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When payment options stand out: Payment option salience on the product page increases purchase ikelihood

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ABSTRACT

Displaying payment option information on the product page is a growing phenomenon we observed in the online retail landscape. However, research falls short in documenting how and why presenting payment option information on the product page influences consumers' purchase decisions. Across four studies, including field and online experiments, we show that making payment options salient on the product page increases purchase likelihood, because it prompts consumers to engage in mental simulation of the payment process. Online retailer website designs that enhance payment option salience on the product page, such as through the use of logos and prominently visible displays, thus can increase purchase likelihood. However, under high cognitive load the effect can be mitigated. Our findings contribute to the literature by introducing the notion of payment option salience as well as providing insights to the retailers on how to effectively communicate payment option information.

The marketplace has witnessed a rapid proliferation of payment options (PricewaterhouseCoopers, 2021; Williams, 2022), ranging from traditional methods such as cash and debit/credit cards to new-age methods like digital wallets (e.g., Google Pay) and buy now pay later services. According to a recent survey, available payment methods influence the retail choices of 7 out of 10 consumers (Pymnts, 2024), highlighting the importance for retailers of not only offering, but also effectively communicating payment method information.

Online retailers typically display payment options on the checkout page without providing any payment related information on the product page (e.g., *Amazon*; Fig. 1). However, a growing trend is to include payment option information earlier, placing it directly on the product page (e.g., *eBay*; Fig. 1). We surveyed retail managers (N = 15) about how they present payment option information on their websites. Eight managers indicated that they currently display payment options on the product page, and this practice is driven by an intuition that it might increase the conversion rate. Those who do not present such information do not see it as a priority or are uncertain about its potential impact on the product page, where there is already abundant information (see Web Appendix A for details).

To gain further insights about the display of payment methods on product pages, we conducted a field analysis of the Top 100 US Retailers in the marketplace by examining their main e-commerce websites (National Retail Federation, 2025). Our analysis revealed that 43% of these leading retailers display some form of payment method information on the product page (e.g., PayPal, Google Pay,

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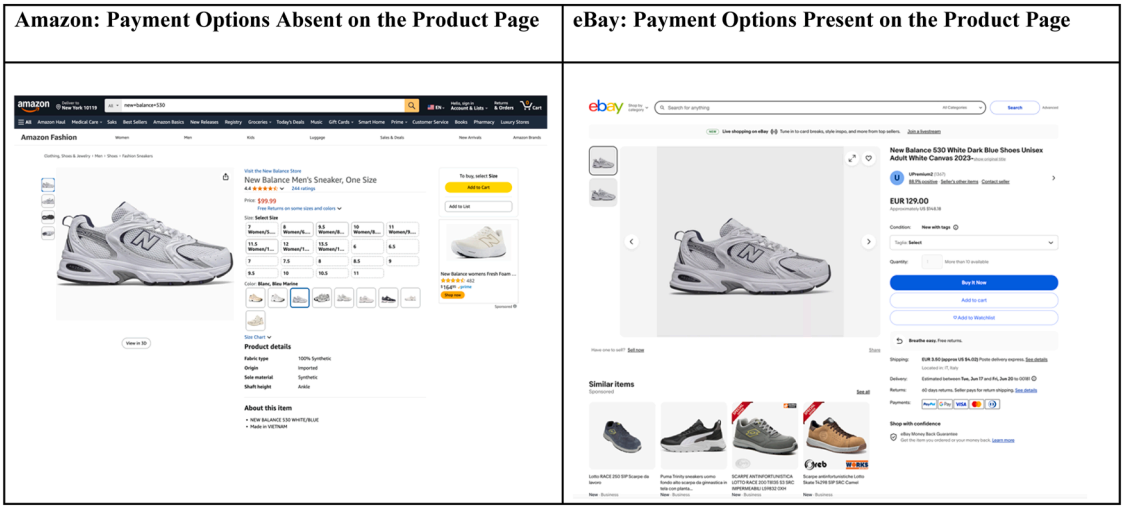

Fig. 1. Payment option information absent versus present on the product page.

Visa, Klarna, Shop Pay, etc., see Web Appendix B for further details). However, practices vary widely with companies displaying the payment method logo beneath the product information (e.g., *eBay*), using collapsible sections that users click to view information (e.g., *Gucci*), and or through textual descriptions (e.g., *Golden Goose*). Fig. 2 illustrates these three alternatives, and Web Appendix C includes more examples from the marketplace. This variation suggests a strategic value in presenting payment option information, with potential impact on conversion and basket size, but there are no clear guidelines for optimal implementation.

Building on these practical gaps, we introduce the notion of *payment option salience* and define it as the visual prominence of information about the payment options offered by the retailer. Visual prominence can be enhanced by including payment information on the product page as opposed to excluding it, using logos rather than textual descriptions, and presenting them openly instead of hiding them under collapsible bars. In this research, we explore whether and why the salience of payment option information on a retailer's product page affects consumers' likelihood of purchasing a given product.

Past work on payment methods primarily focuses on adoption (e.g., Zarco et al., 2024; Liao et al., 2014; Verkijika and Neneh, 2021) and the consequences of using different payment methods on spending behavior (e.g., Prelec and Simester, 2001; Raghubir and Srivastava, 2008; Soman, 2003). However, it is unclear whether the payment option salience affects consumers' purchase likelihood. One possible outcome of greater salience could be a decrease in consumers' willingness to purchase. Prior research suggests that making people think about spending can increase the pain of paying (Prelec & Loewenstein, 1998) and create a sense of a loss of a resource (e.g., Liu and Chou, 2020; Park et al., 2022, Soster et al., 2014). However, this is less likely in online retailing contexts because of the prevalence of "less painful" payment methods such as credit cards or digital wallets (Raghubir and Srivastava, 2008; Soman, 2003). Another possible outcome is an increase in willingness to purchase. Research suggests that making certain types of information more salient (e.g., eco-labels, Rihn et al., 2019; nutrition information, Lim et al., 2020; supply abundance, Gu and Wu, 2023) can enhance consumers' favorable responses in retail contexts. Nonetheless, this positive effect might be contingent on other pieces of information that retailers present on their webpages. In fact, our analysis of the Top 100 US Retailers suggests that product pages can contain anywhere from 4 to 10 pieces of information (e.g., product description, delivery, payment methods, etc.), which may affect consumers' cognitive load.

Building on the insight that increasing the salience of specific information makes its associated considerations more accessible (Lynch et al., 1991), we predict that enhancing the salience of payment options leads individuals to mentally simulate steps involved in the payment and increase purchase likelihood. This positive effect on purchase likelihood however depends on the cognitive load that customers experience on the product page, a contextual factor that carries high practical relevance for online retailers (e.g., Herrmann et al., 2013). Through a field experiment conducted in collaboration with an online retailer and three online experiments, we provide empirical evidence supporting these predictions, making theoretical and managerial contributions.

First, we extend the literature on online retailers' communication strategies. While previous research has studied how various aspects of retail communication can influence consumer spending (e.g., supply abundance, unit price, and discounts; Gu and Wu, 2023; Yao and Oppewal, 2016; Guha et al., 2018), our research focuses on the salience of payment option information and its impact on consumers' purchase likelihood. Second, we advance the understanding of how payment methods influence consumer behavior. Past studies on payment methods have examined the factors influencing consumers' adoption and use of specific payment methods (e.g., Zarco et al., 2024; Liao et al., 2014), and the effects of using different payment methods on spending (e.g., Prelec and Simester, 2001; Schomburgk et al., 2024). Instead, our work suggests and demonstrates that making payment options more salient on the product page increases purchase likelihood. Third, we demonstrate that this positive effect of payment option salience on consumer spending is explained by mental simulation of payment. In doing so, we extend our understanding of mental simulation beyond its established effects in marketing communication (Farace et al., 2020; Xie et al., 2016) and product visualizations (Elder and Krishna, 2012).

