value is 56 and the lowest value is 30, while the financial literacy variable has a maximum value of 7 and the lowest value is 0. The average value the average for the personal financial management behavior variable is 40.10 which is included in the very good category, the subjective norm variable is 51.29 which is included in the very good category, a propensity to plan variable is 45.76 which is included in the good category, and the propensity to plan variable is 4.52 is also included in the good category.

4.1. Measurement (outer) model

We assess reliability among them internal consistency (composite reliability), indicator reliability, convergent validity and discriminant validity. Table 2 shows composite reliability (with all values above the 0.70 threshold) [22] and Cronbach’s alpha coefficients. Two measurements show reasonable values for internal consistency (Cronbach’s FL of 0.646 and PMFB of 0.628), but the tolerance for Cronbach’s alpha can be low as 0.5 for a small number of items. It relies Nunnally’s recommendation that it is possible [22].

TABLE 2: Assesment of the measurement model.

Variable	Composite (D.H.rho)	reliability	Cronbach's coefficients	alpha
SN	0.844		0.803	
PP	0.853		0.816	
FL	0.766		0.646	
PMFB	0.721		0.628	

Table 3 provides detailed information on the discriminant validity of the measurement scales.

TABLE 3: Discriminant validity of variable constructs.

Variable	SN	PP	PFMB	FL
SN	0.521	0.421	0.44	0.131
PP	0.421	0.558	0.544	0.387
PMFB	0.44	0.544	0.445	0.243
FL	0.131	0.387	0.243	0.583

4.2. Structural (inner) model

Multicollinearity was checked and all VIF values were found to be less than 1.585, below the recommended threshold of 5. In terms of goodness of fit, the tenenhaus goodness of fit (GoF) is 0.466, which is above the recommended threshold of 0.36.

TABLE 4: Structural equations model results.

Variable	Path coefficient/ significant	effect size
	PMFB	PMFB
SN	0.349***	0.183
PP	0.404***	0.226
FL*SN	-0.124*	0.03
FL*PP	0.093	0.021
R2/Adjusted R2	41.7%/ 40%	

Table 4 shows the path coefficients and their significance levels, the R^2 and adjusted R^2 values for the endogenous constructs and the effect sizes (similar to Cohen's f^2) for personal financial management behavior. Figure 2 shows the research model results. The research model results show that the level of explained variance, $R^2 = 41.7\%$, is related to personal financial management behavior. SN has a significant positive effect on PFMB (H1, $b = 0.349$, $p < 0.01$). PP has a significant positive effect on PFMB (H2, $b = 0.404$, $p < 0.01$). FL*SN has a significant negative effect on PFMB (H3 $b = -0.12$, $p < 0.1$), but FL*PP has no significant influence on PMFB (H4, $b = 0.093$). In terms of effect size, PP has the highest contribution on PFMB (0.226), thus indicating that interventions on propensity to plan result in a relatively large effect.

5. Discussion

5.1. Subjective norms affect Personal Financial Management

Subjective norms are very important in shaping a person's behavior. Students have various backgrounds with different subjective norms. Students with high subjective norms mean that there is high support from their environment in shaping behavior so that it will produce appropriate financial management behavior, and vice versa if students have low subjective norms, they can form inappropriate personal financial management behavior.

Students usually have subjective support from people around them such as parents, siblings, lecturers and friends. Students tend to have high subjective norms, it can be interpreted that on average students get advice and input from parents, relatives,

