

**Buy Now, Pain Less:**  
**The Impact of Adding a Financing Option to Affordable Purchases**

Y. Rin Yoon and Suzanne B. Shu  
S.C. Johnson School of Business, Cornell University

*This version: March 2024*

***Please do not share without permission***

Y. Rin Yoon (yy878@cornell.edu) is a Ph.D. candidate in marketing at the SC Johnson College of Business at Cornell University, Sage Hall, 114 E Ave, Ithaca, NY 14853. Suzanne B. Shu (sbs78@cornell.edu) is the John S. Dyson Professor of Marketing at Dyson School of Applied Economics and Management within the SC Johnson College of Business at Cornell University. Corresponding author: Y. Rin Yoon.

## **ABSTRACT**

With the rise of Buy Now, Pay Later financing, consumers are increasingly encountering financing options for purchases traditionally paid for in full. This research investigates how merely displaying a financing option influences consumers intending on paying outright. A series of controlled shopping simulations shows that the presence (vs. absence) of financing, even when not used, increases subjective wealth perceptions which increases purchase completion intentions. This is because when financing options are available, the preference to pay outright is seen as a sign of higher social status, elevating subjective status of consumers who prefer such payment. This effect attenuates among consumers who already perceive themselves as having high social status or in contexts where the association between financing and lower status is less pronounced. By identifying how the mere presence of financing affects consumers uninterested in using it, we advance theory and practice on payment methods, subjective wealth, and cart abandonment.

*Keywords:* payment method, subjective wealth, pain of paying, inference making, purchase conversion

"Annual income twenty pounds, annual expenditure nineteen six, result happiness.

Annual income twenty pounds, annual expenditure twenty pound ought and six, result misery."

- *Charles Dickens, "David Copperfield"*

The quote above from Charles Dickens' "David Copperfield" highlights a fundamental consumer belief: outright affordable purchases are favored over overspending and incurring debt. Nevertheless, retailers frequently offer financing options to attract consumers who may only have 'twenty pounds' but desire a purchase that costs 'twenty pound ought and six.' Such point-of-sale financing options include layaways (PYMNTS 2018), loans (Jansen et al. 2023), rent-to-own contracts (Zikmund-Fisher and Parker 1999), and the increasingly popular "Buy Now, Pay Later" (BNPL) services (Consumer Financial Protection Bureau 2022). Although consumers frequently encounter these financing options, little is known about whether and how their presence impacts the 'annual income twenty pounds, annual expenditure nineteen six' type of consumers—those who can comfortably afford outright purchases without the need for financing.

The importance of this question is escalating, particularly due to the rapid expansion of BNPL financing, which offers consumers an option to finance purchases at the point of sale using interest-free installments that are typically spread over four bi-weekly payments (Consumer Financial Protection Bureau 2023). This broadens the scope of financing from traditional big-ticket purchases to smaller, everyday purchases like groceries, apparel, and cosmetics—items usually purchased in full (Di Maggio, Williams, and Katz 2022; Consumer Financial Protection Bureau 2022). While BNPL's market presence is growing fast, with total loans approaching \$25 billion in 2022, the fact that the average BNPL transaction size is only \$135 in the same year suggests that consumers are frequently offered financing options for purchases that are usually affordable with one-time payments (Consumer Financial Protection

Bureau 2022). Our own survey data suggests that most consumers have encountered BNPL financing while shopping and opted for a full payment nonetheless, for a modest average order amount of \$165.64 (not very different from the average BNPL transaction size; Consumer Financial Protection Bureau Consumer Financial Protection Bureau 2022), indicating that it is common for consumers to choose to pay outright even after seeing an option to finance (81%; web appendix, pilot survey).

In this research, we suggest that the mere availability of financing can increase purchase completion intentions among consumers who intend on paying in full. We propose that the salience of available financing leads consumers to associate their own ability to pay outright with a higher financial status, subsequently increasing their subjective wealth perceptions and, in turn, increasing their intention to complete the purchase. This account builds on previous work demonstrating that specific payment methods, such as cash and credit, come with distinctive lay beliefs and associations (Chatterjee and Rose 2012; Wong and Lynn 2020), and elicit varying levels of pain of paying as well as different judgments and attitudes (Feinberg 1986; McCall and Belmont 1996; Shah et al. 2015; Soster et al. 2014). The presence of financing might carry an implicit association with low financial status consumers, comparatively elevating the perceived financial status of consumers who opt for outright payment. Thus, while much of the literature on subjective wealth has focused on social (e.g., a neighbor's income) or internal (e.g., my ideal future income) reference points as key determinants of subjective wealth perceptions (Joo and Grable 2004; Liang and Fairchild 1979; Greenberg 2013; Tully and Sharma 2022), we explore and provide evidence for a novel determinant of subjective wealth perceptions: the availability of payment methods.

Overall, we propose and demonstrate that introducing a financing option achieves more than its primary purpose of aiding consumers who cannot afford a purchase (Consumer Financial Protection Bureau 2023); it can also increase purchase completion intention among those who intend on paying in full. This research examines how the presence of financing affects consumers who do not intend on using it, offering managers practical strategies for implementing these services into their stores to improve purchase conversions. We first present our theoretical framework, predictions, and empirics before discussing contributions to the research on subjective wealth, pain of paying, and cart abandonment, as well as key recommendations for marketers.

## **THEORETICAL FRAMEWORK**

### **Subjective Wealth as a Key to Increase Purchase Conversion**

Across industries, about 70% of items placed in online carts get abandoned and never see the light of purchase completion (Baymard 2024). Although consumers select items based on their desirability and affordability before carting them (Bleier and Eisenbeiss 2015; Li and Chatterjee 2005), reevaluating the cost at the checkout can reduce perceived affordability and deter consumers from completing the purchase (Huang et al. 2018; Kukar-Kinney and Close 2010; Sondhi 2017). To counter this, e-commerce firms often implement coupons, promos, and discounts at checkout (Lam et al. 2001; Oliver and Shor 2003; Xie et al. 2006). Similar practices are seen in physical retail settings in an effort to reduce customer dropout before purchase completion. Salespeople use closing techniques such as the “assumptive close” (acting as if the

customer has already decided to purchase) or the “urgency close” (suggesting the product might not be available later) to secure customers’ commitment to purchase (Hopkins 1998), along with various other strategies including requiring non-refundable deposits and offering layaway plans.

Subjective wealth<sup>1</sup>, which we operationalize as consumers' perceived financial ease or comfort when contemplating the affordability of a purchase (Gasiorowska 2014), may be crucial in increasing purchase conversion through increasing the perceived affordability of considered purchases. It is inversely related to how painful it would be to make the purchase (i.e., subjective affordability assessed by measuring the pain of paying; Morewedge, Holtzman, and Epley 2007), and proportionally predicts spending (De La Rosa and Tully 2022; Karlsson et al. 2005). Building on the subjective wealth literature and models of multi-stage purchase process (Lam et al. 2001; Li and Chatterjee 2005; Xie et al. 2006), increasing subjective wealth at checkout may be especially important in increasing purchase completion intention.

What shapes subjective wealth perceptions? Because consumers evaluate money gains and losses on a relative basis (Buechel and Morewedge 2014; Kahneman and Miller 1986), subjective wealth perceptions shift on various situational reference points. For example, consumers may compare their financial situation to a better off peer (Liang and Fairchild 1979; Sharma and Alter 2012), an ideal financial state in their mind (e.g., one’s ideal income; Tully et al. 2015), or social norms (Miller and Prentice 1996). Of note, these reference points for subjective wealth studied in the literature focus extensively on explicit and direct reference points, such as comparisons between different levels of income or amounts of debt (Clark and Oswald 1996; Davis and Helmick 1985; Tully and Sharma 2022).

---

<sup>1</sup> Following Tully and Sharma (2022), we use the term 'subjective wealth' for assessing one’s financial resources, rather than terms like 'financial slack' (Zauberman and Lynch 2005) or 'financial satisfaction' (Joo and Grable 2004).

## Payment Method as a Subjective Wealth Cue

On the other hand, self-perception theory provides yet another route to shape subjective wealth assessments. Self-perception theory suggests that consumers form inferences from observations of their own behavior (Bem 1972), meaning that consumers may evaluate their subjective wealth by making inferences about what and how they choose to buy. For instance, recent work shows that subjective wealth perceptions can form as a function of spending levels (Kappes, Gladstone, and Hershfield 2021).

Critically, deliberation over significant spending or the necessity for financing can prompt reevaluation of one's wealth. To quote from Morewedge and colleagues (2007, 466), “people are unlikely to think spontaneously of their total net worth when buying a candy bar but are considerably more likely to do so when buying a new car.” Specifically, considering which account to make a payment from influences subjective wealth perceptions and spending decisions (Morewedge et al. 2007). For example, the choice between paying with cash or credit affects spending because each method elicits different levels of pain of paying, even for the same amount (Shah et al. 2015; Soster et al. 2014; Thomas et al. 2011), suggesting how different payment methods may shape subjective wealth perceptions differently.

While prior research comparing the effects of payment methods on the pain of paying has predominantly focused on cash versus card differences (Chatterjee and Rose 2012; Feinberg 1986; Hirschman 1979; Park, Lee, and Thomas 2021; Prelec and Simester 2001; McCall and Belmont 1996; Raghurir and Srivastava 2008; Soman 2001, 2003; Srivastava and Raghurir 2002; Thomas et al. 2011; Wong and Lynn 2020), few studies provide evidence that different types of payment method can also uniquely affect judgments and attitudes. For example, Olson

et al. (2016) found that ethical consumption is perceived more negatively when purchases are made with SNAP EBT cards, because of welfare benefits being considered less deserved. Sharma, Tully, and Cryder (2021) demonstrated that loans elicit less psychological ownership over borrowed money than credit, as loan (vs. credit) is more conceptually associated with the lender. Additionally, Polman, Effron, and Thomas (2018) noted that purchasing power appears diminished when spending involves other people's (vs. one's own) money as function of others' psychological distance from the self.

Building on these findings, we propose that there is a perceived rank ordering among payment methods, each distinguished by the financial status of its typical users. For instance, welfare benefits (vs. earned income) are more associated with low financial status (US Department of Health and Human Services 2024). Similarly, funds that are perceived as more external to self, such as loans (vs. credit) and others' (vs. one's own) money, might similarly map on lower status as they more strongly necessitate borrowing from others. In sum, we propose that payment methods may act as cues to a financial standing. Of primary interest in this research is whether there exists a perceived rank ordering between one-time payments and financing; when a consumer who intends on making a one-time payment is presented with an option to finance the same purchase, this option may serve as a downward comparand, relatively elevating one-time payments in this rank ordering among payment methods. We further elaborate on this proposition in the following section.

