



RESEARCH ARTICLE

The Influence of Financial Literacy and Digital Payment Use on Generation Z's Consumptive Behavior: Evidence from Kopi Kenangan in Surabaya

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Abstract

Indonesia's financial literacy index has risen sharply, yet Generation Z—the largest user segment of digital financial services—still shows an uneven capacity to translate this progress into prudent spending, even as digital payment instruments such as QRIS and e-wallets increasingly reduce the psychological friction traditionally associated with spending cash. This study examines the effect of financial literacy and digital payment usage on the consumptive behavior of Generation Z users of the Kopi Kenangan application in Surabaya. Using a quantitative explanatory approach, data from 100 respondents obtained through purposive sampling were analyzed using Partial Least Square Structural Equation Modeling (PLS-SEM). The results show that financial literacy has a significant positive effect on consumptive behavior, contrary to the negative effect initially hypothesized. This pattern suggests that financially literate individuals may overestimate their own capacity for self-control, an overconfidence effect that leaves them vulnerable to low-friction, gamified digital purchase triggers such as flash sales and tiered loyalty rewards. Digital payment usage, by contrast, shows a positive but statistically non-significant effect, indicating that payment convenience alone does not directly drive consumptive spending. Together, the two predictors explain only a small proportion of the variance in consumptive behavior, pointing to lifestyle, social-media influence, and self-control as more dominant factors warranting further study. These findings imply that digital platforms should consider responsible design features, such as spending-awareness nudges, rather than assuming that financial education alone will curb impulsive consumption among digitally native consumers.

Keywords

Financial Literacy; Digital Payment; Consumptive Behavior; Generation Z.

1 | INTRODUCTION

Financial literacy is a fundamental pillar of individual financial resilience amid accelerating globalization and digitalization. Nationally, Indonesia's financial literacy index has shown encouraging growth: the National Survey on Financial Literacy and Inclusion (SNLIK), jointly conducted by Statistics Indonesia (BPS) and the Financial Services Authority (OJK), recorded an index of only 38.03% in 2019, rising to 49.68% in 2022. Following the first BPS–OJK joint SNLIK in 2024, the index reached 65.43%, with financial inclusion at 75.02%; the most recent SNLIK, released on 2 May 2025, recorded a further increase to 66.46% for financial literacy and 80.51% for financial inclusion (OJK & BPS, 2025). This national improvement, however, does not evenly reflect the financial capability of every societal group. Generation Z—born between 1997 and 2012 and now aged 13–28—remains one of the groups most exposed to this gap. Data from BPS (2025) place this cohort at 27.94% of Indonesia's population, or approximately 74.93 million people, and identify it as the largest user segment of digital financial and fintech services in the country. Yet this intensive use of digital financial products is not always matched by adequate knowledge of how to use them responsibly: the urban financial literacy index (70.89%) remains markedly higher than the rural index (59.60%) (OJK & BPS, 2025), underlining persistent disparities even within this digitally active generation. Parallel to this literacy gap, the use of digital payment instruments has grown rapidly and increasingly shapes Generation Z's consumption patterns. Bank Indonesia (2025) reports that QRIS is the fastest-growing payment system, with transaction volume expanding 139.9% year-on-year and reaching 59.53 million users and 42.75 million merchants nationally; by mid-2025, QRIS users had reached 57 million, supported by more than 34 million merchants. A Jakpat (2025) survey further shows that e-wallets remain the most widely used digital payment method, used by 80% of respondents for daily transactions, followed by digital banking platforms (45%), with e-wallet top-ups, QRIS payments, and interbank transfers as the three most common activities. The convenience and speed offered by digital payment reduce the psychological friction that normally accompanies cash spending—a mechanism widely discussed in the literature as the pain of payment (Yahfi *et al.*, 2025). Recent international research reinforces this mechanism: in a large-scale study of 1,162 respondents, Faraz and Anjum (2025) introduced the construct of "Spendception" to describe how digital payment systems reduce the visibility and perceived psychological cost of spending, and found that this reduced spending resistance significantly increases impulse buying and consumer purchase behavior, with the effect further moderated by individual financial self-regulation.