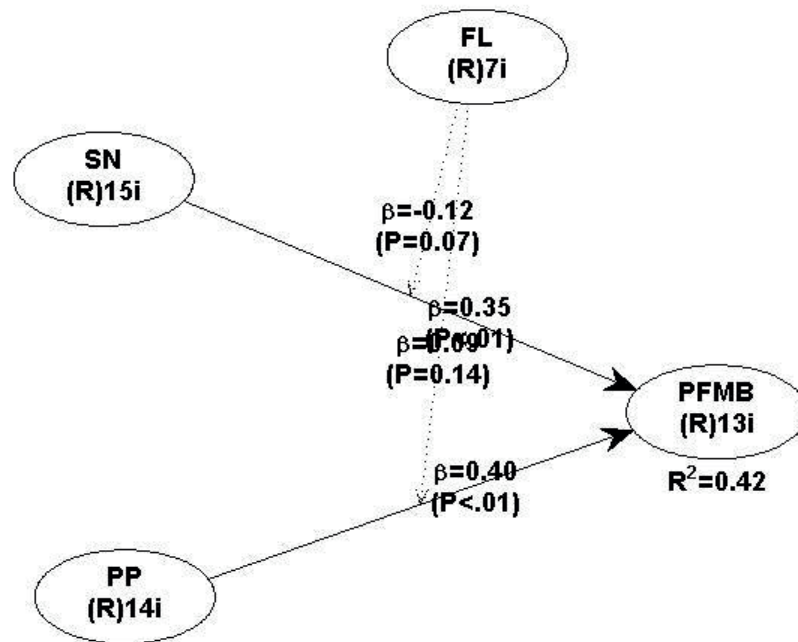


Figure 2: Research model results.

lecturers and friends, and tend to do the advice given. The student environment can be said to be very supportive concerning managing their finances so that it can result in the assumption that financial management is a good and important thing to do, and in practice, it can influence individual personalities under financial management behavior.

Based on the structural equations model results, subjective norm has a significant positive effect on personal financial management behavior with significance level of < 0.01 , then H1 is supported. The results of this hypothesis are in line with the Theory of Planned Behavior that the views and perceptions of others on an individual are able to influence their attitudes and behavior.

High subjective norms are caused by normative beliefs and motivation to implement or follow other people's suggestions and opinions. The results show that students of accounting economics education have succeeded in optimizing the support of the people around them and can form behavior that is under the direction of those closest to them so that they can produce good personal financial management behavior. On the other hand, if students have low subjective norms, meaning that they lack encouragement and motivation around them or the individual himself feels that it is his right to perform a behavior, the individual will tend to ignore the views of the people around him, so that low subjective norms will shape management behavior. low personal finances.

The results of this hypothesis are in line with research conducted by [12]. Furthermore, [13], [14] in the form of financial socialization refers to the concept of subjective norms in the theory of planned behavior that states that subjective norms influence personal financial management behavior. Where social pressure, the views of the people around and encouragement from the closest people such as family and friends can have a positive or negative influence.

5.2. Propensity to Plan Affects Personal Financial Management Behavior

The propensity to plan is an attitude of individuals who have a propensity to do long-term planning. Students who have a high propensity for planning are always careful in making decisions, especially those related to financial decisions, this attitude can create personal financial management behavior. Vice versa if students have a low propensity to plan, it will result in inappropriate personal financial management behavior.

Students who have a propensity to plan will do two things, namely planning money and planning time. From the results of descriptive statistical analysis, students have a propensity to plan in the good category. It can be interpreted that students are quite optimal in planning money and time planning so that they can form good financial behavior.

Based on the structural equations model results, propensity to plan has a significant positive effect on personal financial management behavior with significance level of <0.01 , then H2 is supported..

High financial planning can also reduce the consumptive nature of individuals due to good judgment and self-management and control. With the high propensity for planning in students, it can be interpreted that students can do financial planning and optimal time planning. Optimal planning can form financial control and stable self-control in carrying out all expenses to meet their needs. This is because the expenses and income managed by students are not too many. The average student income is only from parents and scholarships, so you only need to consider your own needs and college needs.

The results of this study are also supported by several researchers [16], [17] who state that propensity to plan influences financial behavior. Propensity to plan is an important indicator to see one's financial ability, it refers to a person's rational attitude in managing finances and long-term goal-setting behavior [16].

5.3. Financial Literacy Moderates Subjective Norms on Personal Financial Management Behavior

Financial literacy is a process of increasing financial knowledge and skills and increasing individual awareness of the importance of financial management. This study attempts to examine whether financial literacy can moderate the effect of subjective norms on personal financial behavior. Based on the descriptive statistical results of financial literacy, accounting economics education students tend to be in a good category. It can be interpreted that the average student already has financial literacy in the form of good objective knowledge.

Based on the structural equations model results, the interaction between subjective norm and financial literacy has a significant negative effect on personal financial management behavior with significance level of <0.1 , then H3 is supported.

Financial literacy was able to weaken the influence of subjective norms on personal financial management behavior. This imply that financial literacy which in practice can be implemented in real life. Students who have good financial literacy will be encouraged to manage their own finances without being affected by external factors, one of which is environmental influences. Financial literacy is a tacit knowledge which enough to make individuals responsible for their financial behavior without external factor. Therefore, financial literacy will weaken the influence of subjective norms on personal financial management behavior.