The Availability of Financing Increases Subjective Wealth of Outright Payers



Financing, as a payment method, is typically employed to ease the financial burden for those unable to afford outright purchases. Due to its inherent purpose, financing is commonly associated with big-ticket purchases beyond one's budget, and consumers often, albeit mistakenly, believe that opting for financing such as monthly installments will relieve them from feelings of financial constraint (Katz, Kan, and Sussman 2021). Consequently, a significant body of work has focused on psychological processes contingent on decision to finance (Bernthal, Crockett, and Rose 2005; Kim and DeVaney 2001; Ranyard et al. 2006; Soman, Cheema, and Chan 2012; Tully and Sharma 2018; Sharma et al. 2021).

But how might having an option to finance affect those who are uninterested in doing so? We theorize that financing as a payment method is naturally associated with low financial status, and consumers who want to pay outright will upwardly reassess their subjective wealth in relation to this status. Our prediction builds on how financing is generally associated with unaffordable purchases and low financial status consumers who cannot afford a one-time payment, and prior findings that repeated exposure to a payment method forms a lay belief of the payment method (Chatterjee and Rose 2012; Wong and Lynn 2020).

Support for this prediction also comes from recent research on BNPL financing. For rational, economically-minded consumers uninterested in financing their purchases, the availability of BNPL should not alter their intent to purchase. Alternatively, financing options might make a one-time payment feel more burdensome by comparison, potentially decreasing purchase completion intentions. Yet, findings by Di Maggio, Williams, and Katz (2022) indicate that the experience of using BNPL leads to an increase in other outright spending. They found that at the time of first BNPL use, shoppers' spending across all categories increased by \$130 on average and remained elevated over the next 24 weeks, with a weekly total spending increase

around \$60. Importantly, this increase was concentrated almost entirely in non-BNPL spending. This impact of BNPL use on outright purchases could possibly stem from the liquidity gained from using BNPL financing, which would expand the mental budget for additional spending (Hines and Thaler 1995), but we propose a different theory. We predict that the mere availability of financing options can increase purchase decisions of those initially inclined towards one-time payments irrespective of past BNPL usage. That is, we hypothesize that:

**H1:** When consumers intend to pay in full, the availability of financing at checkout will increase consumers' intention to complete a one-time payment.

**H2:** Subjective wealth perceptions will mediate the effect of the availability of financing on one-time purchase completion intention.

We emphasize that this and the following hypotheses apply primarily to situations in which consumers decide on their payment method prior to determining whether to make a purchase. This decision sequence is particularly common in scenarios where consumers initially consider affordability based on one-time payments, especially for items traditionally bought outright. In such cases, the choice of payment method precedes the final purchase decision, underscoring the significance of payment options in the consumer purchase decision process.

### Role of Subjective Social Status

We also posit that the effect of financing on subjective wealth occurs via shifting subjective social status. Subjective wealth is closely related to subjective social status, as social status indicates varying levels of perceived accessibility to resources, with resource-scarce individuals at the bottom and resource-affluent individuals at the top of the social hierarchy

(Kraus, Piff, and Keltner 2011). Under this notion of hierarchical accessibility to resources, individuals with lower subjective social status perceive themselves closer to society's lowest and most disadvantaged ranks, whereas those with higher subjective social status perceive themselves as enjoying the privileges of higher, more advantaged ranks (Adler et al. 2000; Kraus et al. 2011).

Just as consumers infer social status from various shopping-related cues such as loyalty program tiers (Dreze and Nunez 2009), store density (O'Guinn, Tanner, and Maeng 2015), and brand labels (Nelissen and Meijers 2011), the choice of payment method may also affect perceived social status. A consumer who chooses a one-time payment despite the availability of installment plans may view their payment method choice as indicative of their high social status, since they possess abundant financial resources that renders financing unnecessary (Dubois and Ordabayeva 2015). Such a shift in subjective social status can increase subjective wealth—consumers' perceived financial ease or comfort when contemplating a purchase—thereby increasing purchase completion intention. In sum, our account proposes subjective social status as the underlying mechanism.

**H3:** Subjective social status will mediate the effect of the availability of financing on subjective wealth perceptions.

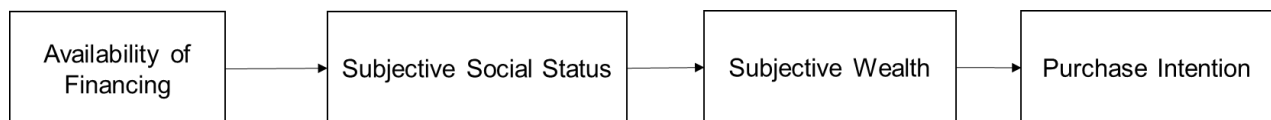
Consistently, a consumer's predisposed level of subjective social status may affect how strongly the mere presence of financing influences their perceived social status. Individuals who view themselves as low in social status often interpret environmental cues such as prestige products (Rucker and Galinsky 2008), spending levels (Garvey, Blanchard, and Winterich 2017), and even everyday brands (Whelan and Hingston 2018) with respect to status. In contrast, those satisfied with their status are less attuned to such cues, as their sense of self-satisfaction reduces

the need to seek external validation (Custers and Aarts 2005; Kim and Gal 2014). Building on these findings, individuals predisposed with high subjective social status should be less likely to view financing options as a status cue, and consequently, less influenced by their presence. For example, consumers feeling satisfied with their subjective social status upon seeing themselves as better off than others may be less affected by the presence of financing when considering an outright purchase. Similarly, we predict that weakening the association between financing and low social status will also mitigate the impact of the presence of financing, such that when financing is viewed less as a necessity but instead as a personally preferred financial choice, its presence will be less likely to serve as a status cue.

Integrating the previous arguments, figure 1 shows our conceptual framework. In essence, we propose that seeing available financing elevates subjective social status, which in turn increases subjective wealth perceptions and purchase completion intentions. Furthermore, we posit that having high subjective social status, or disrupting the association between financing and low social status, could moderate this effect.

**FIGURE 1**

**THE CONCEPTUAL FRAMEWORK.**



**RESEARCH OVERVIEW**

Six experiments (N = 3,075) and one supplemental study in the Web Appendix tested our predictions. Studies 1A and 1B examine whether the mere presence of financing in an online

shopping environment increases subjective wealth and purchase completion intention ( $H_{1,2}$ ). Study 2 replicates this in an in-person shopping scenario using the mere presence of a loan ( $H_{1,2}$ ). Studies 3-5 replicate the focal effect and shed light on the proposed mechanism ( $H_3$ ). In particular, study 3 measures subjective social status as a mediator, and study 4 uses the moderation-of-process approach to test the underlying mechanism by directly manipulating subjective social status. Study 5 weakens the link between financing and low social status to see if the effect attenuates. We focused primarily on single-item purchases priced between \$100 and \$200 to test our predictions. This focus enabled a realistic test of our theorizing as this price range is generally considered affordable with a one-time payment (web appendix, pilot survey) yet high enough to trigger purchase hesitation (Consumer Financial Protection Bureau 2022). Furthermore, using a single-item purchase setting allows us to hold the quantity and variety of carted products constant. However, we confirm that the effect persists for big-ticket purchases such as a car (study 2), as long as consumers intend to make a one-time purchase.

Data, analysis code, materials, and pre-registrations for the studies reported in this manuscript are available at

[https://osf.io/g9zbm/?view\\_only=345894f978d04f16b12c0e648045275f](https://osf.io/g9zbm/?view_only=345894f978d04f16b12c0e648045275f).

## **STUDY 1A-1B: ONLINE SHOPPING SIMULATION**

In studies 1A and 1B, we created a simulated online shopping environment to investigate how the presence (vs. absence) of a financing service (i.e., BNPL or monthly installments) affects the likelihood of purchase completion as well as perceived subjective wealth for covering the purchase. We predicted that the availability of financing would increase purchase completion

likelihood by increasing subjective wealth. We test this prediction across two different shopping scenarios: purchasing an athleisure item in presence of BNPL financing (study 1A) and earphones in presence of a 6-month installment plan (study 1B).

### Study 1A: Shopping Online for Athleisure Items in Presence of BNPL

Study 1A explored the effect of the presence of financing on cart abandonment intentions among consumers planning to make a one-time payment. We created a simulated online shopping environment where participants viewed products, added an item to their cart, and imagined going to a checkout page to make a one-time payment. The shopping page featured three products, with prices that slightly varied but all within a small-ticket range of \$98-108.

To manipulate the presence (vs. absence) of financing, we displayed a "pay-in-four" BNPL payment option (i.e., splitting the total cost of the purchase into four equal bi-weekly payments) on the cart page, reflecting the most prevalent market practice (Consumer Financial Protection Bureau 2022). We predicted that the presence (vs. absence) of BNPL would reduce the cart abandonment likelihood, with an increase in subjective wealth perceptions mediating this effect.

In addition, we explored an alternative explanation centered on the perceived value of the carted item. The presence of financing might imply that the item is desirable even to consumers who cannot afford it, thereby increasing its perceived desirability, liking of the brand, or brand recognition. We also examined whether the presence of financing might influence consumers to favor financing over a full payment, to check for the possibility that participants' responses about

cart abandonment likelihood reflect an intention to abandon the cart only to repurchase the item using BNPL financing.

## Method

We pre-registered this study ([aspredicted.org/ JLC\\_SZQ](https://aspredicted.org/JLC_SZQ)) and recruited 240 participants from Amazon Mechanical Turk. As pre-registered, we excluded people who reported less than \$10,000 annual household income ( $n = 5$ ) to ensure we are recruiting participants who can realistically consider making a one-time payment for the product we use as our stimuli, leaving 235 participants ( $M_{\text{age}} = 36.45$ ,  $SD = 13.34$ ; 121 men). Including these individuals did not significantly change our results.

We randomly assigned participants to one of two conditions (financing: present vs. absent) in a between-subjects design. All participants imagined themselves shopping at a luxury athleisure brand, with the intention to buy an item and pay for it today. They read that they are considering buying one of three items that caught their interest: a mat bag, a beanie, or a pair of sports slides. A simulated shopping webpage allowed participants to browse among the three products. The prices varied slightly, with the mat bag priced at \$108 and the others at \$98, reflecting the actual market prices of these products. Participants chose one item of their choice to their cart, proceeding as if they were making an actual purchase at the brand's website and intending to pay for it on the same day.