Without a matching level of financial literacy, this reduced friction is thought to accelerate purchase decisions and heighten consumptive tendencies, defined as excessive, unplanned, and irrational buying driven more by want than by need (Sumartono, 2002, as cited in Fattah & Indriayu, 2018). Surabaya, Indonesia's second-largest metropolitan city, offers a particularly relevant setting to observe this dynamic given its large Generation Z population, high digital-payment penetration, and dense coverage of Kopi Kenangan outlets. Kopi Kenangan, one of Indonesia's pioneering digital new-retail food-and-beverage brands founded in 2017, integrates a complete digital payment ecosystem—QRIS, e-wallets (GoPay, OVO, ShopeePay, DANA), debit/credit cards, and bank transfer—together with a tiered loyalty program (Kenangan VIP, launched in January 2024) that rewards cumulative spending with regular cashback and exclusive benefits. Time-limited flash sales, algorithmically personalized offer notifications, and payment-specific cashback further intensify the potential for unplanned purchases, particularly among consumers with lower financial literacy. Although both financial literacy and digital payment usage have been linked to consumptive behavior in previous research, the empirical evidence remains notably inconsistent and, more importantly, has rarely been tested in a context that resembles the small-value, routine transactions examined here. On the financial-literacy side, Oktaviani *et al.* (2023) reported a significant negative effect explaining 61.5% of variance in Generation Z's consumptive behavior, and Mursita *et al.* (2024) as well as Sari *et al.* (2025) similarly found negative and significant effects; yet Sibuea *et al.* (2023) and Nurhaeni and Soleha (2023) found no significant effect at all. Closer to the present setting, Hariyani and Prasetyo (2024) found that financial literacy significantly curbs Generation Z's consumerist behavior on general e-commerce platforms, whereas e-wallet usage itself shows no significant effect—an asymmetry that mirrors, yet has not been tested for, the food-and-beverage context examined here. On the digital-payment side, Rahmawati *et al.* (2023) and Pujia *et al.* (2024) reported positive and significant effects on consumptive or spending behavior, whereas Sanggarwati *et al.* (2025) found digital payment usage had no significant effect on Generation Z's financial-management behavior, and Efriyanto and Anggun (2025) more recently confirmed a significant positive effect of both financial literacy and cashless payment on Generation Z's consumptive behavior in Jakarta, underscoring how findings continue to shift with sample and platform. Similarly, Elliyana *et al.* (2024) found financial literacy significantly shapes the consumptive behavior of Generation Z Paylater users on e-commerce platforms, while Korompis *et al.* (2024) and Ishlakhatus Sa'idah *et al.* (2025) emphasize that Generation Z's digital consumption patterns are additionally shaped by social, emotional, and social-media-driven factors that operate alongside—and sometimes override—financial knowledge. Beyond these conflicting directions, a closer reading shows that most of these studies were conducted on broad e-commerce marketplaces, general e-wallet or fintech adoption, or aggregate financial behavior involving discretionary, often higher-value purchases—settings that differ structurally from small, habitual, and gamified transactions such as daily coffee purchases supported by tiered loyalty rewards and time-limited promotions. Because low-value, repeat purchases may be evaluated by consumers

through a different psychological lens than large, planned expenditures, it remains unclear whether the same direction and strength of effect documented in prior studies would hold in this setting. To date, no study has examined this relationship within a single-platform, gamified food-and-beverage ecosystem. This study addresses that gap by testing the effect of financial literacy and digital payment usage on consumptive behavior specifically among Generation Z users of the Kopi Kenangan application in Surabaya. This tension raises a more specific question worth stating explicitly: why might individuals with stronger financial literacy still display consumptive tendencies, rather than being protected from them? Three theoretical mechanisms offer plausible explanations. First, financially literate individuals tend to engage more actively in mental accounting—the cognitive practice of categorizing money into separate budgets—which can inadvertently legitimize small, routine purchases such as daily coffee as an already-budgeted, “safe” expense rather than as overspending; recent evidence indeed shows that financial literacy’s effect on consumptive behavior operates largely through this mental-accounting mechanism rather than as a direct deterrent (Sukthankar *et al.*, 2026). Second, financial knowledge can foster financial confidence that borders on overconfidence, whereby individuals who feel competent in managing their finances become more willing to relax restraint on modest, “affordable” purchases; literacy can complement rational budgeting but does not eliminate, and may even interact with, such confidence-related biases (Baker *et al.*, 2019; Hoffmann & Anwar, 2024). Third, on gamified food-and-beverage platforms specifically, promotional stimuli such as time-limited flash sales and tiered loyalty cashback may exploit present-bias and reward-seeking tendencies well documented among digitally native Generation Z consumers, potentially overriding the protective effect of financial knowledge (Korompis *et al.*, 2024; Ishlakhatu Sa’idah *et al.*, 2025). Taken together, these mechanisms suggest that the relationship between financial literacy and consumptive behavior in small-value, gamified digital transactions may be considerably more complex than a simple deterrent effect, which motivates this study’s direct empirical test in the Kopi Kenangan context. Building on this identified gap, the study is expected to contribute both theoretically, by enriching the literature on Generation Z’s consumptive behavior through a financial-literacy and digital-payment lens within an underexamined F&B transaction context, and practically, by informing efforts to strengthen young consumers’ financial literacy and to encourage more responsible use of digital payment technology among local food-and-beverage platforms.