5.4. Financial Literacy Moderates the Propensity to Plan on Personal Financial Management Behavior

Financial literacy in students based on the results of descriptive statistical tests shows that financial literacy is in the sufficient category. Based on the structural equations model results, the interaction between propensity to plan and financial literacy has no significant effect on personal financial management behavior with significance level >0.05 so H4 is not supported.

Financial literacy turns out to be unable to moderate, this happens because individuals who already have sufficient financial literacy in planning do not necessarily apply existing theories or knowledge so the level of literacy cannot guarantee individuals can control their behavior management [23]. This means that in reality, the level of financial literacy is not able to strengthen a person's financial planning because knowledge alone is not enough to make a person responsible for his behavior [24].

In addition, [25] stated that financial literacy that is understood by individuals is important to have and has an effect on financial behavior, but this influence has relatively no significant effect on their lives. This phenomenon can be caused by the majority of students still living with their parents and still relying on their parents' pocket money so that their financial problems are not too difficult. Students currently do not focus on future finances but only focus on existing needs and funds without thinking about appropriate financial literacy in determining financial planning for the future [26]. The average student has almost balanced expenses and income, meaning that the expenses made are equivalent to the income received.

The results of hypothesis testing are also supported by the research of [2] whose results state that financial literacy cannot be used as a moderating variable on personal financial management behavior. It is also supported by several research [23], [26]–[28] that financial literacy cannot affect a person's financial behavior.

6. Conclusion

The conclusion is based on the results of the analysis and discussion that subjective norms affect personal financial management behavior. The propensity to plan positively affect personal financial management behavior. Financial literacy is able to moderate the influence subjective norms on personal financial management behavior. In the other hand, financial literacy is not able to moderate the propensity to plan on personal financial management behavior. Due to individuals who already have sufficient financial literacy in planning do not necessarily apply existing theories or knowledge.

Based on these conclusions, this research implies that it can provide theoretical contributions as well as be a reference material in understanding personal financial management behavior. The limitation of the study is that the research sample still focuses on students in the accounting education department, so further researchers can develop and increase the number of samples and develop research models related to personal financial management behavior by further analyzing complex factors. Further research can add an intention variable because personal financial management behavior without a strong intention cannot guarantee a person's behavior. In addition, further research can use financial literacy both subjectively and objectively so that the measurement of the instrument is more complete.

ACKNOWLEDGEMENT

The researchers are grateful to Economics Faculty of Universitas Negeri Semarang for funding the research. We are also grateful to the two anonymous reviewers for their insights.

References

- [1] Rahmanto DNA, Nasrulloh. "Risiko dan Peraturan: Fintech untuk Sistem Stabilitas Keuangan". *Inovasi*. 2019;15(1):44–52.
- [2] Dewi IA, Rochmawati R. Pengaruh Money Attitude Terhadap Perilaku Pengelolaan Keuangan Pribadi: Pengetahuan Dan Financial Self-Efficacy Sebagai Moderasi. *J. Pendidik. Ilmu Sos.* 2020;30(2):123–134.
- [3] Asih SW, Khafid M. Pengaruh Financial Knowledge, Financial Attitude dan Income Terhadap Personal Financial Management Behavior melalui Locus Of Control sebagai Variabel Intervening. *Econ Educ Anal J.* 2020;9(3):748–767.
- [4] Goyal K, Kumar S, Xiao JJ. Antecedents and consequences of Personal Financial Management Behavior: a systematic literature review and future research agenda. *Int J Bank Mark.* 2021;39(7):1166–207.
- [5] Copur Z, Gutter MS. Economic, sociological, and psychological factors of the saving behavior: Turkey Case. *J Fam Econ Issues.* 2019;40(2):305–322.
- [6] Kaiser T, Menkhoff L. Does financial education impact financial literacy and financial behavior, and if so, when? *World Bank Econ Rev.* 2017;31(3):611–630.
- [7] Xiao JJ, Ford MW, Kim J. Consumer financial behavior: An interdisciplinary review of selected theories and research. *Fam Consum Sci Res J.* 2011;39(4):399–414.
- [8] Ajzen I. The theory of planned behavior. *Organ Behav Hum Decis Process.* 1991;50(2):179–211.
- [9] Azlan A, Jamal A, Kamal W, Mohdrahimie R, Roslemohidin AK, Osman Z. The effects of social influence and financial literacy on savings behavior: A study on students of higher learning institutions in Kota Kinabalu, Sabah. *Int J Bus Soc Sci.* 2015;6(111):110–119.
- [10] Ajzen I, Fishbein M. "The influence of attitudes on behavior." *Handb Attitudes*, no. January 2005, pp. 187–236, 2005, <https://doi.org/10.4324/9781410612823-13>.
- [11] Widjaja I, Arifin AZ, Setini M. The effects of financial literacy and subjective norms on saving behavior. *Manag Sci Lett.* 2020;10(15):3635–3642.