Upon selecting an item, participants were directed to their cart, where they were reminded that the item in the cart was what they intended to order and pay for that day. They had the option to return to the shopping page to change their product choice if desired. In the

presence condition, BNPL information appeared under the full price that read, “4 installments of \$[a quarter of the full price]; Shop now, pay in 4, interest-free,” mirroring the phrasing commonly used in the market (Afterpay 2024; Klarna 2024). For those in the absence condition, only the full price was shown. Participants then clicked the “go to checkout” button, after which we instructed participants to imagine proceeding to a checkout page to complete the purchase with a one-time payment for their chosen item.

Participants indicated their cart abandonment intentions using a 4-item scale (e.g., “How likely are you to leave this item in your online shopping cart without buying it,” “How likely are you to keep this item in the shopping cart but do not buy it during the same Internet session”; 1 = extremely unlikely, 7 = extremely likely; adapted from Sondhi 2017;  $\alpha = .94$ ). We then assessed their subjective wealth perceptions by asking, “How painful would you feel to actually spend this amount of your money right now?” (1 = not at all painful, 7 = extremely painful; reverse-coded) and “How do you feel about your financial flexibility to make a one-time payment for this item?” (1 = extremely inflexible, 7 = extremely flexible) ( $r = .55$ )<sup>2</sup>.

Afterwards, to test the alternative account based on the perceived value of the carted item, we asked participants to rate the desirability of the carted product (1 = undesirable, 7 = desirable), brand recognition (1 = extremely unfamiliar, 7 = extremely familiar), and liking of the brand (1 = not at all, 7 = a great deal). To check for the possibility that participants’ responses about cart abandonment likelihood reflect an intention to abandon the cart only to repurchase the item using BNPL, we also asked participants to indicate their preferred payment method for the carted item (1 = four installments, 7 = one-time pay in full). Finally, we collected demographic information.

---

<sup>2</sup> We opted to combine these two items to provide a coherent analysis across this and subsequent studies (see the web appendix for individual item analyses).



## Results

Participants in the presence condition reported significantly lower intention to abandon the cart ( $M = 4.07$ ,  $SD = 1.82$ ) compared to those in the absence condition ( $M = 4.64$ ,  $SD = 1.73$ ;  $t(233) = -2.47$ ,  $p = .014$ ,  $d = -.32$ , 95% CI =  $[-.58, -.06]$ ). Similarly, those in the presence condition perceived greater subjective wealth ( $M = 3.65$ ,  $SD = 1.51$ ) than those in the absence condition ( $M = 3.22$ ,  $SD = 1.61$ ;  $t(233) = 2.10$ ,  $p = .037$ ,  $d = .27$ , 95% CI =  $[.02, .53]$ ). Controlling for the chosen product did not substantially alter these results (see the web appendix).

A mediation analysis (PROCESS model 4; 5,000 bootstrap samples) with the presence of financing as an independent variable, cart abandonment intentions as a dependent variable, and subjective wealth perceptions as a mediator yielded a significant index ( $B_{\text{index}} = -.08$ ,  $SE = .04$ , 95% CI =  $[-.16, -.01]$ ).

Additionally, participants preferred to pay in full for their products ( $M = 5.55$ ,  $SD = 2.08$ ,  $t(233) = 11.43$ ,  $p < .001$ ,  $d = .75$ , 95% CI =  $[.60, .89]$ ), with no significant difference between conditions ( $M_{\text{presence}} = 5.41$ ,  $SD = 2.19$ ;  $M_{\text{absence}} = 5.70$ ,  $SD = 1.97$ ;  $t(233) = -1.08$ ,  $p = .283$ ). Similarly, we found no significant difference between conditions in product desirability ( $M_{\text{presence}} = 4.22$ ,  $SD = 1.68$ ;  $M_{\text{absence}} = 4.17$ ,  $SD = 1.57$ ;  $t(233) = .26$ ,  $p = .792$ ), brand liking ( $M_{\text{presence}} = 4.00$ ,  $SD = 1.59$ ;  $M_{\text{absence}} = 3.76$ ,  $SD = 1.57$ ;  $t(233) = 1.14$ ,  $p = .254$ ), and brand recognition ( $M_{\text{presence}} = 2.20$ ,  $SD = 1.75$ ;  $M_{\text{absence}} = 1.96$ ,  $SD = 1.64$ ;  $t(233) = 1.09$ ,  $p = .278$ ), suggesting that the impact of the presence of financing on cart abandonment intentions is not mediated by

changes in these variables. Controlling for these variables did not alter the main results (see the web appendix).

#### Study 1B: Shopping Online for Earphones in Presence of a 6-month Installment Plan

Study 1B aimed to test the robustness of the effect observed in study 1A. Study 1B presented participants with an online shopping simulation similar to study 1A, this time shopping for a pair of earphones. We expected that the presence (vs. absence) of financing would increase subjective wealth perceptions which would increase purchase completion intention. To further rule out the alternative account based on the perceived value of the carted item, we measured again participants' liking of the product.

Study 1B bore several changes from study 1A. First, participants were shown a single product to consider purchasing. Although we did not observe any differences in findings based on which of the three products participants selected in study 1A, this approach allows us to isolate the impact of the presence of financing without confounding factors related to product variability. Second, we reversed the order of the dependent variable and mediator measurements to bolster the mediation analysis in study 1A. Third, we refined our main dependent variable to payment intention, capturing both the likelihood of completing a one-time payment as well as the likelihood of cart abandonment. Lastly, we included a checkout page in the simulation, wherein participants could view the carted item and click on the checkout button to proceed to make a full payment. This addition was made to further increase realism to a one-time payment simulation within the study's context.

Importantly, we presented a financing plan this time involving six interest-free monthly installments, mirroring the financing service offered by the product's brand in the market at the time of our study.

## Method

We pre-registered this study ([aspredicted.org/64B\\_8BW](https://aspredicted.org/64B_8BW)) and recruited 301 participants from MTurk. As pre-registered, we excluded people who reported less than \$10,000 annual household income ( $n = 3$ ) to ensure we are recruiting participants who can realistically consider making a one-time payment for the product we use as our stimuli, leaving 298 participants ( $M_{\text{age}} = 44.62$ ,  $SD = 13.77$ ; 120 male, 3 non-binary). However, including these individuals did not significantly change our results.

We randomly assigned participants to one of two conditions in a 2 (financing: present vs. absent) between-subjects design. All participants imagined that they were interested in purchasing a pair of AirPods with certain product specifications they already decided on (i.e., “AirPods 3rd generation, with Lightning Charging Case”), which was priced at \$169. Participants imagined they were at the brand’s website to make a purchase and a full payment that day.



As in study 1A, participants went through the shopping simulation, browsing and carting the product. In the ‘my cart’ page, participants in the presence condition viewed the carted item with the full price with BNPL information underneath, that read: “Monthly installments also available: \$28.17/mo. for 6 months; Financed at 0% APR.” Participants in the absence condition could only view the item and the full price. Once participants clicked on the “Go to checkout”

button, we reminded them about the shopping scenario, that they have already decided to make a one-time payment to purchase these earphones. Participants then viewed the checkout page. In the BNPL presence condition, the checkout page displayed the cart and two payment options, an option to pay with monthly installments, and the other to pay in full. In the absence condition, participants saw their cart and with just an option to pay in full. All participants were instructed to click on the ‘pay in full’ button to make their one-time payment as if they are really about to make this purchase. Of note, in the presence condition, the checkout button to pay with monthly installments was disabled (see figure 2).

Upon clicking on the checkout button to pay in full, participants answered three questions assessing their subjective wealth perceptions ( $\alpha = 0.87$ ): “How painful would you feel to actually spend \$169 on this purchase right now?” (1 = not painful at all, 9 = extremely painful; reverse-coded); “How do you feel about your financial flexibility to afford this one-time payment?” (1 = very inflexible, 9 = very flexible); “Rate your financial resources you feel you have to cover this one-time payment.” (1 = very scarce, 9 = very abundant).

**FIGURE 2**

**THE PRESENCE OF FINANCING MANIPULATION IN STUDY 1B**

Panel A: Cart Page	
Financing condition	No Financing condition
<p>MY CART</p> <hr/> <div>  <p>Apple AirPods (3rd generation) with Lightning Charging Case</p> <p><b>\$169.00</b></p> <p>Monthly installments also available:  <b>\$28.17/mo. for 6 months*</b>  <small>*Financed at 0% APR</small></p> </div>	<p>MY CART</p> <hr/> <div>  <p>Apple AirPods (3rd generation) with Lightning Charging Case</p> <p><b>\$169.00</b></p> </div>
Panel B: Checkout Page	

---

Financing condition	No Financing condition
<p>Pay with Monthly Installments \$28.17/mo. for 6 mo.</p> <p>Check Out with Monthly Installments</p>	
<p>Pay in Full \$169.00</p> <p>Check Out</p>	<p>Pay in Full \$169.00</p> <p>Check Out</p>

---

Participants also rated their liking of the carted item by indicating how desirable, likable, and appealing the earphones in the cart were on a three-item 9-point scale (1 = not at all, 9 = extremely). We also included four exploratory items to measure purchase completion intention. Participants indicated, in percentages, how likely they were to authorize and complete this payment, provide their card information to complete this purchase, abandon this shopping webpage without buying this item (reverse-coded), and close this shopping webpage or log off the Internet before they buy this product (reverse-coded). We averaged the responses to create a single measure of payment completion intention ( $\alpha = 0.95$ ).

## Results

Participants in the presence condition perceived greater subjective wealth ( $M = 5.42$ ,  $SD = 2.35$ ) than those in the absence condition ( $M = 4.58$ ,  $SD = 2.35$ ;  $t(296) = 3.09$ ,  $p = .002$ ,  $d = .36$ , 95% CI = [.13, .59]). However, their liking for the carted item did not significantly differ

( $M_{\text{present}} = 6.17$ ,  $SD = 2.34$ ;  $M_{\text{absent}} = 5.72$ ,  $SD = 2.56$ ;  $t(296) = 1.59$ ,  $p = .114$ ,  $d = .18$ , 95% CI =  $[-.04, .41]$ ).