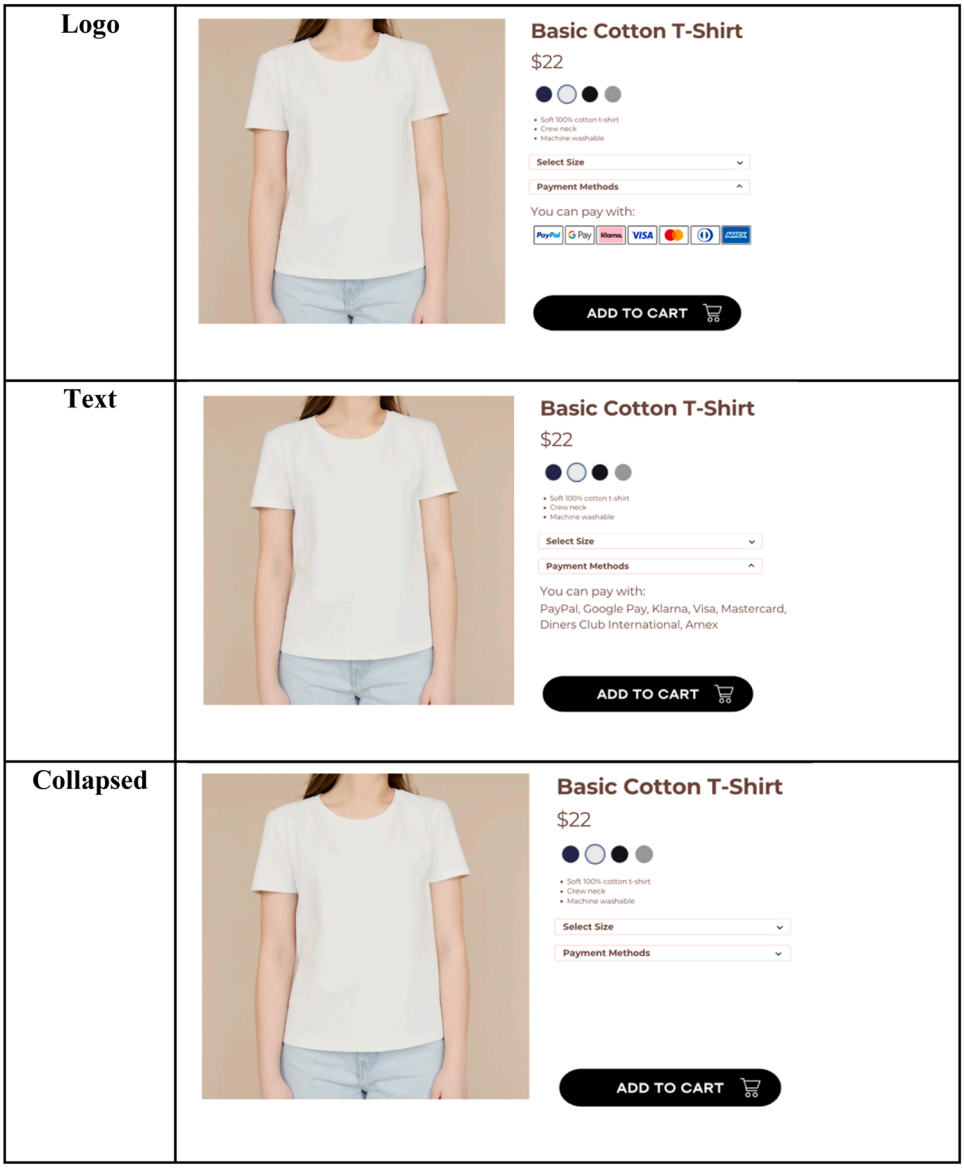

Fig. 2. Various payment option information communication strategies in the marketplace.

Further, we examine cognitive load as a boundary condition, given its documented effect on hindering mental simulation (e.g., Petrova and Cialdini, 2005) and its practical significance in online retail environments (Huang, 2000). Our findings show that the effect of payment option salience on purchase likelihood can be mitigated under high cognitive load.

Managerially, our findings reveal that online retailers can boost consumers' likelihood of purchase by increasing the salience of payment option information through prominent displays. Specifically, we show that using visible logos of payment methods on the product page, rather than non-visible or text-based displays of payment methods, can increase purchase likelihood. Furthermore, our results also suggest the need to carefully design elements in the online retail environment that might increase cognitive load. These findings contribute to recent calls in online retailing by exploring consumer responses to different communication strategies concerning payment options (Grewal et al., 2021, 2022).

1. Conceptual development

1.1. Effect of payment methods on purchase decisions

With the proliferation of payment methods, researchers have increasingly examined and demonstrated how the use of different payment methods influence consumer behavior. For example, when using credit cards rather than cash, consumers exhibit greater

willingness to pay (e.g., Prelec and Simester, 2001; Raghubir and Srivastava, 2008; Soman, 2003), experience less pain of paying (Raghubir and Srivastava, 2008), focus more on the benefits of the products (Chatterjee and Rose, 2012), and are more likely to purchase unhealthy food items (Thomas et al., 2011). More recent research has extended this line of inquiry to newer payment systems, such as mobile payments and buy-now-pay-later methods, showing similar effects on spending behavior (Boden et al., 2020; Ashby et al. 2025). Hence, this body of work has focused almost exclusively on how the use of specific payment methods shapes consumer decision-making and spending.

A related stream of research, more directly aligned with our investigation, has examined how exposure to credit card cues influences consumer behavior. In a series of experiments, Feinberg (1986) found that the presence of credit card logos increased consumers' willingness to spend. However, while some studies have replicated this effect, others have not. For example, Raghubir and Srivastava (2008, Study 1) found that participants expressed greater willingness to pay for menu items in a hypothetical restaurant when a credit card logo was present versus absent, and McCall and Belmont (1996) observed higher tipping when bill trays displayed credit card logos. In contrast, Hunt et al. (1990) and Shimp and Moody (2000) reported no significant effects of exposure to credit card cues on spending behavior. As a result, the robustness of the phenomenon remains uncertain. Table 1 provides an overview of previous research on payment methods and the unique positioning of our work. The table doesn't fit on one page anyway, so it would be better if it starts right after this sentence and continues on the next page.

Our research differs from earlier research on payment methods in three important ways. First, as we argued above, rather than examining the effects of using a specific payment method (e.g., credit cards), we focus on the salience of a set of payment options offered by the retailer in a purchase context.

Second, unlike studies on exposure to credit card cues (e.g., Feinberg, 1986; Raghubir and Srivastava, 2008; Study 1) that examined how the mere appearance of a credit card influences consumer responses, our research focuses on payment option salience, which is the visual prominence of information about the payment options offered by the retailer. Although exposure and salience are related, they are conceptually distinct. Exposure refers to contact with a stimulus (Hoyer, McInnis, Pieters, 2020), whereas salience reflects the extent to which that stimulus stands out, captures attention, and becomes cognitively accessible (Higgins, 1996; Kahneman and Frederick, 2002; Taylor et al., 1979; Taylor and Thompson, 1982). While exposure is necessary for salience, it does not guarantee it. For instance, research on banner blindness shows that consumers can fail to attend to banner ads that they are exposed to (Drèze and Hussherr, 2003). The distinction between exposure and salience becomes particularly clear in the presence of other competing stimuli. In online retail contexts, where product pages contain multiple informational elements, such as price, delivery, and product details, mere exposure to payment information does not ensure that consumers will notice or process it. While research on exposure to credit card cues does not differentiate between different presentation formats (e.g., textual vs. image-based) or the amount of other competing information in the environment, our research highlights that such variations meaningfully alter the degree of salience.

Third, we propose a novel psychological mechanism. Increasing the salience of payment options on the product page of an online retailer triggers the mental simulation of payment, activating thoughts related to initiating the payment process, such as considering one's preferred payment method or imagining entering payment details. So far, research on payment methods showed that payment is associated with a negative affect driven by either an anticipation or experience of the loss of financial resources, referred to as pain of paying (Zellermayer, 1996). While this psychological mechanism would predict a negative impact of payment option salience on purchase likelihood, we do not expect pain of paying to be triggered in online retailing settings because of their two critical features. First, in an online retailing setting where consumers explore products to be purchased, they may focus more on the benefits of a potential purchase rather than the loss of financial resources (e.g., Thomas et al., 2011). Second, payment options offered by online retailers (e.g., credit cards, digital wallets) are less likely to trigger the pain of paying in the first place (for a review, Reshadi and Fitzgerald, 2023, Schomburgk et al., 2024). Therefore, we reason that prominently displaying the available payment options on the product page will be unlikely to evoke pain of paying. Rather, we propose that this practice will prompt consumers to start considering how they would pay while they are still deciding whether to purchase a given product.

1.2. Payment option salience

During a purchase decision, consumers need to consider and evaluate multiple factors, including the brand, product features, quality, and price, as well as payment options, delivery timelines, and return policies. Given consumers' limited cognitive capacity, it is unlikely that they systematically attend to and process all available information before making a choice (Camerer and Loewenstein, 2004; Hoyer, 1984; Pennycook et al., 2021). Instead, consumers tend to pay more attention to the most salient, or visually prominent, information in the environment, which, in turn, exerts a disproportionate influence on their evaluations and decisions (Higgins, 1996; Kahneman and Frederick, 2002; Taylor et al., 1979; Taylor and Thompson, 1982).