2 | BACKGROUND THEORY

2.1 Financial Literacy

Financial literacy refers to an individual’s basic knowledge of financial management, encompassing how a person plans income and expenditure (Dikria, as cited in Mintarti, 2016). Beyond knowledge, Fadila *et al.* (2022) emphasize that financial literacy also involves the skills and confidence required to make sound financial decisions in pursuit of financial well-being—a dimension that matters because knowledgeable individuals who lack confidence in decision-making still struggle to manage their finances effectively. Marginingsih (2021) and the Financial Services Authority (OJK) similarly frame financial literacy as the ability to manage personal financial resources wisely to support future well-being, while Remund (as cited in Tribuana, 2020) and the OECD’s PISA framework (as cited in Tribuana, 2020) stress that financial literacy underlies sound decision-making across life stages, from managing childhood pocket money to planning retirement savings. In this study, financial literacy is defined as an individual’s ability to understand, manage, and make wise and rational financial decisions. The construct was measured using indicators adapted from Herdinata and Pranaatasari (2020)—basic financial knowledge, savings management, insurance awareness, and investment knowledge—with the empirical instrument specifically operationalizing general personal-finance knowledge and savings behavior.

2.2 Digital Payment Usage

Digital payment refers to internet-based, non-cash payment instruments—software, networks, and virtual accounts—that enable secure, practical, and fast electronic transactions without requiring face-to-face interaction with the seller (Naufalia, 2022; Solehah, 2024). Its core components include money-transfer applications, networks, regulations, and usage guidelines (Agustin & Abidin, 2022). Common forms used in Indonesia include e-wallets (ShopeePay, OVO, DANA, LinkAja), e-money, QRIS, debit cards, and bank transfer (Hayati *et al.*, 2023). This shift toward digital payment sits within a broader, rapidly growing body of international research on digital consumer behavior, defined as the process by which consumers research, purchase, and use products and services across internet, mobile, and social-media channels (Sağkaya Güngör & Ozansoy Çadırcı, 2022); their synthesis of 74 empirical studies identifies convenience, personalization, and reduced transaction friction as recurring drivers of digital purchasing, consistent with the mechanisms examined in this study. In this study, digital payment usage is defined as consumer behavior in utilizing technology-based payment methods to transact on the Kopi Kenangan application, measured using indicators adapted from Andriani *et al.* (2023): perceived ease of use, perceived usefulness, perceived credibility, social influence, and behavioral intention.

2.3 Consumptive Behavior

Consumptive behavior is commonly defined as the purchase of goods or services in excess of genuine need, driven primarily by desire and impulsive urges rather than rational consideration (Kotler & Keller, 2016; Sumartono, 2002, as cited in Fattah & Indriayu, 2018). Triyaningsih (2011, as cited in Abdullah *et al.*, 2022) and Anggraini and Santhoso (2019) further characterize it as unlimited consumption in which want consistently outweighs need. Internal drivers include the psychological desire for appreciation and emotional satisfaction, while external drivers include social environment, media exposure, ease of access to digital platforms, and marketing strategy (Sumartono, 2002, as cited in Fattah & Indriayu, 2018); low financial literacy and easy access to digital payment are both cited as contributing factors (Abdullah *et al.*, 2022; Nur & Malihah, 2023). In the present study, consumptive behavior is defined as the tendency of Kopi Kenangan application users in Surabaya to purchase coffee products excessively, without planning, and under the influence of impulsive urges, easy digital access, and promotional strategies. It was measured using indicators adapted from Rizcha and Rijali (2024): impulsive buying, non-rational buying, and wasteful buying.

2.4 Prior Research and Hypothesis Development

Several prior studies inform the hypotheses tested in this research. Oktaviani *et al.* (2023) found that financial literacy significantly affects Generation Z's consumptive behavior, explaining 61.5% of its variance among university students, while Mursita *et al.* (2024) and Sari *et al.* (2025) similarly reported a negative and significant effect of financial literacy on consumptive behavior among Generation Z in Jakarta and among university students, respectively—consistent with the theoretical expectation that higher financial literacy strengthens rational evaluation of purchase decisions and curbs impulsive spending. On the digital payment side, Rahmawati *et al.* (2023) and Pujia *et al.* (2024) found that electronic-money and digital-payment usage positively and significantly affects consumptive behavior, a pattern explained by the pain-of-payment mechanism, whereby the psychological barrier normally associated with cash spending is diminished under digital payment, thereby encouraging more frequent and higher-value transactions (Nur & Malihah, 2023; Sari *et al.*, 2025). At the same time, an emerging strand of behavioral-finance literature suggests that the inverse relationship between financial literacy and consumptive behavior is not universal, particularly for small-value, high-frequency digital transactions. Mental accounting theory (Thaler, 1999) posits that individuals mentally partition money into separate, non-fungible budget categories rather than treating it as a single fungible pool; financially literate consumers, precisely because they are more adept at this categorization, may deliberately earmark a discretionary or lifestyle account for small, recurring purchases such as daily coffee, which paradoxically legitimizes—rather than restrains—frequent spending within that self-imposed category.