Furthermore, those in the presence condition reported significantly higher purchase completion intention ( $M = 57.47\%$ ,  $SD = 34.35\%$ ) compared to those in the absence condition ( $M = 44.51\%$ ,  $SD = 34.68\%$ ;  $t(296) = 3.24$ ,  $p = .001$ ,  $d = .38$ , 95% CI =  $[.15, .60]$ ). The difference in subjective wealth perceptions mediated the effect of the presence of financing on purchase completion intention (PROCESS model 4; 5,000 bootstrap samples;  $B_{\text{index}} = 3.73$ ,  $SE = 1.23$ , 95% CI =  $[1.36, 6.19]$ ).

## Discussion

Studies 1A and 1B support our prediction that the presence of financing decreases cart abandonment likelihood with increased subjective wealth perceptions mediating this effect in a realistic online shopping context. Note that study 1A found no significant difference in participants' preference for paying in full versus opting for BNPL, as it suggests that seeing the BNPL option did not shift consumers' predisposed payment preference.

## **STUDY 2: BUYING A CAR IN CASH IN PRESENCE OF A CAR LOAN**

Studies 1A-1B revealed that the presence of financing increases subjective wealth perceptions and purchase completion intention among consumers considering one-time payments in online shopping contexts. Study 2 sought to replicate this effect in an in-person large-ticket purchase situation. Although financing is often a typical method of payment for high-value

purchases, we predicted that the presence of financing, in this case a loan, could reduce purchase hesitation and increase subjective wealth perceptions conditional upon consumers anticipating a one-time payment. We tested this prediction using a controlled scenario wherein participants had saved up enough money and were considering purchasing a car with cash.

Our intention with focusing on a major purchase like a car was to test whether the impact of the presence of financing is contingent on a certain range of purchase value (and possibly specific to BNPL purchases) or, as our theory proposes, on the consumer's intent to pay in full. We theorize that the impact hinges on the latter but not the former, so we expected to replicate our findings from studies 1A-1B even if the considered item for purchase is one of the most substantial consumer purchases: a car.

## Methods

We pre-registered this study ([aspredicted.org/B3M\\_7H1](https://aspredicted.org/B3M_7H1)) and recruited 604 participants from Prolific ( $M_{\text{age}} = 40.42$ ,  $SD = 13.40$ ; 274 male, 11 non-binary). Participants were randomly assigned to one of two conditions in a 2 (financing: present vs. absent) between-subjects design. All participants viewed an instruction to imagine that they had been diligently saving money for several years to buy a new car in cash, and now they are ready to make a purchase. In the scenario, participants went to a nearby car dealership and met a dealer with a gender-neutral name, Taylor. Participants imagined interacting with the dealer to discuss different car models, ask questions, and to go on test drives. To realistically induce purchase hesitation in the scenario without specifying the car's price, participants read that they decided on a car model that would cost them \$2,000 more than what they had saved for a car, and that they had to dip into their

personal savings to set aside an additional \$2,000. They then imagined returning to the dealership the following week with the extra \$2,000 ready, fully prepared to purchase the car of their choice with cash.

Participants then imagined sitting at the dealer's office to discuss the purchase process. In the presence condition, participants read, "First, *[Taylor presented another payment choice in case you were interested: you could finance the car using a car loan. This choice is especially helpful for people who do not have enough money to make one-time payment for the full price of the car. To help such people finance a car, a car loan breaks the full price of a car down to smaller and more manageable monthly installments. These installments come with about 4.5% interest rates and can be spread over a period of time ranging from 24 to 60 months.]* Taylor asked if you are already set on your decision to pay for the car in full, and you responded, 'Yes, I've come prepared for the full payment today.'" In the absence condition, we omitted the italicized part where the dealer suggested a car loan.

Afterward, participants were told that they then sat down with Taylor to begin the purchase process, and their next step would be to take out their cashier's check that covers the cost of the car including the extra \$2,000, and hand it over to the dealer to make the payment. They then answered the subjective wealth measures on a six-item scale, which included the same three items used in study 1B with three additional items. The six items asked, at this point in the scenario, "how painful would you feel to actually pay for the car in full" (1 = not painful at all, 9 = extremely painful), "how do you feel about your financial flexibility to pay for the car in full" (1 = very inflexible, 9 = very flexible), "how would you rate your financial resources you feel you have to pay for the car in full" (1 = very scarce, 9 = very abundant), "To what extent do you feel financially constrained to pay for the car in full?" (1 = not at all, 9 = very much, reverse



coded), “To what extent do you feel you can spend money freely on this full payment for the car?” (1 = not at all, 9 = very much), and “How satisfied are you with your financial situation regarding your capability to pay for the car in full?” (1 = not at all satisfied, 9 = extremely satisfied). We averaged these items to form an index of subjective wealth perceptions ( $\alpha = .85$ ). Participants also reported their purchase completion intention by indicating in percentages how likely they were to drop out of the purchasing process in the scenario. Specifically, they indicated how likely they were to (1) reconsider their decision and not proceed with signing the purchase agreement, (2) withdraw their cashier's check and rethink about completing this purchase, (3) hesitate before handing over the check and finalizing the payment, and (4) decide against finalizing the deal and choose not to go through with the car purchase. We averaged participants' responses to these items and reversed it to create an index of purchase completion intention ( $\alpha = .92$ ). Finally, participants reported their demographic information.

## Results

As expected, participants who were told about the car loan perceived greater subjective wealth to afford a full payment for the car than those who were not ( $M_{\text{present}} = 6.66$ ,  $SD = 1.62$  vs.  $M_{\text{absent}} = 6.15$ ,  $SD = 1.66$ ,  $t(602) = 3.79$ ,  $p < .001$ ,  $d = .31$ , 95% CI = [.15, .47]). Similarly, participants who learned about the car loan reported greater intention to complete the full payment than those who did not ( $M_{\text{present}} = 81.50\%$ ,  $SD = 19.42$  vs.  $M_{\text{absent}} = 77.77\%$ ,  $SD = 22.81$ ,  $t(602) = 2.16$ ,  $p = .031$ ,  $d = .18$ , 95% CI = [.02, .34]).

Consistent with our findings in studies 1A-1B, a mediation analysis (PROCESS model 4; 5,000 bootstrap samples) indicated that subjective wealth perceptions mediated the impact of

presenting an option to pay through a car loan on purchase completion intention ( $B_{\text{index}} = 1.88$ ,  $SE = .52$ , 95% CI = [.87, 2.95]).

## Discussion

Study 2 generalized the effect to the high-value product purchasing context, using a traditional car loan bearing an annual interest rate as the financing method. Note also how the financing option was a simple description of a car loan, unlike studies 1A and 1B that displayed price breakdowns for installments. The predicted effect still emerged despite these differences, demonstrating the robustness of the effect.

This study provides evidence that the impact of the presence of financing on subjective wealth and purchase intention is also found with high purchase values. It also suggests that the effect may stem from the concept of financing, or the perceived hierarchical status assigned to different payment methods, rather than the financing type or specific presentation format.

In the remaining studies, we provide evidence for the underlying mechanism through both mediation and moderation approaches.

## **STUDY 3: SUBJECTIVE SOCIAL STATUS AS A MEDIATOR**

Studies 3 and 4 delved into a more complete picture by testing whether the effect is driven by BNPL serving as a social comparison cue, elevating one's subjective social status. The goal of study 4 was to test hypothesis 3 by directly measuring participants' subjective social status. We

predicted that the effect of the BNPL presence on subjective wealth perceptions would be mediated by elevated subjective social status.

## Method

We pre-registered this study ([aspredicted.org/H17\\_WVP](https://aspredicted.org/H17_WVP)) and recruited 412 participants from MTurk. As pre-registered, we excluded participants who reported less than \$10,000 annual household income ( $n = 26$ ), leaving 386 participants ( $M_{\text{age}} = 41.98$ ,  $SD = 12.35$ ; 176 men, 3 non-binary). However, including these individuals did not significantly change our results.

We randomly assigned participants to one of two conditions in a 2 (financing: present vs. absent) between-subjects design. The shopping simulation of Study 3 was identical to that of Study 1B. After the simulation, participants indicated their subjective wealth perceptions on a six-item scale, which included the same six items used in study 2 ( $\alpha = .92$ ).

We predicted that consumers will interpret their original intention to use a one-time payment when financing is available as a cue for their higher social status ( $H_3$ ). To test our mechanism, we measured subjective social status with the MacArthur scale, which assesses participants' rank in society with a ten-rung ladder (Adler et al. 2000). Participants read "In our society, there are groups which tend to be towards the top with the most money and those that are towards the bottom with the least money. Here we have a scale that runs from bottom (1) to top (10)." Participants then indicated where they would put themselves on this scale (1 = the lowest rank, 10 = the highest rank; Kraus et al. 2011).

We also asked participants to think back to their experience during the online shopping and checkout simulation and report their valence, arousal, and power during the simulation using

the 3-item Self-Assessment Manikin scale (Bradley and Lang 1994). Lastly, participants indicated their demographic information.

## Results

As predicted, participants in the presence condition perceived greater subjective wealth than those who were in the absent condition ( $M_{\text{present}} = 5.64$ ,  $SE = 2.13$  vs.  $M_{\text{absent}} = 4.96$ ,  $SD = 2.06$ ,  $t(384) = 3.21$ ,  $p = .001$ ,  $d = .33$ , 95% CI = [.13, .53]). Regarding the underlying mechanism, we examined how the presence of financing influenced subjective social status. Results indicated that participants perceived themselves to be higher up in the societal hierarchy in the presence (vs. absence) condition ( $M_{\text{present}} = 5.04$ ,  $SD = 1.84$ ;  $M_{\text{absent}} = 4.60$ ,  $SD = 1.96$ ,  $t(384) = 2.23$ ,  $p = .026$ ,  $d = .23$ , 95% CI = [.03, .43]).

Importantly, supporting our proposed process, a mediation analysis (PROCESS model 4; 5,000 bootstrap samples) with the condition as an independent variable, subjective wealth as a dependent variable, and subjective social status as a mediator yielded a significant index ( $B_{\text{index}} = .12$ ,  $SE = .05$ , 95% CI = [.02, .23]), indicating that the presence of financing increased subjective wealth perceptions via increasing subjective social status.