In retail environments, various factors can influence the salience of information. While the mere presence (vs. absence) of information is a commonly used method for increasing salience (Clement et al., 2015; Gu and Wu, 2023; Miyazaki et al., 2000; Yao and Oppewal, 2016; Krishna et al., 2002), additional factors such as size (Bhattacharyya et al., 2023; Lunardo and Saintives, 2013), brightness (Reynolds-McIlnay et al., 2017), and spatial placement (Chandon and Wansink, 2002; Clement et al., 2015; Lim et al., 2020) further influence what consumers notice and attend to during the purchase decision process. Another important factor that affects visual salience is vividness (Nisbett and Ross, 1980; Taylor and Thompson, 1982). Some presentation formats, such as pictures or logos, are inherently more vivid than others like plain text, increasing the salience of the presented information and drawing disproportionate attention (Morgan et al., 2021; Pieters and Wedel, 2004; Rihn, Wei, and Khachatryan, 2019). Table 2 presents a review of selected retail literature examining the effects of salience on consumer behavior. Importantly, our study offers the first theoretical and empirical assessment of payment option salience and its impact on consumer behavior in the context of online retailing.

Table 1
Overview of prior research on payment methods and spending behavior.

Source	Main Findings	Method	Independent Variable	Dependent Variable	Mechanism
Feinberg (1986)	Exposure to credit card cues increased the estimated willingness to pay.	Observational data, Lab experiment	Presence (vs. absence) of credit card cues	Willingness to pay, spending amount	Conditioning (not empirically tested)
Hunt et al. (1990)	Exposure to credit card cues had no significant effect on willingness to pay.	Lab experiment	Presence (vs. absence) of credit card cues	Willingness to pay	Conditioning (did not find empirical evidence)
Hirschman (1979)	Possession of a bank (store) card was positively related to in-store spending amount.	Secondary interview data	Payment method (bank card, store card, cash)	Spending amount (basket size)	Anticipated future income, discounted value of time, time value of money (not empirically tested)
McCall and Belmont (1996)	Exposure to credit card cues increased tipping at restaurants.	Field experiment	Presence (vs. absence) of credit card cues	Spending amount	Conditioning
Monger and Feinberg (1997)	Using a credit card, compared to other payment methods, increased willingness to pay.	Lab experiment	Payment method (cash, check, credit card, or no specified method)	Willingness to pay	Reference price formation
Prelec and Simester (2001)	Credit card usage increased willingness to pay, but credit card logo exposure had no effect.	Lab experiment	Payment methods (cash vs. card) X Card cues (present vs. absent)	Willingness to pay	Conditioning (did not find empirical evidence)
Shimp and Moody (2000)	Exposure to credit card cues had no significant effect on willingness to pay.	Lab experiment	Presence (vs. absence) of credit card cues	Willingness to pay	Conditioning (did not find empirical evidence)
Soman (2001)	Using a credit card (vs. a check) increased purchase intentions.	Lab experiment	Payment method (credit card vs. check)	Purchase likelihood	Rehearsal of the price paid, immediacy of wealth depletion
Soman (2003)	Credit cards increased spending compared to cash.	Quasi-experiment (Study 3)	Payment method (pre-paid/credit card vs. cash)	Spending amount	Payment transparency, pain of paying
McCall et al. (2004)	Exposure to credit card cues increased tipping.	Lab experiment	Presence (vs. absence) of credit card cues	Spending amount	Impression management
Raghubir and Srivastava (2008)	Exposure to credit card cues increased the estimated willingness to pay.	Lab experiment (Study 1)	Presence (vs. absence) of credit card logo, and Payment method	Willingness to pay	No mechanism was proposed or tested for Study 1 finding
Inman et al. (2009)	Paying by check or with credit card, compared to cash, increased unplanned purchases.	Field study (transaction data)	Payment method (cash, credit card, check)	Likelihood of an unplanned purchase	Pain of paying
Moore and Taylor (2011)	Using debit or credit card with logo, compared to cash, increased willingness to pay.	Lab experiment	Payment method (e.g., cash, credit card, debit card with logo)	Willingness to pay	No mechanism was proposed or tested
Thomas et al. (2011)	Using credit card, compared to cash, increased the likelihood of buying unhealthy foods.	Field data and lab experiments	Payment method (credit card vs. cash)	Rate of unhealthy food purchase	Pain of paying
Chatterjee and Rose (2012)	Credit card (vs. cash) priming increased focus on product benefits and willingness to pay.	Lab experiment	Payment method primes (credit card vs. cash)	Product evaluation, willingness to pay	Activation of different associations
Falk et al. (2016)	Mobile payments (vs. cash) increased store price perceptions and spending.	Lab experiment	Payment method (cash, credit card, mobile payment)	Store price image, willingness to pay	Payment transparency
Boden et al. (2020)	Mobile payments (vs. credit cards) increased willingness to pay.	Online experiment	Payment method (cash, credit card, mobile payment)	Willingness to pay	Convenience
Liu and Dewitte (2021)	Credit card usage had no significant effect on any spending measures.	Online and lab experiment	Payment method (cash, credit card, mobile payment)	Willingness to pay, spending amount	Pain of paying, convenience
Ashby et al. (2025)	Buy-now-pay-later increased consumer spending compared to credit cards.	Field data and lab experiments	Payment method (BNPL, credit card)	Purchase intention, spending choice	Perceived expensiveness
Kumar et al. (2024)	Buy-now-pay-later increased consumer spending.	Field data	Payment method (adoption of BNPL)	Online order size	Anticipation of immediate benefits and shifting costs into the future (not empirically tested)
Maesen and Ang (2025)	Buy-now-pay-later increased consumer spending.	Field data and lab experiments	Payment method (installment vs. lump sump payment)	Spending	Perceived financial constraints
Current research	Making payment options more salient on the product page increased purchase likelihood in online retail settings.	Field experiment, online experiment	Salience of payment options (presence vs. absence; logo vs. text)	Purchase likelihood	Mental simulation of payment

Table 2
Selected retailing research on the effects of salience on consumer behavior.

Source	Relevant Findings	Salient Element in Retailing	Salience Manipulation	Mechanism
Miyazaki et al. (2000)	The presence of unit price information led consumers to prefer lower-priced items, reducing grocery spending.	Unit price	Presence (vs. absence) of stimuli	Unit price awareness at the store level
Yao and Oppewal (2016)	The presence of unit prices increased consumers' price-sensitivity, increasing the motivation to select cheaper products.	Unit price	Presence (vs. absence) of stimuli	Price consciousness, motivation to buy cheaper options
Gu and Wu (2023)	Making supply abundance information salient increased consumers' preference for shopping at small-assortment retailers.	Supply abundance	Presence (vs. absence) of stimuli	Sense of personal control
Bhattacharyya et al. (2023)	Larger fonts made price discounts more salient, leading consumers to perceive greater discounts and increasing purchase intentions.	Price discount	Size of stimuli	Perceived discount depth
Lunardo and Saintives (2013)	Perceived naturalness was higher when there was consistency between the salience of the natural claim and the point of purchase.	Naturalness claim	Size of stimuli	Perceived credibility
Reynolds-McIlnay et al. (2017)	Products with greater brightness contrast were more visually salient and tend to be more preferred by consumers.	Product	Brightness of stimuli	Visual attention and perceived pleasantness
Rihn et al. (2019)	Eco-labels presented as logos (vs. text) were more visually salient and led to higher consumer attention and product evaluations.	Label	Format of stimuli (text vs. logo)	Visual attention
Pieters and Wedel (2004)	Pictorial elements of an ad were more visually salient and captured a greater share of consumer attention compared to textual elements.	Ad element	Format of stimuli (text vs. image)	Attention capture and transfer
Morgan et al. (2021)	Image-based logos were more perceptually fluent than text-based logos and enhanced processing ease among consumers familiar with the brand.	Logo	Format of stimuli (text vs. image)	Processing fluency
Krishna et al. (2002)	When offering national brands on deals, presenting manufacturer suggested price increased perceived savings from deals.	External reference price	Presence (vs. absence) of stimuli	Perceived savings
Clement et al. (2015)	Presence (vs. absence) of signage increased attention.	Visual	Presence (vs. absence) and spatial placement of stimuli	Visual attention
Chandon and Wansink (2002)	Top-shelf (eye-level) placement increased salience and led to higher product consumption.	Product	Spatial placement of stimuli	Product salience
Lim et al. (2020)	Front-of-package labels increased the salience of nutritional information compared to back or side placement.	Nutrition label	Spatial placement of stimuli	Nutrition information salience
Current research	Making payment options more salient on the product page increased purchase likelihood in online retail settings.	Payment option salience	Presence (vs. absence) of stimuli, format of stimuli (text vs. image)	Mental simulation of payment

Building on past research that defines salience as the visual prominence of a stimulus (e.g., Taylor et al., 1979), we focus on payment option salience which we define as the visual prominence of information about the payment options offered by the retailer. In examining online retail environments, we observe a variation in practices: while some retailers do not present any payment option information on the product page, others present it using various formats, such as logos or textual descriptions. Additionally, some retailers display the offered payment options openly by default, whereas others hide them under collapsible bars (see Appendix C). We propose that these different design choices can make payment options more or less salient to customers, with implications for consumer purchase decisions (e.g., adding a product to their cart).