This mechanism is reinforced by evidence that financial literacy can be accompanied by literacy-linked overconfidence, whereby individuals who consider themselves financially knowledgeable tend to overestimate their capacity to absorb the consequences of everyday spending decisions, which can paradoxically amplify rather than curb certain spending behaviors (Baker *et al.*, 2019). Directly relevant to the present context, Sukthankar *et al.* (2026) empirically demonstrated that financial literacy exerts no significant direct effect on consumptive behavior but instead operates through full mediation by mental accounting, meaning that financially literate individuals translate their knowledge into structured spending categories that can, in practice, license rather than suppress routine consumption. Because digital payment features on food-and-beverage platforms such as Kopi Kenangan involve low per-transaction stakes and high purchase frequency, financially literate Generation Z consumers may rationally—rather than irrationally—judge each individual purchase as immaterial to their overall financial position, thereby weakening or even reversing the restraining effect that financial literacy is conventionally assumed to exert on consumptive behavior. Building on this body of theoretical and empirical evidence, the following hypotheses are proposed:

H1: Financial literacy has a negative and significant effect on consumptive behavior.

H2: Digital payment usage has a positive and significant effect on consumptive behavior.

Accordingly, the conceptual framework of this study positions Financial Literacy (X1) and Digital Payment Usage (X2) as independent (exogenous) variables and Consumptive Behavior (Y) as the dependent (endogenous) variable, with both predictors hypothesized to influence consumptive behavior directly.

3 | METHOD

This study employs a quantitative approach with an explanatory research design, aimed at testing the causal relationships among financial literacy, digital payment usage, and consumptive behavior (Sugiyono, 2023; Creswell, 2018). Data were analyzed using Structural Equation Modeling based on Partial Least Squares (PLS-SEM) with the aid of

SmartPLS 4. PLS-SEM was chosen over covariance-based SEM (CB-SEM) and conventional multiple regression for three main reasons. First, this study is prediction-oriented and exploratory rather than strictly confirmatory—it examines a moderately developed nomological network linking financial literacy and digital payment usage to consumptive behavior—a purpose for which PLS-SEM is the recommended estimator, whereas CB-SEM is better suited to confirming an already well-established theoretical model (Hair *et al.*, 2019). Second, PLS-SEM does not require the data to meet strict multivariate-normality assumptions and performs reliably with the relatively small to moderate sample size used in this study. Third, unlike multiple regression, which tests direct relationships between observed variables one at a time and cannot separate measurement error from the structural estimates, PLS-SEM simultaneously estimates multiple reflective constructs and structural paths within a single model while explicitly accounting for measurement error, thereby producing more accurate path coefficients (Hair *et al.*, 2022). The population comprises Generation Z consumers domiciled in Surabaya who have used the Kopi Kenangan application and completed at least one transaction through it. Because the exact population size is unknown, the sample size was determined following Hair *et al.*'s (2019) guideline of multiplying the number of indicators in the original research instrument by 5–10. The instrument originally comprised 20 indicators in total (4 for Financial Literacy, 10 for Digital Payment Usage, and 6 for Consumptive Behavior; see Table 1), so the minimum sample size was set at the lower bound of $20 \times 5 = 100$ respondents. Respondents were obtained through non-probability purposive sampling based on the following criteria: (1) belonging to Generation Z; (2) domiciled in Surabaya; (3) having used the Kopi Kenangan application at least once within the past three months; and (4) having made a digital payment transaction (e-wallet, QRIS, bank transfer, debit, or credit card) through the application. Primary data were collected through a structured online questionnaire distributed via Google Form on social media, measured on a five-point Likert scale ranging from 1 (strongly disagree) to 5 (strongly agree). Secondary data were obtained from prior journal articles, theses, and the official Kopi Kenangan website. The operational definitions and measurement indicators of each variable are summarized in Table 1.

Table 1. Operational definition and measurement of variables

Variable	Indicator	Source
Financial Literacy (X1)	General personal-finance knowledge, Savings (4 items)	Herdinata & Pranaatasari (2020)
Digital Payment Usage (X2)	Perceived Ease of Use, Perceived Usefulness, Perceived Credibility, Social Influence, Behavioral Intention (10 items)	Andriani <i>et al.</i> (2023)
Consumptive Behavior (Y)	Impulsive Buying, Non-Rational Buying, Wasteful Buying (6 items)	Rizcha & Rijali (2024)