*Alternative Processes.* For exploratory purposes, we measured whether the presence (vs. absence) of financing influenced mood valence, arousal, and perceived power. Those in the presence (vs. absence) condition reported more positive mood valence ( $M_{\text{present}} = 6.06$ ,  $SD = 1.80$ ;  $M_{\text{absent}} = 5.64$ ,  $SD = 1.96$ ;  $t(384) = 2.20$ ,  $p = .028$ ,  $d = .22$ , 95% CI = [.02, .42]) and less arousal ( $M_{\text{present}} = 3.85$ ,  $SD = 2.11$ ;  $M_{\text{absent}} = 4.42$ ,  $SD = 2.06$ ;  $t(384) = -2.69$ ,  $p = .007$ ,  $d = -.27$ ,

95% CI = [-.47, -.07]), but power did not differ between conditions ( $M_{\text{present}} = 4.95$ ,  $SD = 1.63$ ;  $M_{\text{absent}} = 4.92$ ,  $SD = 1.75$ ;  $t(384) = .15$ ,  $p = .877$ ). Two separate mediation analyses indicated that mood valence and arousal each significantly mediated the effect of the presence of financing on subjective wealth perceptions ( $B_{\text{valence}} = 0.18$ ,  $SE = .08$ , 95% CI [.02, .33], 5,000 bootstrap samples;  $B_{\text{arousal}} = 0.10$ ,  $SE = .04$ , 95% CI [.02, .19], 5,000 bootstrap samples).

We then explored the influence of each of the potential mediators in a parallel mediation model using PROCESS Model 4 (Hayes 2017). This model included subjective social status, valence, and arousal as mediators. Valence and arousal significantly mediated the effect ( $B_{\text{valence}} = 0.15$ ,  $SE = .07$ , 95% CI [0.02, 0.28], 5,000 bootstrap samples;  $B_{\text{arousal}} = 0.03$ ,  $SE = .02$ , 95% CI [0.01, 0.07], 5,000 samples). Importantly, subjective social status remained a significant mediator ( $B_{\text{status}} = 0.05$ ,  $SE = .03$ , 95% CI [0.01, 0.11], 5,000 bootstrap samples). These results show that even after accounting for valence and arousal as potential mediators, there was still a significant mediation by subjective social status.

Taken together, study 3 supported our hypothesis ( $H_3$ ) that the presence of financing elevates subjective social status, which in turn increases subjective wealth perceptions. Importantly, this outcome provides evidence that different payment methods carry inherent notions of hierarchical status, particularly positioning financing below one-time payments. Next, study 4 demonstrates the mechanism through moderation.

#### **STUDY 4: ATTENUATION OF THE EFFECT THROUGH THE MANIPULATION OF SUBJECTIVE SOCIAL STATUS**

Study 4 adopted the moderation-of-process approach (Bullock, Green, and Ha 2010) to test the role of subjective social status by directly manipulating participants' subjective social status. Specifically, we asked participants to compare themselves to either the poorest or the wealthiest in society; those who feel content with their social status upon seeing themselves as better off than worse-off others were expected to be less responsive to social status cues, as their sense of self-satisfaction reduces the need to seek external validation (Custers and Aarts 2005; Kim and Gal 2014). We predicted that these participants—those who already perceive themselves as higher in social status—would be less affected by the presence of financing.

## Methods

We pre-registered this study ([aspredicted.org/HVP\\_WD4](https://aspredicted.org/HVP_WD4)) and recruited one thousand participants from MTurk. We excluded participants who reported less than \$10,000 annual household income ( $n = 44$ )<sup>3</sup>, leaving 956 participants ( $M_{\text{age}} = 42.14$ ,  $SD = 12.66$ ; 469 men, 7 non-binary). Including these individuals did not substantively change the pattern of results.

The study employed a 2 (subjective social status: low vs. high)  $\times$  2 (financing: present vs. absent) between-subjects design. First, participants received a manipulation of subjective social status, which was adopted from prior research (Anderson et al. 2012). Specifically, participants were shown an image of a ladder with 10 rungs and instructed: “Think of the ladder above as representing where people stand in our society. In our society there are groups which tend to be towards the top with the most money and those that are towards the bottom with the least money.” For participants in the high (vs. low) subjective social status condition, the instructions

---

<sup>3</sup> This study expanded HIT access to all income levels mid-study due to data collection delays.

continued as follows: “Think of how the differences between you and a person from the very bottom [top] of the ladder might influence your interaction with this person when you're just getting acquainted to each other.” All participants wrote about the prompt and indicated how they felt about their status, social standing, and ranking at the moment.

Participants then proceeded to a new task, involving the shopping simulation identical to that of Study 3. After going through the simulation, participants indicated their subjective wealth perceptions using the scale used in study 3 ( $\alpha = .93$ ), as well as purchase completion likelihood on the same scale from study 1B ( $\alpha = .96$ ). As a manipulation check, participants were asked to rate how they felt during the subjective social status manipulation task on three items on a 9-point bipolar scale (“low status/high status,” “low social standing/high social standing,” and “low ranking/high ranking”;  $\alpha = .98$ ). Finally, participants indicated their demographic information.

## Results

*Manipulation Check.* Participants perceived their social status to be higher in the High Subjective Social Status condition ( $M_{\text{high}} = 5.25$ ,  $SD = 2.05$ ;  $M_{\text{low}} = 4.13$ ,  $SD = 2.04$ ;  $t(954) = 8.82$ ,  $p < .001$ ,  $d = .57$ , 95% CI = [.44, .70]).

*Subjective Wealth.* Regressing subjective wealth perceptions on subjective social status (1 = high, -1 = low), financing (1 = present, -1 = absent), and their interaction revealed a significant effect of subjective social status ( $B = .18$ ,  $SE = .07$ ,  $t(952) = 2.51$ ,  $p = .012$ ), and a significant effect of financing ( $B = .20$ ,  $SE = .07$ ,  $t(952) = 2.74$ ,  $p = .006$ ), qualified by the predicted interaction ( $B = -.14$ ,  $SE = .07$ ,  $t(952) = -1.98$ ,  $p = .048$ ; figure 3, panel A). When

subjective social status was low, the presence (vs. absence) of financing increased subjective wealth ( $B = .34$ ,  $SE = .10$ ,  $t(952) = 3.26$ ,  $p = .001$ ), an effect that attenuated when subjective social status was high ( $B = .06$ ,  $SE = .10$ ,  $t(952) = .55$ ,  $p = .579$ ).

*Purchase Completion Intention.* Similarly, regressing purchase completion intention on subjective social status, financing, and their interaction revealed a significant effect of subjective social status ( $B = 2.27$ ,  $SE = 1.08$ ,  $t(952) = 2.10$ ,  $p = .036$ ), and a marginally significant effect of financing ( $B = 2.01$ ,  $SE = 1.08$ ,  $t(952) = 1.86$ ,  $p = .064$ ), qualified by the predicted interaction ( $B = -3.07$ ,  $SE = 1.08$ ,  $t(952) = -2.85$ ,  $p = .005$ ; figure 3, panel B). When subjective social status was low, the presence (vs. absence) of financing increased subjective wealth ( $B = 5.08$ ,  $SE = 1.56$ ,  $t(952) = 3.25$ ,  $p = .001$ ), and this effect was attenuated when subjective social status was high ( $B = -1.07$ ,  $SE = 1.49$ ,  $t(952) = -.72$ ,  $p = .474$ ).

*Moderated Mediation.* Following our pre-registration, a moderated mediation analysis (PROCESS model 7; 5,000 bootstrap samples) yielded a significant index ( $B_{\text{index}} = -3.04$ ,  $SE = 1.53$ , 95% CI =  $[-6.12, -.06]$ ). Subjective wealth mediated the effect of the presence (vs. absence) of financing on purchase completion intention when subjective social status was low ( $B = 3.62$ ,  $SE = 1.06$ , 95% CI =  $[1.53, 5.70]$ ), but this mediation effect attenuated when subjective social status was high ( $B = .59$ ,  $SE = 1.10$ , 95% CI =  $[-1.61, 2.71]$ ).

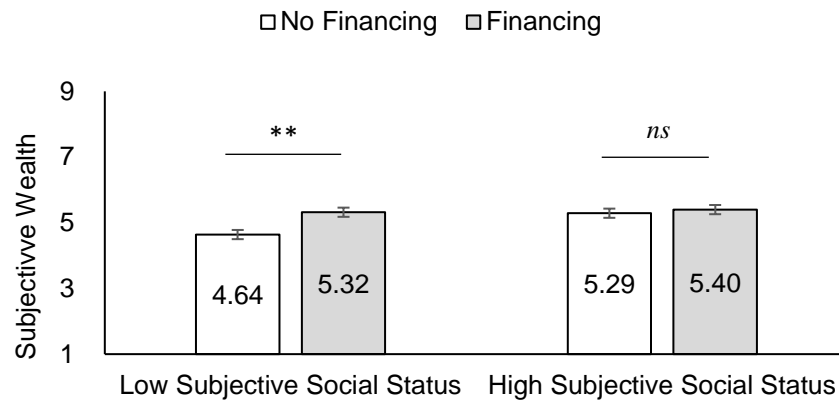


**FIGURE 3**

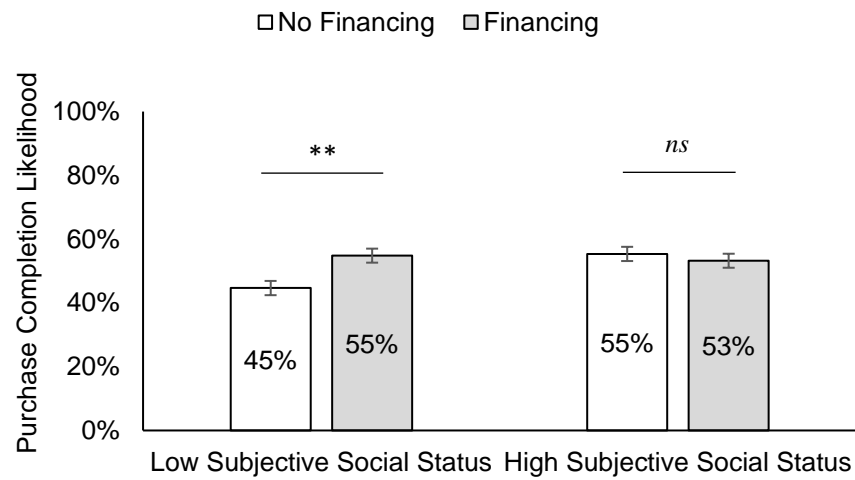
INTERACTION BETWEEN SUBJECTIVE SOCIAL STATUS AND BNPL PRESENCE

(STUDY 4)

Panel A. Subjective wealth perceptions



Panel B. Purchase completion likelihood



NOTE.—Error bars represent standard errors; \*\*  $p < .01$ .