Specifically, we propose that the presence (vs. absence) of payment option information on the product page, presented through the use of prominent (vs. hidden) displays, will increase the salience of payment options. Moreover, presenting payment information using logos rather than text-based descriptions will also enhance its salience. This is because information displayed on product pages is predominantly text-based, aside from the product image. For instance, details about product features, shipping, and return policies are typically presented in written format. As a result, and in line with the image superiority effect (Childers and Houston 1984), presenting payment information in text form is unlikely to increase its salience. In contrast, using logos of payment options creates a greater visual contrast against the surrounding text-based information (Nisbett and Ross, 1980; Pieters and Wedel, 2004; Reynolds-McIlnay et al., 2017), making the payment information stand out more prominently and enhancing its salience.

1.3. Mental simulation of payment

Enhancing the salience of certain information increases the cognitive accessibility of associated considerations (Lynch et al., 1991). We predict that the increased salience of payment options on the product page prompts consumers to consider the payment process, mentally simulating the payment, as they are evaluating whether to buy the given product. Mental simulation refers to the cognitive process of mentally rehearsing or visualizing a series of events, such as imagining future events or rehearsing the actions necessary to

achieve a goal (Farace et al., 2020; Pham and Taylor, 1999; Taylor et al., 1998). Mental simulation can be activated by visual stimuli (Barsalou, 2008; Elder and Krishna, 2012; Xie et al., 2016), such as imagining grasping a mug when viewing its handle (Tucker and Ellis, 1998), simulating the motion of using a hammer when seeing its image (Chao and Martin, 2000), or mentally simulating eating when exposed to food visuals (Elder and Krishna, 2012; Petit et al., 2022).

Just as consumers automatically engage in mental simulation when exposed to action-relevant stimuli they have previously encountered (i.e., theory of grounded cognition; Barsalou, 2008), we argue that being exposed to information on the available payment options can similarly prompt consumers to mentally simulate the payment process (e.g., considering their preferred payment method, imagining entering payment details, initiating payment). Most consumers have multiple payment methods and therefore have frequent prior experience selecting a preferred payment method during purchases, a process that typically begins with receiving information about available payment options. As such, the salient display of payment options is likely to reactivate prior experiences stored in memory or to trigger the mental simulation of the payment process (Barsalou, 2008).

Mental simulations of motor actions mimic the pre-execution stages of those actions (Jeannerod, 1994, 2001), suggesting that mentally simulating a behavior can serve as a substitute for the behavior itself (Kappes and Morewedge, 2016) and can evoke consequences of that behavior (Morewedge et al., 2010; Larson et al., 2014). For instance, repeatedly mentally simulating food consumption can lead to feelings of satiation and a subsequent reduction in the desire to eat, mirroring the consequences of actual food consumption (Morewedge et al., 2010). Similarly, when consumers mentally simulate a behavior, they become more likely to engage in that behavior (Ceylan et al., 2024). In line with these findings, we argue that mentally simulating the payment process can increase purchase likelihood since customers already feel like they have initiated the payment process.

Table 3
Overview of studies.

Objectives and Context	Design	Dependent Variable	Key Findings	Summary Statistics
Study 1 (Apparel Retail) To get first insights through a collaboration with an online apparel retail	Field experiment with a 2 (content format: text, logo) x 2 (display mode: collapsed, open) between-subjects design	Total number of products added to the cart	Presenting payment option information with logos in an open display resulted in the highest number of products added to the cart.	$\beta_{open*logo} = .321$ (SE = 0.111), $p < .01$
Study 2 (Shirt) To replicate the field findings in a controlled setting and rule out potential mechanisms related to retailer perceptions	Online experiment with a one factor (payment option salience: high salience vs. low salience). Operationalization of salience: open vs. collapsed payment option information section	Purchase likelihood (7-point Likert scale)	Salience of payment option information led to higher purchase likelihood. The effect cannot be explained by retailer perceptions.	$M_{high\ salience} = 4.98$, $SD_{high\ salience} = 1.73$; $M_{low\ salience} = 4.51$, $SD_{low\ salience} = 1.48$; $F(1, 199) = 4.38$, $p = .038$, $d = 0.29$, 95% CI = [0.01, 0.57]
Study 3 (Headphones) To test the proposed underlying mechanism, and replicate the findings with a different salience manipulation and different product category	Online experiment with a one factor (payment option salience: high salience vs. low salience). Operationalization of salience: presence vs. absence of a payment option information	Purchase likelihood (7-point Likert scale)	Salience of payment option information prompted consumers to mentally simulate the payment, which increased purchase likelihood.	$M_{high\ salience} = 3.53$, $SD_{high\ salience} = 1.84$; $M_{low\ salience} = 2.60$, $SD_{low\ salience} = 1.57$; $F(1, 282) = 19.62$, $p < .001$, $d = 0.53$, 95% CI = [0.29, 0.77]
Study 4 (Headphones) To test a boundary condition and replicate the findings with a different salience manipulation	Online experiment with a 2 (payment option salience: high salience vs. low salience) x 2 (cognitive load: high vs. low). Operationalization of salience: presence vs. absence of payment option information section. Operationalization of cognitive load: presence vs. absence of technical product details	Purchase likelihood (7-point Likert scale)	The effect of the salience of payment option information on purchase likelihood was mitigated under high cognitive load.	$M_{high\ salience\_low\ load} = 3.72$ $SD_{high\ salience\_low\ load} = 1.97$ $M_{low\ salience\_low\ load} = 2.47$ $SD_{low\ salience\_low\ load} = 1.60$ $M_{high\ salience\_high\ load} = 3.06$, $SD_{high\ salience\_high\ load} = 1.90$; $M_{low\ salience\_high\ load} = 2.95$, $SD_{low\ salience\_high\ load} = 1.86$ Interaction ($F(1, 359) = 8.495$, $p = .004$, $d = 0.43$, 95% CI = [0.20, 0.63])

1.4. Cognitive load in online retail environments

Our theorizing suggests that any factor that disrupts the mental simulation of payment can weaken the effect of payment option salience on purchase likelihood. We propose that cognitive load is one such factor, as past research has shown it can impair consumers' ability to engage in mental simulation (Elder and Krishna, 2010). This limitation arises because mental simulation requires cognitive effort, and given that cognitive resources are finite, allocating them to processing other types of information limits the resources available for engaging in mental simulation (Jia et al., 2017; Petrova and Cialdini, 2005; Shiv and Huber, 2000; de Visser-Amundson et al., 2021). For example, Jia et al. (2017) found that under high cognitive load, consumers are less able to generate mental images of themselves benefiting from a fictitious energy drink. Similarly, Petrova and Cialdini (2005) demonstrated that high cognitive load diminishes the positive impact of mental imagery on product attitudes and purchase intentions. The negative impact of cognitive load on mental simulation is further supported by research showing that individuals are not able to elaborate on information they receive when their cognitive resources are already occupied (e.g., Drolet and Aaker, 2002; Gilbert et al., 1988; Shiv and Fedorikhin, 1999).

Recognizing these implications of cognitive load on consumers' decisions is particularly important for retailers, since retail environments often contain multiple elements that can contribute to increased cognitive load. For example, visual complexity in service environments (Orth and Wirtz, 2014), a complex scent in the retail atmosphere (Herrmann et al., 2013), or choices among options with multiple attributes (Gourville and Soman, 2005) can influence how consumers process information. Importantly, research shows that information complexity on a shopping site can also influence cognitive load (Huang, 2000). In fact, our analysis of Top 100 US Retailers shows that the amount of information provided on product pages can vary. While some online retailers only provide few pieces of information such as product name, picture, description, and price, others present additional details on shipping, loyalty programs, customer reviews, and complementary items (see Appendix B). We predict that the effect of payment option salience on purchase likelihood will be mitigated when customers experience high cognitive load.