Prior to the main analysis, instrument validity was assessed using Pearson product-moment correlation, with an item considered valid when r -count exceeds r -table at the 5% significance level, and reliability was assessed using Cronbach's Alpha, with an instrument considered reliable when $\alpha > 0.60$ (Ghozali, 2021). Data analysis followed the standard PLS-SEM procedure, comprising evaluation of the measurement model (outer model) and the structural model (inner model). Because all constructs in this study are reflective, the outer model was evaluated through convergent validity (outer loading and Average Variance Extracted/AVE), construct reliability (Cronbach's Alpha and Composite Reliability), and discriminant validity (Fornell-Larcker criterion and cross loading). Convergent validity is considered adequate when AVE exceeds 0.50, while indicators with an outer loading below 0.40 are eliminated and those between 0.40 and 0.70 are retained if their removal does not materially improve AVE or construct reliability (Hair *et al.*, 2022). The inner model was evaluated through collinearity assessment (Variance Inflation Factor, $VIF < 3.3$ –5), the coefficient of determination (R^2 and adjusted R^2), and path coefficients, with significance tested through the bootstrapping procedure using 5,000 resamples; a hypothesis is supported when the t -statistic exceeds 1.96 and the p -value is below 0.05 at the 5% significance level (Ghozali, 2021).

4 | RESULTS AND DISCUSSION

4.1 Results

4.1.1 Respondent Characteristics

Of the 100 respondents, the majority (46%) were aged 18–22 years, followed by those aged 23–28 years (33%) and 13–17 years (21%), indicating that most respondents belong to the digitally native, productive-age segment typical of Kopi Kenangan's customer base. All respondents (100%) were domiciled in Surabaya, consistent with the study's geographic scope. In terms of usage intensity, 62% of respondents used the Kopi Kenangan application more than three times per month, while 38% used it less frequently, suggesting that most respondents had sufficient experience with the application to provide an informed assessment of their consumption behavior and digital payment usage.

Table 2. Respondent characteristics

Category	Group	n	%
Age	13–17 years	21	21%
	18–22 years	46	46%
	23–28 years	33	33%
Domicile	Surabaya	100	100%
Usage frequency	> 3 times/month	62	62%
	< 3 times/month	38	38%

4.1.2 Measurement Model (Outer Model)

The measurement model comprises one exogenous variable (Financial Literacy, LK), a second exogenous variable (Digital Payment Usage, PPD), and one endogenous variable (Consumptive Behavior, PK), all measured through reflective indicators. Convergent validity was assessed through outer loading and Average Variance Extracted (AVE). Table 3 presents the final outer-loading results after eliminating indicators with loadings below the recommended threshold—LK.4 (Financial Literacy); PPD.1, PPD.2, PPD.4, PPD.9, and PPD.10 (Digital Payment Usage); and PK.1 (Consumptive Behavior)—following the standard PLS-SEM elimination procedure (Hair *et al.*, 2022), consistent with the practice adopted in comparable studies such as Restike *et al.* (2024) and Sanggarwati *et al.* (2025).

Table 3. Outer loading (final indicators)

Indicator	Financial Literacy (LK)	Digital Payment Usage (PPD)	Consumptive Behavior (PK)
LK.1	0.991	–	–
LK.2	0.991	–	–
LK.3	0.987	–	–
PPD.3	–	0.908	–
PPD.5	–	0.887	–
PPD.6	–	0.932	–
PPD.7	–	0.910	–
PPD.8	–	0.896	–
PK.2	–	–	0.900
PK.3	–	–	0.661

All retained indicators of Financial Literacy and Digital Payment Usage exceeded the ideal 0.70 threshold, most above 0.85, indicating strong convergent validity. On the Consumptive Behavior construct, PK.2 loaded strongly (0.900) while PK.3 (0.661) fell within the acceptable 0.40–0.70 tolerance range and was retained because the construct's overall AVE remained satisfactory. Discriminant validity at the indicator level was confirmed through cross loading: every indicator loaded most strongly on its own construct (LK.1–LK.3: 0.987–0.991; PPD indicators: 0.887–0.932; PK.2–PK.3: 0.900 and 0.661) rather than on either of the other two constructs, satisfying the criterion proposed by Hair *et al.* (2019). Table 4 reports construct reliability and AVE. Financial Literacy and Digital Payment Usage exhibited very high reliability (Cronbach's Alpha above 0.90; Composite Reliability rho_c above 0.95) and AVE well above the 0.50 threshold (0.979 and 0.822, respectively). The Consumptive Behavior construct, comprising only two retained indicators, showed a comparatively low Cronbach's Alpha (0.423) and rho_a (0.502)—a common pattern for constructs with few items, since Cronbach's Alpha is conservative for short scales—but its Composite Reliability (rho_c = 0.764) and AVE (0.624) both met the minimum criteria, so the construct was retained for structural-model testing (Hair *et al.*, 2019).