- [12] Satsios N, Hadjidakis S. Applying the theory of planned behaviour (TPB) in saving behaviour of Pomak households. *Int. J. Financ. Res.* 2018;9(2):122–33.
- [13] Ameliawati M, Setiyani R. “The influence of financial attitude, financial socialization, and financial experience to financial management behavior with financial literacy as the mediation variable.” *KnE Soc Sci.* 2018;3(10):811.
- [14] Setiyani R, Solichatun I. “Financial well-being of college students: An empirical study on mediation effect of financial behavior.” *KnE Soc Sci.* 2019;3(11):451.
- [15] Lynch D, Laws KR, McKenna PJ. Cognitive behavioural therapy for major psychiatric disorder: Does it really work? A meta-analytical review of well-controlled trials. *Psychol Med.* 2010 Jan;40(1):9–24.
- [16] Xiao JJ, O’Neill B. Propensity to plan, financial capability, and financial satisfaction. *Int J Consum Stud.* 2018;42(5):501–12.
- [17] DQO, Hanafi MM. “Pengaruh Literasi Keuangan Terhadap Perilaku Keuangan.” 2016.
- [18] Putri NA, Lestari D. “Pengaruh Gaya Hidup dan Literasi Keuangan Terhadap Pengelolaan Keuangan Tenaga Kerja Muda di Jakarta.” *AKURASI J Ris Akunt dan Keuang.* 2019;1(1):31–42. <https://doi.org/10.36407/akurasi.v1i1.61>
- [19] Shinta RE, Lestari W. The impact of financial knowledge, lifestyle pattern on career woman financial management behaviour with locus of control as. *J Bus Bank.* 2019;8(2):271.
- [20] Rindivenessia A, Fikri MA. “34. Peran Self-Efficacy Dan Sikap Keuangan Sebagai Variabel Mediasi Pada Pengaruh Pengetahuan Keuangan Terhadap Perilaku Keuangan”. *Deriv J Manaj.* 2021;15(1):125–141.
- [21] HC, Volpe RP. “An analysis of personal financial literacy among college students.” *Zhongguo Jiguang. Chin J Lasers.* 1998;7(2):107–128.
- [22] Nunnally JC. Psychometric theory’ 25 years ago and now. *Educ Res.* 1975;4(10):7–21.
- [23] Khairani F, Alfarisi MF. Analisis Pengaruh Financial Attitude, Financial Knowledge, Pendidikan Orang Tua Dan Parental Income Terhadap Financial Management Behavior Pada Mahasiswa S1 Universitas Andalas Padang *J Ilm Mhs Ekon Manaj.* 2019;4(1):360–371.
- [24] Tang N, Baker A. Self-esteem, financial knowledge and financial behavior. *J Econ Psychol.* 2016;54:164–76.
- [25] Regista YA, Fuad M, Dewi M. PENGARUH LITERASI KEUANGAN, GENDER, GAYA HIDUP DAN PEMBELAJARAN DI UNIVERSITAS TERHADAP PERILAKU KEUANGAN MAHASISWA. *JIM Manaj. Manajerial Terap.* 2021;1(1):64–72.
- [26] Susanti A, Widiastuti S. Personal Financial Behavior in Surakarta Students. *Int. J. Entrep. Bus. Creat. Econ.* 2021;1(1):66–73.

- [27] Sampoerno AE, Asandimitra N. 33. Pengaruh Financial Literacy, Income, Hedonism Lifestyle, Self-Control, dan Risk Tolerance terhadap Financial Management Behavior pada Generasi Milenial. *J. Ilmu Manaj.* 2021;9(3).
- [28] Cahyani P, Ekonomi JP, Ekonomi F, Surabaya UN. “Pengaruh Pengetahuan Keuangan, Teman Sebaya, dan Parental Income terhadap Perilaku Keuangan dengan Self-Control sebagai Moderasi,” vol. 4, no. 2, pp. 224–239, 2021. <https://doi.org/10.24036/jmpe.v4i2.11232>