1.5. Overview of studies

We empirically test our predictions in a series of four studies, using different operationalizations of payment option salience such as the presence versus absence of payment method information, using prominent versus hidden displays, or communicating payment method information through texts or visuals on the product page. Table 3 includes a summary of the key characteristics of each study. In our online experiments, we aimed for a sample size that would provide us with a with at least 80% power to detect an effect size of $d = .40$, as we established in a pilot (see Web Appendix D). Accordingly, we recruited approximately 100 participants per cell.

1.6. Study 1

To examine the effect of the salience of payment option information in the real world, we conducted a field experiment in collaboration with an online retailer. Companies adopt various design strategies to present available payment methods, including the use of logos and text, which can appear in sections that may be set to display openly by default or require user interaction to display the information. These different design choices can make the payment options more or less salient on the product page, and we predict that increasing their salience by presenting them using prominent (vs. hidden) displays and logos (vs. text-based descriptions) will increase customers' willingness to add a product to their cart.

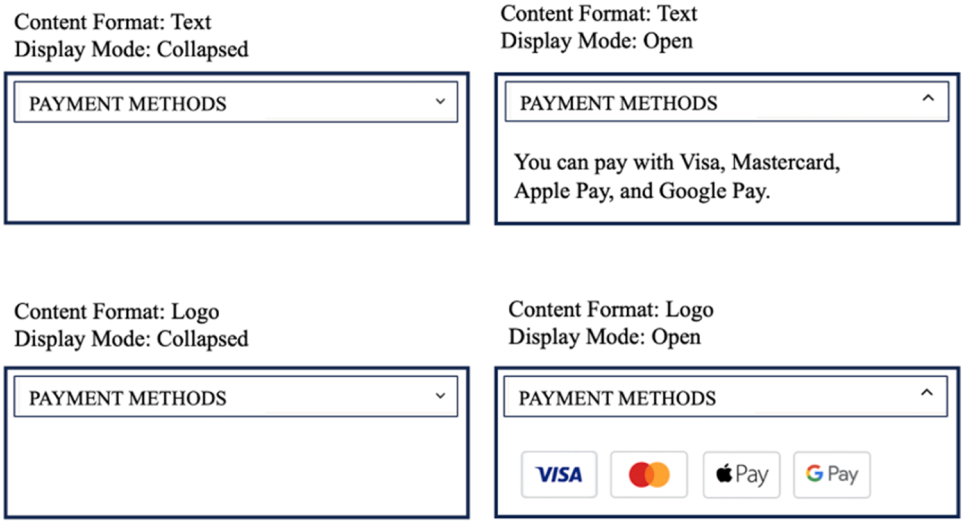

Fig. 3. Illustration of display mode and content format manipulations in study 1.

1.6.1. Method

We collaborated with a fashion apparel brand that sells its products both in physical stores and through its e-commerce website. The e-commerce platform presents the payment methods on the product page inside a section that is collapsed by default but can be expanded by the user. If users click to expand that section, they see the available payment methods presented in text format. On that product page, users also decide whether to add the product to the cart, which enables them to purchase it on the subsequent page.

Reflecting our research interest and the company's preferences, we implemented a field experiment with a 2 (content format: text, logo) x 2 (display mode: collapsed, open) between-subjects design. Therefore, our field study introduced three alternative payment method displays, in addition to the retailer's current, collapsed text version. The first alternative version presented the payment methods in text format, but the expandable section remained open by default. The second version also kept the expandable section open by default but presented the payment methods using logos. The third version kept the expandable section collapsed by default with the payment methods displayed as logos (Fig. 3). Visitors were randomly assigned to one of these four conditions when they started a shopping session on the website. Since open mode (vs. collapsed mode), and logo (vs. text) descriptions are more salient displays of payment option information, we predicted that these displays will increase consumers' likelihood of adding the products to their carts.

We collected data for one week, from January 16 to January 22, 2024. The company provided the data as a Google Analytics data output, containing 4,497 observations of *viewed products*. This means that we did not have access to data at the customer level (e.g., we were unable to see things such as cart abandonment, time spent on website, or previous purchases) due to privacy regulations; instead, the company provided aggregated data at the product and device level. For each product (e.g., jacket) and device (pc, tablet, phone), we had the number of products that had been added to the cart in each of the four conditions. Observations (rows) at the product level indicated the number of times a specific product (e.g., jacket) was added to the cart in each of the four payment option conditions.

1.6.2. Variables

The key dependent variable is the number of products added to the cart. We use this variable because the "add to cart" button was on the product page, where each of the four conditions was displayed. The independent variables include one dummy variable for the display mode (1 = open, 0 = collapsed) and another dummy variable for the content format (1 = logo, 0 = text). The average number of products added to the cart in the collapsed logo condition is 1.104, in the open logo is 1.591, in the collapsed text is 1.175, and in the open text condition is 1.204. We control for the device (mobile, laptop, tablet), the product category (e.g., clothes, bags, hats, accessories, and others), and the number of times that the product was viewed. Because the dependent variable is an overdispersed count variable (Mean = 1.26, SD = 8.6), we use a negative binomial regression (Mafael, 2019). We find no evidence of multicollinearity, because all the variance inflation factor (VIF) values fall below 2, and we use robust standard errors.

1.6.3. Results

We provide the interaction model and contrasts across conditions. The interaction model (using collapsed-text as a baseline), shows a positive and significant interaction effect of mode and format ($\beta_{open*logo} = .321$, $p < .01$, Table 4). To have a better understanding of the effect size we can transform the interaction coefficient to the incidence rate ratio (IRR). The coefficient of 1.379 means that customers in the open-logo condition, consumers were 37.9% more likely to add a product to their cart relative to the collapsed-text condition (baseline). Furthermore, the open-text ($\beta_{open\text{-}text} = -.814$, $p > .1$) and the collapsed-logo conditions ($\beta_{collapsed\text{-}logo} = -.059$, $p > .1$) were not significantly different from the collapsed-text condition. The effects remain robust even when we control for the number of

Table 4
Study 1 Results, negative binomial regression.

	Interaction			
IV's	IRR	Coeff.	Sig.	SE
Intercept	0.215	-1.536	***	0.073
Open	0.443	-0.814		0.08
Logo	0.943	-0.059		0.079
Open*Logo	1.379	0.321	**	0.111
Controls				
Viewed Products	1.030	0.03	***	0.001
Device (desktop)	1.175	0.161	**	0.06
Device (tablet)	0.152	-1.886	***	0.269
Product (bags)	0.968	-0.033		0.15
Product (hats)	1.713	0.538	***	0.063
Product (accessories)	0.670	-0.4	**	0.149
Product (others)	1.182	0.167		0.125
AIC	11890			
R2 Max. Likelihood	0.188			
Chi^2	933.49 ($p < .001$)			
N	4,497			

Note. The dependent variable is the number of items added to carts. We do not report coefficients for product category for parsimony.
*** $p < .001$
** $p < .01$
* $p < .05$.

products viewed (i.e., products viewed more frequently in a given condition might be more likely to be added to the cart), the device (i.e., customers add more products when using desktop computers), and product category (i.e., relative to clothes, hats are more likely to be added to cart).

Fig. 4 shows the contrasts across conditions, indicating the predicted number of added products to the cart in each of the conditions. We find that the combination of open-logo condition results in a higher number of products added to the cart compared to open-text (Ratio = .769, SE = .059, z.ratio = 3.371; $p < .01$), and collapsed-logo (Ratio = .735, SE = .057, z.ratio = 3.927; $p < .001$). However, in the collapsed conditions we do not see a significant difference between logo and text formats. Our explanation for the absence of an effect of logo in the collapsed condition, is that a large portion of customers might have never seen the logo because they did not open the expandable section containing payment option information. Unfortunately, the company was unable to provide us with specific data on whether customers expanded the payment options section.

The results of our field study provide important insights. First, we find that displaying the payment methods with logos and in an open fashion on the product page leads to more products being added to the cart, relative to all other presentation alternatives (open-text, collapsed-logo, collapsed-text). Second, the open-text condition does not perform significantly better than the collapsed-text or collapsed-logo conditions. This finding is consistent with past research showing that visual formats, which are more vivid (Lurie and Mason, 2007; Nisbett and Ross, 1980; Taylor and Thompson, 1982) and create stronger contrast with surrounding elements, tend to be more salient (Jarvenpaa, 1990; Reynolds-McIlnay et al., 2017). In our study, presenting payment information in text format may not have created sufficient visual contrast against the surrounding text-based information on the product page (e.g., information on product features, shipping, and return policies), thereby limiting its salience and its effect on purchase intentions.