Table 4. Construct reliability and validity

Construct	Cronbach's Alpha	rho_a	rho_c	AVE
Financial Literacy (LK)	0.990	1.065	0.993	0.979
Consumptive Behavior (PK)	0.423	0.502	0.764	0.624
Digital Payment Usage (PPD)	0.951	1.184	0.959	0.822

Table 5 presents the latent-variable correlation matrix. Financial Literacy and Digital Payment Usage were weakly and negatively correlated ($r = -0.317$), while both showed weak positive correlations with Consumptive Behavior ($r = 0.200$ and $r = 0.168$, respectively)—directionally consistent with the structural-model results reported below.

Table 5. Latent variable correlations

Construct	LK	PPD	PK
LK	1.000	-0.317	0.200

PPD	-0.317	1.000	0.168
PK	0.200	0.168	1.000

4.1.3 Structural Model (Inner Model)

The coefficient of determination (R^2) for Consumptive Behavior was 0.100 (R^2 adjusted = 0.081), indicating that Financial Literacy and Digital Payment Usage jointly explain only about 10% of the variance in Generation Z's consumptive behavior toward Kopi Kenangan—below Chin's (1998) weak threshold (0.19) and far from the moderate (0.33) and strong (0.67) categories. The remaining 90% is attributable to factors outside the model, such as lifestyle, social-media influence, reference groups, personality, or promotional appeal.

Table 6. Coefficient of determination (R^2)

Endogenous construct	R^2	R^2 Adjusted
Consumptive Behavior (PK)	0.100	0.081

Note: Data processed with SmartPLS 4 (2026).

4.1.4 Hypothesis Testing

Hypothesis testing was conducted through the bootstrapping procedure with 5,000 resamples; a hypothesis is supported when the t-statistic exceeds 1.96 and the p-value is below 0.05.

Table 7. Path coefficients and hypothesis testing

Path	O	M	STDEV	t-statistic	p-value	Result
Financial Literacy → Consumptive Behavior	0.281	0.281	0.101	2.774	0.006	Significant
Digital Payment Usage → Consumptive Behavior	0.257	0.244	0.197	1.306	0.192	Not significant

Note: O = original sample; M = sample mean; STDEV = standard deviation. Data processed with SmartPLS 4 (Bootstrapping), 2026.

H1: Financial Literacy → Consumptive Behavior. The path coefficient was positive and statistically significant ($\beta = 0.281$; $t = 2.774$; $p = 0.006$). Because H1 hypothesized a negative effect and the observed effect is positive, H1 is not supported, even though the relationship itself is statistically significant. This positive direction can be explained through the mental-accounting mechanism (Thaler, 1999) and the confidence dimension embedded in financial literacy (Fadila *et al.*, 2022; Baker *et al.*, 2019): Generation Z respondents with better financial understanding appear to feel more confident in managing financial risk, and therefore mentally categorize small, routine coffee purchases into a discretionary spending account that they perceive as manageable and controlled (a form of mental accounting) rather than as wasteful behavior—a pattern consistent with Sukthankar *et al.* (2026), who found that financial literacy shapes consumptive behavior specifically through mental accounting rather than through a direct restraining effect, and a confidence that can, in turn, make them more comfortable transacting frequently and taking advantage of promotions and loyalty rewards. This finding is consistent with Pangestu and Karneli (2023) and Ahsahrah *et al.* (2023), who likewise found a positive and significant effect of financial literacy on Generation Z's consumptive behavior, but contrasts with Mursita *et al.* (2024) and Sari *et al.* (2025), who found a negative and significant effect.

This counter-hypothesized positive direction is not unique to the Indonesian context: Sarmiento (2024), anchored in Prospect Theory (Kahneman & Tversky, 1979), found a significant positive correlation between financial literacy and impulse buying behavior among Filipino college students, explicitly noting that more financially literate respondents felt more confident weighing present gains against future consequences and therefore purchased more impulsively rather than less; similarly, Qomariyah *et al.* (2022) found that financial literacy directly and positively affects impulsive buying behavior among Generation Z, reinforcing that this direction of effect recurs across different cultural and generational samples. The discrepancy is plausibly explained by differences in transaction scale and context: this study examines small-value, routine, and gamified digital transactions (coffee purchases with cashback and loyalty points), a setting in which financially literate consumers may be more skilled at exploiting available incentives rather than abstaining from consumption altogether. Theoretically, this result does not contradict Mental Accounting Theory (Thaler, 1999) but rather extends its boundary conditions: the theory predicts that money is partitioned into non-fungible mental budgets, and this study shows that when a "coffee" or "daily treats" account is created, financial literacy strengthens—rather than weakens—an individual's willingness to spend fully within that self-imposed category, because doing so is perceived as disciplined budgeting rather than overspending. H2: Digital Payment Usage → Consumptive Behavior. The path coefficient was positive but not statistically significant ($\beta = 0.257$; $t = 1.306$; $p = 0.192$), so H2 is not supported. This suggests that although the ease, usefulness, credibility, and social influence associated with digital payment point in the theoretically expected direction—consistent with the pain-of-payment mechanism (Yahfi *et al.*, 2025), whereby reduced psychological friction in non-cash spending should encourage consumption—the effect is not strong enough to stand on its own once other factors are absent from the model. This non-significant result is consistent with several prior Surabaya- and Generation-Z-focused studies, including Rizki and Prakoso (2024), who found that social media and e-wallet usage did not