Discussion

Study 4 provide further support for our theorization by demonstrating that the presence of financing increases purchase completion intention via subjective wealth when subjective social status is low, while high subjective social status attenuates the effect on both purchase completion intention and subjective wealth. As such, when consumers were satisfied with their social status and desensitized to status-related cues, the presence of financing did not serve as a means of compensation for their less-than-satisfactory social status.

## **STUDY 5: LAY ASSOCIATION BETWEEN FINANCING AND LOW SOCIAL STATUS AS A MODERATOR**

Studies 3 and 4 provide evidence that the presence of financing options increases perceived social status for those with an intent to pay in full, and that this occurs for individuals who are not already high in perceived social status. In this study, we tried manipulating the strength of association between financing and low social status by directly reinforcing and weakening the belief that consumers who opt for financing represent a lower financial standing. We predicted that weakening the association between financing and lower status would attenuate the impact of the presence of financing on subjective wealth and purchase completion intention.

### **Methods**

We pre-registered this study ([aspredicted.org/XB4\\_R4Z](https://aspredicted.org/XB4_R4Z)) and recruited 601 participants from Prolific. We excluded participants who reported less than \$10,000 annual household

income ( $n = 5$ ), leaving 596 participants ( $M_{\text{age}} = 40.02$ ,  $SD = 11.39$ ; 248 men, 10 non-binary). Including these individuals did not change the results.

The study employed a one factor three condition (financing absent, financing with the reinforced association, financing with the weakened association) between-subjects design. Participants engaged in a shopping simulation akin to that in study 4, where they imagined that they were interested in purchasing a coffee maker (i.e., “Keurig K-Elite Single Serve Coffee Maker”), priced at \$139.99. They read that they were about to shop online to make a purchase and a full payment that day.

In the two conditions where the association with financing was manipulated, participants read that they came across an online post before visiting the shopping website. In the reinforced association condition, the post depicted a wealthy businessperson who always prefers one-time payments to get the feeling of complete ownership at the moment of purchase and an intern with a minimal income who always prefers financing for to get the feeling of not spending all their money at once. The post closed with a remark that how one chooses to pay is a clear reflection of one’s financial status. Conversely, in the weakened association condition, these payment preferences were swapped across characters, with a conclusion that how one chooses to pay is merely represents one’s personal preference, not financial status. Participants summarized the post in one or two sentences and rated the extent to which the post associated the use of financing such as BNPL with low financial status and the inability to afford full payments. After this, they resumed their initial task of shopping for a coffee maker online. In the absence of financing condition, participants directly proceeded to the shopping task without engaging with the online post.

Participants browsed the coffee maker, added it to their cart, and clicked on a checkout button to make a one-time payment. In all conditions except the absence of financing condition, BNPL financing information appeared under the full price information (i.e., “\$139.99 or 4 interest-free payments of \$35.00”). After completing the shopping simulation, participants indicated their subjective wealth perceptions ( $\alpha = .93$ ), as well as purchase completion likelihood ( $\alpha = .94$ ) just as in study 4. For a manipulation check, we asked participants to indicate the extent to which they associate the use of financing methods with low financial status (1 = absolutely unrelated, 9 = absolutely related). Lastly, participants provided their demographic information.

## Results

*Manipulation Check.* One-sample *t*-tests confirmed that participants in the absence of financing and financing with the reinforced association conditions perceived financing as related to low status, with means significantly above the scale midpoint ( $M_{\text{absence}} = 6.19$ ,  $SD = 2.42$ ;  $t(205) = 7.10$ ,  $p < .001$ ,  $d = .49$ , 95%  $CI = [.35, .64]$ ;  $M_{\text{reinforced}} = 7.04$ ,  $SD = 1.83$ ;  $t(198) = 15.67$ ,  $p < .001$ ,  $d = 1.11$ , 95%  $CI = [.93, 1.29]$ ). In contrast, those the presence with the weakened association condition, as indicated by a mean that did not significantly differ from the midpoint ( $M = 4.95$ ,  $SD = 2.39$ ;  $t(190) = -.30$ ,  $p = .762$ ), suggesting a reduced connection between financing and low social status. A one-way ANOVA ( $F(2, 593) = 43.18$ ,  $p = .001$ ,  $\eta^2 = .13$ ) and post-hoc tests indicated significant differences between each pair of conditions ( $ps < .001$ ; see the web appendix).

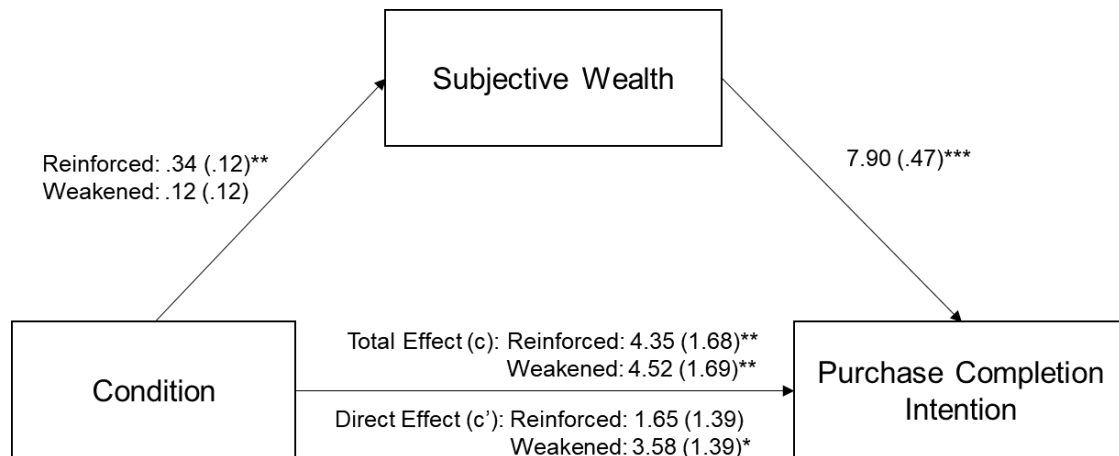
*Subjective Wealth.* A one-way ANOVA revealed a significant effect of condition on subjective wealth perceptions ( $F(2, 593) = 7.89, p < .001, \eta^2 = .03$ ). Supporting our prediction, planned contrasts revealed that, compared to the absence of financing condition ( $M = 5.30, SD = 2.18, \text{Median} = 5.50$ ), participants in the financing with the reinforced association condition reported significantly greater subjective wealth perceptions ( $M = 6.10, SD = 2.19, \text{Median} = 6.50; F(1, 593) = 14.85, p < .001, \eta_p^2 = .02$ ). In contrast, participants in the financing with the weakened association condition did not significantly differ from the absence condition in their subjective wealth perceptions ( $M = 5.88, SD = 1.89, \text{Median} = 5.83; F(1, 593) = .93, p = .334$ ).

*Purchase Completion Intention.* A one-way ANOVA revealed a significant effect of condition on purchase completion intentions ( $F(2, 593) = 14.21, p < .001, \eta^2 = .05$ ). Subsequent planned contrasts revealed that, compared the absence of financing condition ( $M = 59.21\%, SD = 31.54\%, \text{Median} = 63.00\%$ ), participants in the financing with the reinforced association condition reported significantly greater purchase completion intentions ( $M = 72.42\%, SD = 28.20\%, \text{Median} = 81.75\%; F(1, 593) = 21.31, p < .001, \eta_p^2 = .03$ ), as did those in the financing with the weakened association condition ( $M = 72.59\%, SD = 26.73\%, \text{Median} = 81.00\%; F(1, 593) = 7.12, p = .008, \eta_p^2 = .01$ ).

*Mediation.* Following our pre-registration, a mediation analysis (PROCESS model 4; 5,000 bootstrap samples) with the absence of financing condition as the baseline yielded significant index for the presence with reinforced association conditions ( $B_{\text{index}} = 2.70, SE = 1.00, 95\% \text{ CI} = [.77, 4.68]$ ), but not for the financing with weakened association condition ( $B_{\text{index}} = .94, SE = .94, 95\% \text{ CI} = [-.89, 2.79]$ , figure 4).

**FIGURE 4**

**MEDIATION OF CONDITION ON PURCHASE COMPLETION INTENTION (STUDY 5)**



NOTE.— Parentheses indicate standard errors. The terms ‘reinforced’ and ‘weakened’ delineate the contrast between the absence of financing condition and each respective financing condition. Path coefficients are unstandardized betas. \*  $p < .05$ ; \*\*  $p < .01$ ; \*\*\*  $p < .001$ .

## Discussion

Study 5 revealed that participants in the presence of financing with the reinforced association between financing and low social status exhibited the same pattern observed in our previous studies, wherein the presence of financing increased subjective wealth perceptions, which in turn increased purchase completion intentions, but this mediation effect was attenuated when the association between financing and low social status was weakened. A post-test ( $N = 799$ ) confirmed that merely presenting the BNPL information as in the previous studies, without any manipulation on the association between financing and low social status, increased subjective wealth perceptions similarly to the reinforced association condition (see the web appendix). This supports our theory that financing is closely associated with low social status.

However, it is important to note that, although participants in the weakened association condition did not perceive significantly greater subjective wealth than those in the absence of financing condition, the difference in purchase completion intentions between these two groups was unexpectedly significant. This opens the possibility that additional factors, such as a more positive mood valence or decreased arousal as observed in study 3, could account for the effect of the presence of financing on purchase completion intentions, concurrently with subjective social status. It is also possible that there is a conditioning effect caused by the presence of financing, which influences spending intention without modifying the conscious rationale for spending, akin to the effects documented in the credit card (vs. cash) priming literature (Chatterjee and Rose 2012; Feinberg 1986; Prelec and Simester 2001; Vohs 2015; Wong and Lynn 2020). We thus encourage future research to explore the dynamics of conscious and unconscious processes underlying the impact of financing availability on spending.

## **GENERAL DISCUSSION**

In today's online shopping environment, a majority of consumers encounter an option to finance even when they intend to make a one-time payment (web appendix, pilot survey). Six controlled shopping simulation studies find that the presence of financing at point-of-sale can increase the likelihood of purchase conversion for these types of consumers who do not intend on using the financing service. This is because financing is generally associated with low financial status, which in turn prompts consumers to interpret their initial intent to pay in full as a cue to their own high social status, which increases their subjective wealth perceptions (studies 3–5). This effect is attenuated when consumers were more (vs. less) satisfied with their

subjective social status, thus making them less attuned to status cues, or when the association between financing and low social status was weakened.