1.7. Study 2

The primary objective of Study 2 is to replicate our main finding that the salience of payment options influences consumers' purchase likelihood in a more controlled setting. With this goal, we designed product page visuals mimicking that of online retailers and manipulated payment option salience. In addition, we explored whether the salience of payment options also shapes consumers' perceptions of the retailer.

1.7.1. Method

Two hundred and one participants took part in the study (Prolific, 50.7% female, M_{age} = 35.0 years). The study employed one-factor between-subjects design (payment option salience: high salience vs. low salience). At the beginning of the survey, all participants indicated their gender and imagined shopping for a few wardrobe essentials from an online retailer. They were then randomly assigned to one of the two conditions and shown a product page featuring a blue shirt. In line with Study 1, we operationalized payment option salience using an open versus collapsed section labeled "Payment Methods". In the high salience condition, this section was open by default, prominently displaying the payment options offered by the retailer. In the low salience condition, the section was collapsed, making the payment options not visible. In line with Sun, Bellezza, and Paharia (2021), we also matched respondents' gender to the gender of the model featured on the product page displayed to increase relevance (Fig. 5).

After viewing the product page, participants indicated how likely they would be to purchase the shirt on a 7-point scale (1 = "very unlikely," 7 = "very likely"). They then responded to questions measuring their perceptions of the retailer. Specifically, they reported the extent to which they found the shopping experience convenient (11-point semantic differential scales; 1= "extremely inconvenient", 11= "extremely convenient"; Benoit et al., 2024), perceived the retailer as credible (five 7-point semantic differential scales;

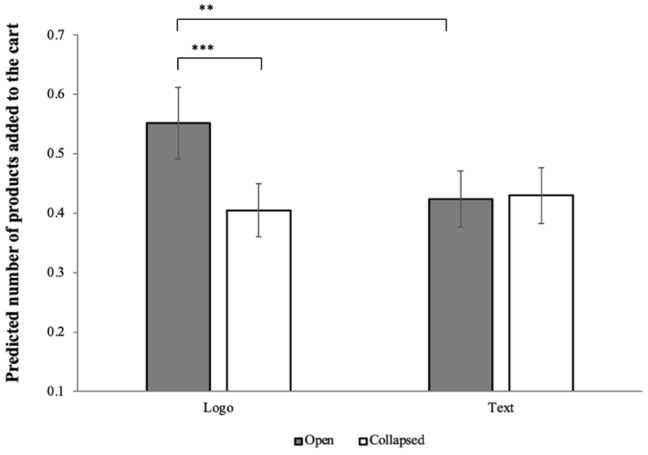

Fig. 4. Interaction of content format and display mode on predicted number of products added to the Cart.
Note. Graph displays predicted values for the number of products added to the cart across conditions. * $p < .05$, ** $p < .01$, *** $p < .001$. The discrepancies between the raw and predicted mean values are due to the covariate adjustments, the log link function of negative binomial, and the overdispersion parameter that defines the mean–variance relationship for count data.

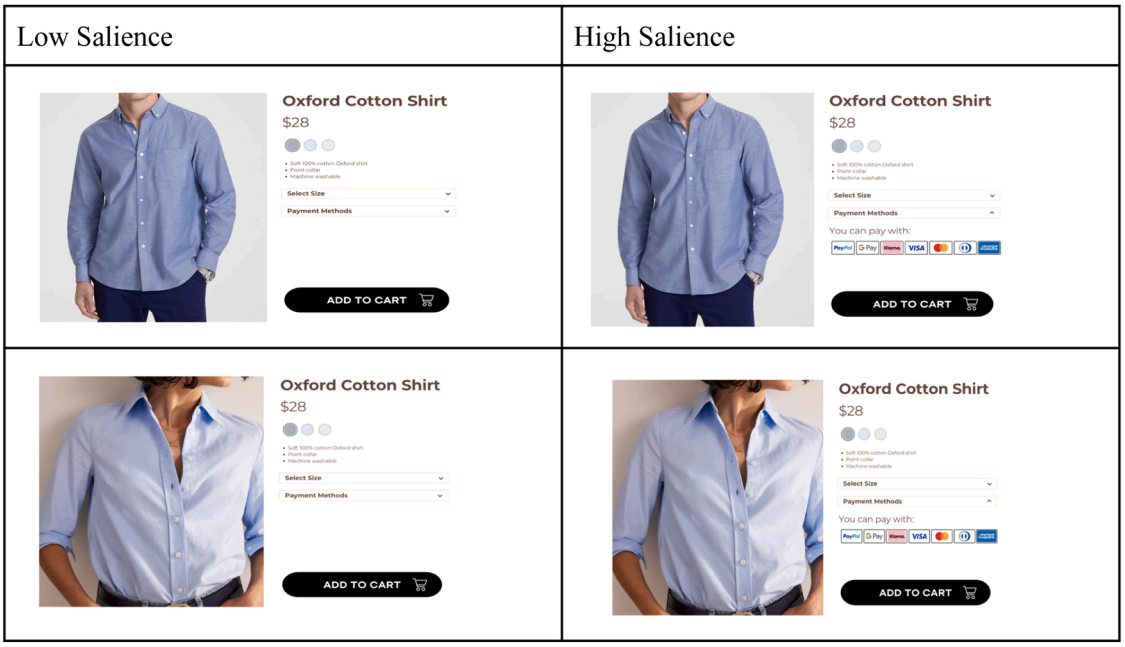

Fig. 5. Stimuli used in study 2.

"very sincere/insincere," "very honest/dishonest," "very dependable/undependable," "very trustworthy/untrustworthy," " high credibility/low credibility"; Bobinski et al., 1996), and made different inferences about the motives of the retailer (3-point semantic differential scale; 1 = "to serve society or consumers"; 3 = "to make money, regardless of the effect on others"; Bhattacharjee et al., 2017), in a randomized order. Finally, participants indicated their age, income, and the payment methods they use (see Appendix E for additional details).

1.7.2. Results

Purchase likelihood. A one-way ANOVA reveals that participants in the high salience condition were more likely to purchase the shirt than those in the low salience condition ($M_{\text{high salience}} = 4.98$, $SD_{\text{high salience}} = 1.73$; $M_{\text{low salience}} = 4.51$, $SD_{\text{low salience}} = 1.48$; $F(1, 199) = 4.38$, $p = .038$, $d = 0.29$, 95% CI = [0.01, 0.57]). That is, greater payment option salience increased consumers' purchase likelihood.

Retailer perceptions. We ran multiple one-way ANOVAs to test whether the salience of payment options influence the perceived characteristics of the retailers. Results showed that salience of payment options did not have a significant effect on the perceived credibility of the retailer ($M_{\text{high salience}} = 5.13$, $SD_{\text{high salience}} = .1$; $M_{\text{low salience}} = 5.09$, $SD_{\text{low salience}} = .98$; $F(1, 199) = .122$, $p = .727$; $\alpha = .93$), the perceived motives of the retailer ($M_{\text{high salience}} = 2.10$, $SD_{\text{high salience}} = .69$; $M_{\text{low salience}} = 2.06$, $SD_{\text{low salience}} = .75$; $F(1, 199) = .161$, $p = .689$), or the perceived convenience of shopping with the retailer ($M_{\text{high salience}} = 8.49$, $SD_{\text{high salience}} = 2.03$; $M_{\text{low salience}} = 8.22$, $SD_{\text{low salience}} = 2.00$; $F(1, 199) = .917$, $p = .340$).

Study 2 provides further evidence for our finding that the salience of payment option information increases purchase likelihood. Further, it rules out potential explanations related to the perceptions of the retailer.

1.8. Study 3

The primary objective of Study 3 is to test the proposed mechanism underlying the effect of payment option salience on purchase likelihood. We propose that the payment option salience triggers mental simulation of the payment. This is because simulation of payment can make people feel as if they have already paid for the product, increasing consumers' purchase likelihood.

1.8.1. Method

We aimed to collect data from 300 Prolific participants. A total of 304 participants completed the survey. As per our preregistration, we excluded 20 participants who failed the attention check which asked them to indicate whether the product description page they viewed displayed payment option information (Yes/No), resulting in a final sample of 284 participants (https://aspredicted.org/mv6c-557h.pdf, Prolific, 51.6% female, $M_{age} = 40.12$ years). Including them did not change the results (see Appendix F).