significantly affect the consumptive behavior of university students in Surabaya, and Moehadi *et al.* (2023) and Aisyah *et al.* (2023), who reported similarly non-significant effects of perceived ease of use and e-wallet usage on consumptive and financial-management behavior. A plausible explanation is that Kopi Kenangan transactions are typically small in nominal value and already habitual for Generation Z digital natives in Surabaya, where exposure to QRIS and e-wallets is already very high; under such conditions, the psychological barrier that digital payment is theorized to remove may already be minimal regardless of payment method, consistent with the concept of hedonic adaptation in behavioral economics. This contrasts with Rahmawati *et al.* (2023), Pujia *et al.* (2024), and Sari *et al.* (2025), who found significant effects in contexts involving larger transaction values, such as e-commerce or paylater instruments. Theoretically, this non-significant result marks a boundary condition of the pain-of-payment framework: the mechanism assumes that removing payment friction meaningfully changes spending behavior, but when the underlying stimulus (a small, habitual purchase) already carries negligible psychological cost even in cash form, the marginal friction that digital payment removes has little additional room to operate—so the theory's predicted effect is attenuated not because the mechanism is wrong, but because this transaction context sits near the floor of the friction scale the theory presupposes—consistent with Faraz and Anjum (2025), whose international "Spendception" study of 1,162 respondents found that digital payment's spending-facilitation effect on impulse buying is strongest when transaction visibility and psychological cost are meaningfully reduced from a cash baseline, a condition only weakly met when the underlying purchase is already small and habitual.

4.2 Discussion

Taken together, these findings indicate that neither financial literacy nor digital payment usage is a strong standalone determinant of Generation Z's consumptive behavior toward small, routine food-and-beverage transactions, as reflected in the modest R^2 of 0.100 (R^2 adjusted = 0.081). Read through the lens of Mental Accounting Theory (Thaler, 1999)—the theoretical framework guiding this study—the two results are not contradictory but complementary. Financial literacy operates by shaping how a mental budget for small treats is categorized and thereby licensed, while digital payment convenience operates through the removal of psychological friction at the point of transaction, a mechanism that, per the pain-of-payment literature, presupposes a meaningful baseline level of friction to begin with. Because Kopi Kenangan purchases are low-value and highly habitual, the friction-removal channel has little room to operate, whereas the categorization channel captured by financial literacy remains active regardless of transaction size. This theoretical reading helps explain why one predictor reaches significance while the other does not, even though both are grounded in complementary strands of behavioral finance theory. The modest R^2 also warrants closer scrutiny of what lies outside the model: because financial literacy and digital payment usage jointly explain only about 10% of the variance, roughly 90% of Generation Z's consumptive behavior toward Kopi Kenangan is driven by factors this study did not measure. Lifestyle is the most theoretically and empirically plausible candidate. Anggraini and Santhoso (2019) found a significant positive relationship between hedonic lifestyle and consumptive behavior among adolescents, arguing that consumption increasingly functions as a marker of social identity and status rather than a response to financial knowledge or payment convenience alone.

Within the specific nexus of financial literacy, digital payment, and consumptive behavior examined here, lifestyle has repeatedly emerged as either a significant predictor or a significant moderator in closely related studies: Pujia *et al.* (2024) found that lifestyle significantly moderates the effect of financial literacy and digital payment usage on consumptive behavior among university students, Sanggarwati *et al.* (2025) identified lifestyle as a significant predictor of Generation Z's financial-management behavior alongside financial literacy and fintech digital payment, and Restike *et al.* (2024) similarly found lifestyle to significantly shape impulsive buying and Paylater usage among Generation Z. These findings converge on a mechanism distinct from the two variables tested here: while financial literacy shapes how spending is mentally categorized and digital payment shapes the friction of transacting, lifestyle operates through social comparison, aspirational identity, and exposure to peer and social-media consumption norms—channels that are largely independent of financial knowledge or payment technology and therefore plausibly account for a substantial share of the unexplained variance. This pattern suggests that a more complete model of Generation Z's consumptive behavior on gamified F&B platforms would benefit from incorporating lifestyle as a direct predictor or moderating variable, an avenue this study did not test but recommends explicitly for future research. Practically, these results imply that interventions aimed at moderating consumptive behavior in digital food-and-beverage ecosystems should look beyond financial knowledge and payment convenience alone. Complementary levers worth considering include budget-aware application design that visualizes cumulative monthly spending, contextualized financial-literacy education that explicitly addresses mental-accounting biases for small recurring purchases, and, in light of the omitted-variable analysis above, marketing and educational strategies that address lifestyle-driven and socially comparative consumption patterns rather than financial knowledge alone.