Our research advances theory in several ways. First, we challenge the scope of prior research that mostly focused on social and internal comparands as determinants of subjective wealth (Joo and Grable 2004; Liang and Fairchild 1979; Greenberg 2013; Tully and Sharma 2022), by showing that payment methods available at checkout can also serve as a comparand shaping subjective wealth perceptions.

We also contribute to the literature on the pain of paying by identifying subjective social status as a novel mechanism beyond traditionally tested mechanisms like physical parting with money and payment decoupling (Soman 2001; Thomas et al. 2011; Zellermyer 1996). Drawing on theories that link social status with resource accessibility (Adler et al. 2000; Kraus et al. 2011; Dubois and Ordabayeva 2015), we find that elevated subjective social status alleviates the pain of paying, a concept encapsulated in our assessment of subjective wealth perceptions. Holding the payment mechanism and payment decoupling constant, consumers who viewed their choice to pay outright as a reflection of higher social standing reported less pain of paying, underscoring how heightening subjective social status lessens the psychological pain associated with spending.

Furthermore, we add to the literature on cart abandonment, which generally focuses on optimizing the provision of promos, coupons, or discounts to increase purchase conversion (Lam et al., 2001; Oliver and Shor 2003; Sahni, Zou, and Chintagunta 2017; Xie et al. 2006). Our findings reveal that even offers customers are unlikely to use, such as financing options for affordable purchases, can significantly influence their purchase completion intentions by prompting a reassessment of their subjective social status. This suggests that even unredeemed



promos, coupons, or discounts could improve purchase conversion rates (Gopalakrishnan and Park 2021) by distinctly affecting consumer psychology.

Our findings provide important insights for practitioners in understanding how the availability of financing influences consumer psychology, particularly of those who do not intend to use it. By simply presenting an option to finance, practitioners may increase purchase conversion among shoppers disinclined to use financing, whether due to the affordability of their order or a personal preference against using financing (Wertenbroch, Soman, and Nunes 2001). Thus, firms can strategically provide financing services to target not just customers who cannot afford outright payments but also those intending to pay outright, especially when they are likely sensitive to status cues, as inferred from their social status or interest in status-related products.

This research, while shedding light on the psychological effects of presenting financing options on consumer psychology, acknowledges several limitations. First, our findings are based on simulated shopping experiences rather than actual purchasing behavior. Although there exists field evidence supporting the influence of BNPL on real non-BNPL purchases (Di Maggio et al. 2022), further research involving real consumer behavior would enrich our understanding of the findings of the current research. Second, our research did not explore the use of financing options for purchases intended as gifts for others. Similar to how monthly (vs. lumpsum) payments for charitable donation increases the perceived benefits of giving (Atlas and Bartels 2018), it is possible when paying has a utility, as in gift giving situations, financing for gifts may differently influence consumers who otherwise pay outright. Lastly, our study focused exclusively on U.S. consumers, where interest-free small installment plans are a relatively recent phenomenon. This contrasts with regions like East Asia, where such financing methods are more

ingrained in consumer culture. Exploring potential cultural differences in financing perceptions could reveal valuable insights about how norms and beliefs about their use change over time.

Even for consumers who prefer outright payments, providing an option to finance could increase purchase completion intentions. We demonstrate that simply having financing available at checkout can alter these consumers' perceptions of their social status and subjective wealth, which ultimately leads to an increase in their likelihood of completing an outright purchase. Broadly, our findings highlight the need for a deeper understanding of the perceived rank ordering among different payment methods, wherein choosing to use, or not use, a payment method perceived lower in rank may uniquely shape consumer's perceptions of themselves as well as their behaviors. By better understanding the advantages and limitations of offering such payment methods, businesses can strategically select and provide payment options in their retail settings to improve purchase conversion rates.

## REFERENCES

- Adler, Nancy E., Elissa S. Epel, Grace Castellazzo, and Jeannette R. Ickovics (2000), "Relationship of Subjective and Objective Social Status with Psychological and Physiological Functioning: Preliminary Data in Healthy, White Women," *Health Psychology*, 19(6), 586-592.
- Afterpay (2024), "Marketing & Advertising Guidelines," <https://www.afterpay.com/en-US/for-retailers/resources/marketing/marketing-messaging>.
- Anderson, Cameron, Michael W. Kraus, Adam D. Galinsky, and Dacher Keltner (2012), "The Local-ladder Effect: Social Status and Subjective Well-being," *Psychological Science*, 23(7), 764-771.
- Atlas, Stephen A., and Daniel M. Bartels (2018), "Periodic Pricing and Perceived Contract Benefit," *Journal of Consumer Research*, 45(2), 350-364.
- Baymard (2024), "Cart Abandonment Rate Statistics 2024," <https://baymard.com/lists/cart-abandonment-rate>.
- Bem, Daryl J. (1972), "Self-Perception Theory," *Advances in Experimental Social Psychology*, Volume 6, 1-62.
- Bernthal, Matthew J., David Crockett, and Randall L. Rose (2005), "Credit Cards as Lifestyle Facilitators," *Journal of Consumer Research*, 32(1), 130-145.
- Bleier, Alexander, and Maik Eisenbeiss (2015), "Personalized Online Advertising Effectiveness: The Interplay of What, When, and Where," *Marketing Science*, 34(5), 669-688.
- Bradley, Margaret M., and Peter J. Lang (1994), "Measuring Emotion: The Self-Assessment Manikin and the Semantic Differential," *Journal of Behavior Therapy and Experimental Psychiatry*, 25(1), 49-59.

- Buechel, Eva C., and Carey K. Morewedge (2014), "The (Relative and Absolute) Subjective Value of Money," in *The Psychological Science of Money*, New York, NY: Springer New York, 93-120.
- Bullock, John G., Donald P. Green, and Shang E. Ha (2010), "Yes, But What's the Mechanism? (Don't Expect an Easy Answer)," *Journal of Personality and Social Psychology*, 98(4), 550-558.
- Chatterjee, Promothesh, and Randall L. Rose (2012), "Do Payment Mechanisms Change the Way Consumers Perceive Products?" *Journal of Consumer Research*, 38(6), 1129-1139.
- Clark, Andrew E., and Andrew J. Oswald (1996), "Satisfaction and Comparison Income," *Journal of Public Economics*, 61(3), 359-381.
- Consumer Financial Protection Bureau (2022), "Buy Now, Pay Later: Market Trends and Consumer Impacts," [https://files.consumerfinance.gov/f/documents/cfpb\\_buy-now-pay-later-market-trends-consumer-impacts\\_report\\_2022-09.pdf](https://files.consumerfinance.gov/f/documents/cfpb_buy-now-pay-later-market-trends-consumer-impacts_report_2022-09.pdf).
- Consumer Financial Protection Bureau (2023), "Consumer Use of Buy Now, Pay Later," [https://files.consumerfinance.gov/f/documents/cfpb\\_consumer-use-of-buy-now-pay-later\\_2023-03.pdf](https://files.consumerfinance.gov/f/documents/cfpb_consumer-use-of-buy-now-pay-later_2023-03.pdf).
- Clark, Andrew E., and Andrew J. Oswald (1996), "Satisfaction and Comparison Income," *Journal of Public Economics*, 61(3), 359-381.
- Custers, Ruud, and Henk Aarts (2005), "Positive Affect as Implicit Motivator: On the Nonconscious Operation of Behavioral Goals," *Journal of Personality and Social Psychology*, 89(2), 129-142.
- Davis, Elizabeth P., and Sandra A. Helmick (1985), "Family Financial Satisfaction: The Impact of Reference Points," *Home Economics Research Journal*, 14(1), 123-131.

- De La Rosa, Wendy, and Stephanie M. Tully (2022), "The Impact of Payment Frequency on Consumer Spending and Subjective Wealth Perceptions," *Journal of Consumer Research*, 48(6), 991-1009.
- Di Maggio, Marco, Emily Williams, and Justin Katz (2022), "Buy Now, Pay Later Credit: User Characteristics and Effects on Spending Patterns," National Bureau of Economic Research, NBER Working Paper No. 30508.
- Dreze, Xavier, and Joseph C. Nunes (2009), "Feeling Superior: The Impact of Loyalty Program Structure on Consumers' Perceptions of Status," *Journal of Consumer Research*, 35(6), 890-905.
- Dubois, David, and Nailya Ordabayeva (2015), "Social Hierarchy, Social Status, and Status Consumption," in *The Cambridge Handbook of Consumer Psychology*, eds. Norton, M. I., Rucker, D. D., and Lambertson, C., NY: Cambridge University Press, 332-367.
- Feinberg, Richard A. (1986), "Credit Cards as Spending Facilitating Stimuli: A Conditioning Interpretation," *Journal of Consumer Research*, 13(3), 348– 356.
- Garvey, Aaron M., Simon J. Blanchard, and Karen Page Winterich (2017), "Turning Unplanned Overpayment into a Status Signal: How Mentioning the Price Paid Repairs Satisfaction," *Marketing Letters*, 28, 71-83.
- Gasiorowska, Agata (2014), "The Relationship Between Objective and Subjective Wealth is Moderated by Financial Control and Mediated by Money Anxiety," *Journal of Economic Psychology*, 43, 64-74.
- Gopalakrishnan, Arun, and Young-Hoon Park (2021), "The Impact of Coupons on the Visit-to-Purchase Funnel," *Marketing Science*, 40(1), 48-61.

- Greenberg, Adam Eric (2013), "When Imagining Future Wealth Influences Risky Decision Making," *Judgment and Decision Making*, 8(3), 268-277.
- Hines, James R., and Richard H. Thaler (1995), "The Flypaper Effect," *Journal of Economic Perspectives*, 9(4), 217-226.
- Hirschman, Elizabeth C. (1979), "Differences in Consumer Purchase Behavior by Credit Card Payment System," *Journal of consumer Research*, 6(1), 58-66.
- Hopkins, Tom (1998), *Sales Closing for Dummies*, John Wiley & Sons.
- Huang, Guei-Hua, Nikolaos Korfiatis, and Chun-Tuan Chang (2018), "Mobile Shopping Cart Abandonment: The Roles of Conflicts, Ambivalence, and Hesitation," *Journal of Business Research*, 85(1), 165–174.
- Jansen, Mark, Hieu Nguyen, Lamar Pierce, and Jason Snyder (2023), "Product Sales Incentive Spillovers to the Lending Market: Evidence from Subprime Auto Loan Defaults," *Management Science*,  
<https://pubsonline.informs.org/doi/abs/10.1287/mnsc.2023.4935>.
- Joo, So-hyun, and John E. Grable (2004), "An Exploratory Framework of the Determinants of Financial Satisfaction," *Journal of Family and Economic Issues*, 25(1), 25-50.
- Kahneman, Daniel, and Dale T. Miller (1986), "Norm theory: Comparing Reality to Its Alternatives," *Psychological Review*, 93(2), 136-153.
- Kappes, Heather Barry, Joe J. Gladstone, and Hal E. Hershfield (2021), "Beliefs About Whether Spending Implies Wealth," *Journal of Consumer Research*, 48(1), 1-21.
- Karlsson, Niklas, Tommy Garling, Peter Dellgran, and Birgitta Klingander (2005), "Social Comparison and Consumer Behavior: When Feeling Richer or Poorer Than Others Is More Important Than Being So," *Journal of Applied Social Psychology*, 35 (6), 1206–22.