The study employed one-factor between-subjects design (payment option salience: high salience vs. low salience). All participants were asked to imagine considering purchasing headphones and found a pair that they liked priced at $360. Participants in the high payment option salience condition viewed the logos of payment options offered by the retailer as they were viewing the product description, while participants in the low salience condition did not see the payment option information. All participants indicated

how likely they would be to purchase the headphones on a 7-point scale (1 = "very unlikely," 7 = "very likely"). Afterwards, they rated the extent to which they engaged in mental simulation of the payment process using three items, also on 7-point Likert scales ("I thought about which payment option would be best for this purchase," "I visualized myself using my preferred payment option," and "I mentally went through the steps of entering payment details"; $\alpha = .91$).

1.8.2. Results

Purchase Likelihood. A one-way ANOVA reveals that participants in the high payment option salience condition were more likely to purchase the headphones than those in the low salience condition ($M_{\text{high salience}} = 3.53$, $SD_{\text{high salience}} = 1.84$; $M_{\text{low salience}} = 2.62$, $SD_{\text{low salience}} = 1.57$; $F(1, 282) = 19.62$, $p < .001$, $d = 0.53$, 95% CI = [0.29, 0.77]).

Mental Simulation. A one-way ANOVA reveals that participants in the high payment option salience condition were more likely to simulate paying for the headphones than those in the low salience condition ($M_{\text{high salience}} = 3.97$, $SD_{\text{high salience}} = 1.86$; $M_{\text{low salience}} = 2.21$, $SD_{\text{low salience}} = 1.69$; $F(1, 282) = 68.49$, $p < .001$, $d = 0.99$, 95% CI = [0.74, 1.24]).

Underlying Mechanism. We tested the proposed mediation model using PROCESS Model 4 (Hayes, 2018), with 10,000 bootstrapped samples. The model includes the salience of payment options (0 = low salience, 1 = high salience) as the independent variable, purchase likelihood as the dependent variable, and mental simulation of payment as the mediator. Mediation analysis revealed that the salience of the payment options increased participants' mental simulation of payment ($\beta = 1.76$, $t = 8.28$, $p < .0001$, 95% CI = [1.34, 2.18]), which in turn increased their purchase likelihood ($\beta = .46$, $t = 8.98$, $p < .0001$, 95% CI = [.36, .56]). The indirect effect of the salience of payment options on purchase likelihood through mental simulation of payment was significant ($\beta = .81$, $SE = .15$, 95% CI = [.53, 1.12]). The direct effect of payment methods salience on purchase likelihood was no longer significant ($\beta = .11$, $t = .53$, $p = .596$, 95% CI = [-.29, .51]), suggesting full mediation (see Fig. 6 for path coefficients).

Study 3 thus replicates our previous findings with a different payment option salience manipulation and in a different product category. More importantly, it provides evidence in support of the theorized process: the effect of the salience of payment options on purchase likelihood is driven by mental simulation of the payment process.

1.9. Study 4

The main objective of Study 4 is to test a boundary condition. In Study 3, we showed that the salience of payment options triggers mental simulation of the payment process. Our theorizing indicates that impeding this mental simulation may attenuate the effect. We test this prediction in Study 4, by manipulating participants' cognitive load. Cognitive load has been shown to hinder mental simulation (e.g., Petrova and Cialdini, 2005) and also has practical significance in online retail environments as suggested by our study of Top 100 US Retailers' online stores. We manipulated cognitive load in an ecologically valid manner by increasing the complexity of information provided about the product on the product page (e.g., including technical specifications). This approach offers greater managerial relevance for online retailers (Huang, 2000), compared to other cognitive load manipulations commonly used in the literature (Fitzsimons and Williams, 2000; Lisjak and Ordabayeva, 2023).

1.9.1. Method

We recruited 400 participants and randomly assigned them to one of the conditions created by 2 (payment option salience: high salience vs. low salience) x 2 (cognitive load: high vs. low) between-subject design. 37 participants failed the attention check included in the survey which was designed to evaluate their attention to the payment options provided in the scenario similar to Study 3. After excluding those who failed the attention check, we retained a final sample of 363 respondents (https://aspredicted.org/24r4-czm4.pdf, Prolific, 50.4% female, $M_{age} = 40.18$ years). All participants were asked to imagine they were considering purchasing headphones and found a pair that they liked priced at $360. We used the same payment option salience manipulation as in Study 3. More specifically, participants in the high payment option salience condition viewed the logos of payment methods offered by the retailer as they were viewing the product description, while participants in the low salience condition did not see the payment method information. We manipulated cognitive load by varying the complexity of product-related information. In the low cognitive load condition,

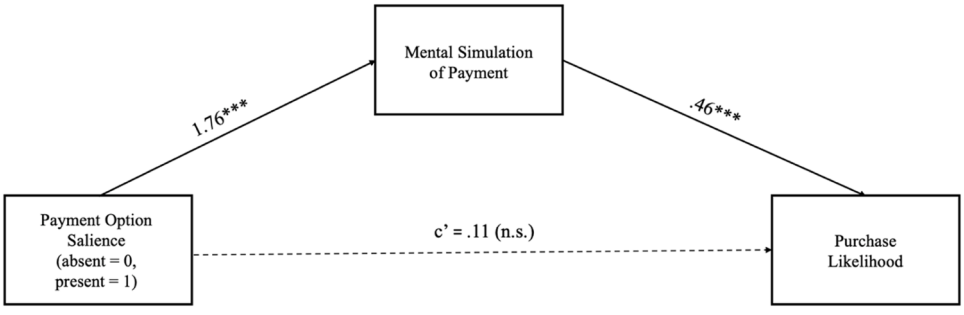

Fig. 6. Mediation Model in Study 3.

Note. Mediation analysis from Study 3. The notation c' indicates the direct effect after controlling for the mediator. * $p < .05$, ** $p < .01$, *** $p < .001$.

participants received a product description written in non-technical terms, while in the high cognitive load condition, they received the same information, along with additional technical information. A pretest confirmed that providing technical (vs. non-technical) product information created greater cognitive load ($M_{\text{high load}} = 3.63$, $SD_{\text{high load}} = 1.86$; $M_{\text{low load}} = 2.47$, $SD_{\text{low load}} = 1.42$; $F(1, 118) = 14.676$, $p < .001$; $d = 0.70$, 95% CI = [0.33, 1.07]) without increasing the perceived desirability of the product ($M_{\text{high load}} = 4.10$, $SD_{\text{high load}} = 1.47$; $M_{\text{low load}} = 4.33$, $SD_{\text{low load}} = 1.73$; $F(1, 118) = .632$, $p = .428$; N = 120; see Appendix G for stimuli). Upon viewing the description, participants indicated how likely they would be to purchase the headphones on a 7-point scale (1 = "very unlikely," 7 = "very likely").

1.9.2. Results

Purchase Likelihood. A two-way ANOVA shows a significant main effect of payment option salience ($F(1, 359) = 11.797$, $p < .001$, $d = 0.36$, 95% CI = [0.15, 0.57]), and a significant interaction of payment option salience and cognitive load ($F(1, 359) = 8.495$, $p = .004$, $d = 0.43$, 95% CI = [0.20, 0.63]). The main effect of cognitive load is not significant ($F(1, 359) = .220$, $p = .639$, $d = 0.05$, 95% CI = [0.00, 0.25]). Contrasts showed that when cognitive load is low, participants in the high salience condition are more likely to purchase than those in the low salience condition ($M_{\text{high salience\_low load}} = 3.72$, $SD_{\text{high salience\_low load}} = 1.97$; $M_{\text{low salience\_low load}} = 2.47$, $SD_{\text{low salience\_low load}} = 1.60$; $F(1, 359) = 20.412$, $p < .001$, $d = 0.48$, 95% CI = [0.26, 0.68]), replicating the pattern observed in our previous studies. In line with our theorizing, the effect is eliminated when cognitive load is high ($M_{\text{high salience\_high load}} = 3.06$, $SD_{\text{high salience\_high load}} = 1.90$; $M_{\text{low salience\_high load}} = 2.95$, $SD_{\text{low salience\_high load}} = 1.86$; $F(1, 359) = .134$, $p = .715$ (Fig. 7). When payment option salience is high, participants in the low cognitive load condition are more likely to purchase than those in the high cognitive load condition ($M_{\text{high salience\_high load}} = 3.06$, $SD_{\text{high salience\_high load}} = 1.90$; $M_{\text{high salience\_low load}} = 3.72$, $SD_{\text{high salience\_low load}} = 1.97$; $F(1, 359) = 6.347$, $p = .012$, $d = 0.27$, 95% CI = [0.06, 0.47]). When payment option salience is low, the difference between low and high cognitive load condition is not significant ($M_{\text{low salience\_high load}} = 2.95$, $SD_{\text{low salience\_high load}} = 1.86$; $M_{\text{low salience\_low load}} = 2.47$, $SD_{\text{low salience\_low load}} = 1.60$; $F(1, 359) = 2.723$, $p = .100$.