5 | CONCLUSIONS AND FUTURE WORK

This study examined the effect of financial literacy and digital payment usage on the consumptive behavior of Generation Z users of the Kopi Kenangan application in Surabaya, based on a sample of 100 respondents analyzed through PLS-SEM. Four main conclusions can be drawn. First, financial literacy has a positive and significant effect on consumptive behavior ($\beta = 0.281$; $t = 2.774$; $p = 0.006 < 0.05$), contrary to the negative effect originally hypothesized. Higher financial literacy among respondents was associated with a greater, not lower, tendency toward consumptive behavior, indicating that the financial confidence accompanying financial knowledge can encourage rather than restrain small, routine, digitally facilitated purchases such as coffee. Second, digital payment usage does not have a significant effect on consumptive behavior ($\beta = 0.257$; $t = 1.306$; $p = 0.192 > 0.05$). Although the coefficient remains positive, the ease, usefulness, credibility, and social influence associated with digital payment are not, by themselves, statistically strong enough to drive consumptive behavior, given the small transaction values and the highly habitual nature of digital payment among Surabaya's Generation Z. Third, the R^2 value of 0.100 (R^2 adjusted = 0.081) indicates that financial literacy and digital payment usage jointly explain only about 10% of the variation in consumptive behavior, a weak effect size by conventional standards (Chin, 1998). This low explanatory power makes clear that Generation Z's consumptive behavior toward Kopi Kenangan is not primarily driven by financial literacy and digital payment usage alone; rather, these two variables are only minor contributors within a much larger set of determinants. The remaining approximately 90% of the variation is attributable to factors outside this model, such as lifestyle, social-media influence, self-control, or promotional appeal, and the study's conclusions regarding H1 and H2 should therefore be interpreted as evidence of two specific, statistically identifiable pathways rather than as a complete account of what drives consumptive behavior in this population. Fourth, taken together, the findings indicate that greater financial literacy in the context of small-value, gamified digital transactions does not automatically curb Generation Z's consumptive behavior, while the convenience of digital payment alone has not been shown to be a primary determinant of consumptive behavior in this food-and-beverage platform context.

For Kopi Kenangan and similar platforms, a responsible marketing approach is recommended, especially since higher financial literacy was associated with increased consumptive behavior in this study. This could involve displaying an estimated monthly spending summary within the application (budget-aware nudging) to encourage healthier consumption patterns while maintaining transaction convenience. It is also crucial to continue ensuring the security and credibility of the digital payment system, which respondents already perceive favorably. However, this study has several limitations that should be considered when interpreting its findings. Firstly, the low R^2 (0.100) indicates that financial literacy and digital payment usage are only two of many potential determinants of consumptive behavior; the model does not account for factors such as lifestyle, self-control, social media influence, or other psychological and social factors that previous research suggests are relevant. Therefore, the results should not be viewed as a comprehensive explanation of Generation Z's consumptive behavior. Secondly, the sample was limited to 100 respondents selected through non-probability purposive sampling within a single city (Surabaya) and a single food-and-beverage platform (Kopi Kenangan), which constrains the statistical power of the model and limits the generalizability of the findings to other cities, platforms, or transaction contexts. Additionally, the data were collected through a cross-sectional, self-reported Likert-scale questionnaire, capturing perceptions at a single point in time and potentially subject to social desirability or common-method bias, rather than observed spending behavior. Furthermore, after indicator elimination during measurement-model evaluation, the Consumptive Behavior construct was retained with only two indicators and a Cronbach's Alpha below the conventional threshold, which, despite adequate composite reliability and AVE, may still understate the construct's full conceptual breadth. In light of these limitations, future researchers are encouraged to incorporate additional predictors with strong theoretical and empirical support, particularly lifestyle, self-control, and electronic word-of-mouth, either as direct predictors or as moderating variables, to enhance the model's explanatory power beyond the current R^2 of 0.100. They should also employ probability-based sampling with a larger and more geographically diverse sample and extend the scope to multiple food-and-beverage or e-commerce platforms to strengthen external validity and generalizability. Moreover, considering longitudinal or mixed-methods designs that combine self-reported measures with actual transaction data would help reduce common-method bias and better capture how consumptive behavior evolves over time. Lastly, expanding and refining the indicator set for the Consumptive Behavior construct could improve its internal-consistency reliability while preserving the impulsive-buying, non-rational-buying, and wasteful-buying dimensions established in this study.

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