- Katz, Daniel, Kan Christina, and Abigail B. Sussman. (2021), "The Impact of Borrowing on Perceived Financial Constraint and Monetary Outlays," Working Paper, University of Chicago.
- Kim, Soo, and David Gal (2014), "From Compensatory Consumption to Adaptive Consumption: The Role of Self-acceptance in Resolving Self-deficits," *Journal of Consumer Research*, 41(2), 526-542.
- Klarna (2024), "Approved Messaging," <https://docs.klarna.com/marketing/solutions/grab-and-go/us/advertising-brand-guidelines/approved-messaging>.
- Kraus, Michael W., Paul K. Piff, and Dacher Keltner (2011), "Social Class as Culture: The Convergence of Resources and Rank in the Social Realm," *Current Directions in Psychological Science*, 20(4), 246-250.
- Kukar-kinney, Monika, and Angeline G. Close (2010), "The Determinants of Consumers' Online Shopping Cart Abandonment," *Journal of the Academy of Marketing Science*, 38(2), 240.
- Lam, Shun Yin, Mark Vandenbosch, John Hulland, and Michael Pearce (2001), "Evaluating Promotions in Shopping Environments: Decomposing Sales Response into Attraction, Conversion, And Spending Effects," *Marketing Science*, 20(2), 194-215.
- Li, Shibo, and Patrali Chatterjee (2005), "Shopping Cart Abandonment at Retail Websites-A Multi-stage Model of Online Shopping Behavior," *UCR Sloan Center for Internet Retailing*.
- Liang, Jersey, and Thomas J. Fairchild (1979), "Relative Deprivation and Perception of Financial Adequacy Among the Aged," *Journal of Gerontology*, 34(5), 746-759.
- McCall, Michael, and Heather J. Belmont (1996), "Credit Card Insignia and Restaurant Tipping: Evidence for an Associative Link," *Journal of Applied Psychology*, 81(5), 609.

- Miller, Dale T. and Deborah A. Prentice (1996), "The Construction of Social Norms and Standards," in *Social Psychology: Handbook of Basic Principles*, E. Tory Higgins and Arie W. Kruglanski, eds. Guilford Press, 799–829.
- Morewedge, Carey K., Leif Holtzman, and Nicholas Epley (2007), "Unfixed Resources: Perceived Costs, Consumption, and the Accessible Account Effect," *Journal of Consumer Research*, 34(4), 459-467.
- Nelissen, Rob M. A., and Marijn H. C. Meijers (2011), "Social Benefits of Luxury Brands as Costly Signals of Wealth and Status," *Evolution and Human Behavior*, 32(5), 343-355.
- O'Guinn, Thomas Clayton, Robin J. Tanner, and Ahreum Maeng (2015), "Turning to Space: Social Density, Social Class, and the Value of Things in Stores," *Journal of Consumer Research*, 42(2), 196-213.
- Oliver, Richard L., and Mikhael Shor (2003), "Digital Redemption of Coupons: Satisfying and Dissatisfying Effects of Promotion Codes," *Journal of Product & Brand Management*, 12(2), 121-134.
- Olson, Jenny G., Brent McFerran, Andrea C. Morales, and Darren W. Dahl (2016), "Wealth and Welfare: Divergent Moral Reactions to Ethical Consumer Choices," *Journal of Consumer Research*, 42(6), 879-896.
- Park, Joowon, Clarence Lee, and Manoj Thomas (2021), "Why Do Cashless Payments Increase Unhealthy Consumption? The Decision-risk Inattention Hypothesis," *Journal of the Association for Consumer Research*, 6(1), 21-32.
- Polman, Evan, Daniel A. Effron, and Meredith R. Thomas (2018), "Other People's Money: Money's Perceived Purchasing Power Is Smaller for Others Than for the Self," *Journal of Consumer Research*, 45(1), 109-125.



Prelec, Drazen, and Duncan Simester (2001), "Always Leave Home Without It: A Further Investigation of the Credit-card Effect on Willingness to Pay," *Marketing Letters*, 12, 5-12.

PYMNTS (2018), "Layaway's Visible Resurrection," Last Accessed May 4, 2023.

<https://www.pymnts.com/news/retail/2018/layaway-resurgence-consumers-holiday-spending-debt>

Raghubir, Priya, and Joydeep Srivastava (2008), "Monopoly Money: The Effect of Payment Coupling and Form on Spending Behavior," *Journal of Experimental Psychology: Applied*, 14(3), 213-225.

Ranyard, Rob, Lisa Hinkley, Janis Williamson, and Sandie McHugh (2006), "The Role of Mental Accounting in Consumer Credit Decision Processes," *Journal of Economic Psychology*, 27(4), 571-588.

Rucker, Derek D., and Adam D. Galinsky (2008), "Desire to Acquire: Powerlessness and Compensatory Consumption," *Journal of Consumer Research*, 35(2), 257-267.

Sahni, Navdeep S., Dan Zou, and Pradeep K. Chintagunta (2017), "Do Targeted Discount Offers Serve as Advertising? Evidence From 70 Field Experiments," *Management Science*, 63(8), 2688-2705.

Shah, Avni M., Noah Eisenkraft, James R. Bettman, and Tanya L. Chartrand (2016), "Paper or plastic?": How We Pay Influences Post-transaction Connection," *Journal of Consumer Research*, 42(5), 688-708.

Sharma, Eesha, and Adam L. Alter (2012), "Financial Deprivation Prompts Consumers to Seek Scarce Goods," *Journal of Consumer research*, 39(3), 545-560.

- Sharma, Eesha, Stephanie Tully, and Cynthia Cryder (2021), "Psychological Ownership of (Borrowed) Money," *Journal of Marketing Research*, 58(3), 497-514.
- Soman, Dilip (2001), "Effects of Payment Mechanism on Spending Behavior: The Role of Rehearsal and Immediacy of Payments," *Journal of Consumer Research*, 27(4), 460-474.
- (2003), "The effect of payment transparency on consumption: Quasi-experiments from the field," *Marketing Letters*, 14, 173-183.
- , Amar Cheema, and Eugene Y. Chan (2012), "Understanding Consumer Psychology to Avoid Abuse of Credit Cards," In *Transformative Consumer Research for Personal and Collective Well-Being*, Taylor & Francis, 423-444.
- Sondhi, Neena (2017), "Segmenting & Profiling the Deflecting Customer: Understanding Shopping Cart Abandonment," *Procedia Computer Science*, 122, 392-399.
- Soster, Robin L., Andrew D. Gershoff, and William O. Bearden (2014), "The Bottom Dollar Effect: The Influence of Spending to Zero on Pain of Payment and Satisfaction," *Journal of Consumer Research*, 41(3), 656-677.
- Srivastava, Joydeep, and Priya Raghubir (2002), "Debiasing Using Decomposition: The Case of Memory-based Credit Card Expense Estimates," *Journal of Consumer Psychology*, 12(3), 253-264.
- Thomas, Manoj, Kalpesh Kaushik Desai, and Satheeshkumar Seenivasan (2011), "How Credit Card Payments Increase Unhealthy Food Purchases: Visceral Regulation of Vices," *Journal of Consumer Research*, 38(1), 126-139.
- Tully, Stephanie M., Hal E. Hershfield, and Tom Meyvis (2015), "Seeking Lasting Enjoyment with Limited Money: Financial Constraints Increase Preference for Material Goods Over Experience," *Journal of Consumer Research*, 42(1), 59-75.

Tully, Stephanie M., and Eesha Sharma (2018), "Context-dependent drivers of discretionary Debt Decisions: Explaining Willingness to Borrow for Experiential Purchases," *Journal of Consumer Research*, 44(5), 960-973.

Tully, Stephanie M., and Eesha Sharma (2022), "Consumer Wealth," *Consumer Psychology Review*, 5(1), 125-143.

US Department of Health and Human Services (2024), "2023 Poverty Guidelines," <https://aspe.hhs.gov/topics/poverty-economic-mobility/poverty-guidelines>.

Vohs, Kathleen D. "Money Priming Can Change People's Thoughts, Feelings, Motivations, and Behaviors: An Update on 10 Years of Experiments," *Journal of Experimental Psychology: General*, 144(4), e86-e93.

Wertenbroch, Klaus, Soman Dilip, Nunes Joseph (2001), "Debt Aversion as Self-Control: Consumer Self-Management of Liquidity Constraints," Working Papers—INSEAD R & D, Fontainebleau, France.

Whelan, Jodie, and Sean T. Hingston (2018), "Can Everyday Brands Be Threatening? Responses to Brand Primes Depend on Childhood Socioeconomic Status," *Journal of Consumer Psychology*, 28(3), 477-486.

Wong, King Yin, and Michael Lynn (2020), "Credit card cue effect: How Mere Exposure to Credit Card Cues Promotes Consumers' Perceived Financial Well-being and Spending," *International Journal of Bank Marketing*, 38(2), 368-383.

Xie, En, Hock-Hai Teo, and Wen Wan (2006), "Volunteering Personal Information on the Internet: Effects of Reputation, Privacy Notices, and Rewards on Online Consumer Behavior," *Marketing Letters*, 17, 61-74.

Zauberman, Gal, and John G. Lynch Jr. (2005), "Resource Slack and Propensity to Discount Delayed Investments of Time Versus Money," *Journal of Experimental Psychology: General*, 134(1), 23.

Zellermayer, Ofer (1996), "The Pain of Paying," unpublished dissertation, Department of Social and Decision Sciences, Carnegie Mellon University, Pittsburgh, PA.

Zikmund-Fisher, Brian J., and Andrew M. Parker (1999), "Demand for Rent-to-own Contracts: A Behavioral Economic Explanation," *Journal of Economic Behavior & Organization*, 38(2), 199-216.