Study 4 thus provides further support for our proposed mechanism through moderation. Hindering mental simulation by increasing the cognitive load mitigates the effect of payment option salience on purchase likelihood.

2. General discussion

Leveraging technological advancements in payment systems, companies have started offering a range of payment methods and presenting this information at different stages in customers' decision-making journeys to improve the shopping experience (PricewaterhouseCoopers, 2021). Yet, the impact of payment option salience on consumer spending is not fully understood. Our research shows that increasing the salience of payment options on the product page increases consumers' purchase likelihood. We propose and show evidence that this effect is driven by the mental simulation of payment, triggered by the salience of payment options. Enhancing payment option salience, such as with the use of logos and prominently visible displays, can increase purchase intentions, while increasing cognitive load on the product page mitigates this effect by hindering individuals' ability to mentally simulate the payment process.

These findings make three important contributions. First, we contribute to the research exploring communication strategies used by retailers. Scholars have explored how pricing communication influences consumer spending. Providing external reference prices (Kopalle and Lindsey-Mullikin, 2003), disclosing mandatory fees upfront as opposed to a later stage (Blake et al., 2021), and consumers' internal reference prices based on the retailer type (Elshiewy and Peschel, 2022) can influence how consumers shop in the retail landscape. Relatedly, research has also demonstrated that how retailers communicate the discount information can also

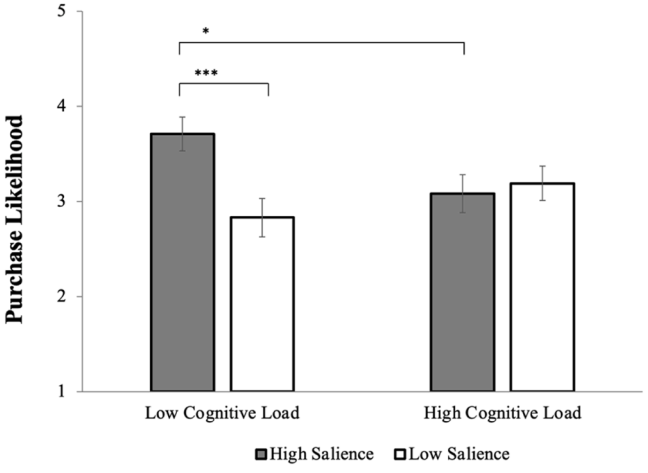

Fig. 7. The effect of payment option salience is mitigated under high cognitive load.
Note. Graph displays means and standard errors of the mean. * $p < .05$, ** $p < .01$, *** $p < .001$.

influence consumer spending. For instance, framing discount against the sale price (e.g., was X% higher vs. now Y% lower; Guha et al., 2018), providing a high but plausible original price (Urbany et al., 1988), and displaying the sale price with a larger font than the regular price (Bhattacharya et al., 2023) influence how people process price information, increases consumers' purchases. Here we show that how to communicate available payment options is another important decision retailers must make. Increasing the salience of payment options on the product page influences consumers' purchase likelihood. Notably, we distinguish between salience and exposure. We demonstrate that when exposure is held constant, more salient payment option information (e.g., presented via logos) increases purchase likelihood relative to less salient information (e.g., presented as text; Study 1). Moreover, holding exposure constant, the effect of salience diminishes when the product page contains greater informational complexity (Study 4).

Second, we contribute to research that explores the interplay of payment methods and consumer behavior. Whereas previous research has primarily focused on the effects of *using* different payment methods (e.g., cash, credit cards, checks) on spending behavior (Cole, 1998; Prelec and Simester, 2001; Raghubir and Srivastava, 2008; Tokunaga, 1993), our study is the first to investigate the effect of mere salience of available payment options on purchase likelihood. By integrating consumers' consideration of payment options (e.g., thinking about their preferred payment method) into product-related purchase considerations (e.g., deciding whether to buy a given product), retailers can effectively incentivize consumers toward making the purchase. We thereby highlight a novel dimension by which payment methods affect consumer behavior.

Third, we identify mental simulation as a new mechanism through which payment methods affect purchase behavior. Past research on the effects of payment methods on spending behavior have examined several underlying mechanisms, including conditioning (Feinberg, 1986; Hunt et al. 1990), pain of paying (Thomas et al., 2011), convenience (Boden et al., 2020), and perceived expensiveness (Ashby et al. 2025; see Table 1 for a review). We contribute to this line of research by showing that payment option salience on product pages can influence purchase decisions by prompting people to simulate how they might pay while deciding whether to buy. However, this is contingent on the cognitive load, since increasing the cognitive load customers experience while processing payment information can hinder mental simulation (e.g., Petrova and Cialdini, 2005). Therefore, under high cognitive load, the effect of payment option salience on purchase likelihood can be mitigated.

2.1. Managerial implications

Our findings also have managerial implications, particularly for the design of online retail pages. An analysis of the marketplace reveals a variety of practices regarding how and when retailers present available payment methods (e.g., logo vs. textual, open vs. collapsed displays; see Appendix C). Despite the importance of communicating payment related information, extant research falls short in exploring payment method communication and its impact on purchase decisions. Our survey with retail managers shows that out of those who do not currently display payment option information on the product page, some have intuitions about a positive impact of this practice. For instance, a senior/c-level executive in e-commerce mentioned that they would consider presenting payment option information on the product page "to see if it positively impacts the conversion rate". However, some managers do not consider it as a priority or are concerned about negative consequences. For instance, a senior retail manager in health and beauty industry mentioned that this practice can result in "too much information on the product page".

Our research addresses this gap in theory and practice by examining how increasing the salience of payment options using different formats (e.g., open vs. collapsed bars, logo vs. textual descriptions) impact likelihood of purchase. Our findings suggest that subtle design choices in the format of payment information presentation can have meaningful effects on consumer behavior. Importantly, following our collaboration in Study 1, which demonstrated a 38% increase in the likelihood of products being added to the cart when payment methods were made salient, the retailer adopted the use of an open logo format for displaying payment methods.

On the other hand, Study 4 reveals a key boundary condition: A higher cognitive load can attenuate this effect by hindering mental simulation. Therefore, product pages, which present complex and extensive information, need to be crafted carefully. Our analysis of the Top 100 US Retailers' webpages reveals that some retailers tend to employ "the more, the better" approach when it comes to the information presented on the product page. While some online retailers only present product name, picture, description, and price, others increase the number of information they provide by presenting details on shipping, loyalty programs, customer reviews, complementary items, and product returns. More specifically, in our analysis, we find that the minimum number of different pieces of information retailers provide on the product page is four, while the maximum is ten. More information might result in a higher cognitive load that makes it difficult for customers to process the payment information and mentally simulate the payment process. In this sense, we reaffirm the importance of user-friendly designs which may influence the likelihood of product purchase.

The practical implications also should be of interest to policy makers. Issues surrounding consumer overspending and debt levels (Federal Reserve Bank of New York, 2022) have substantial consequences for consumer well-being (Netemeyer et al., 2018), and some critics allege that the rapid diffusion of new payment methods (e.g., installments, buy now pay later; Maesen and Ang, 2024) encourage impulse buying and make people spend money they do not have (Venkataramakrishnan, 2021). While the use of specific payment methods can clearly influence spending, the way their availability is communicated and its downstream consequences on consumer spending are overlooked. Our research indicates that payment option salience could be another factor contributing to consumer overspending. While retailers might want to provide information about available payment options to facilitate purchases, policy makers might consider regulating where and how this information should be presented.

2.2. Limitations and future research

In our exploration of Top 100 US Retailers, we observed that retailers choose to highlight different types of payment options on

their product pages. Some retailers only present buy-now-pay-later payment schemes (e.g., Sephora, Lululemon), which have been shown to increase consumer spending (Ashby et al., 2025; Kumar et al., 2024; Maesen and Ang, 2025). Others present a more inclusive list of payment options on their product pages (e.g., Discount Tire, Academy Sports). Our focus in this research was to explore the effect of payment option salience, rather than the effect of specific payment methods offered by the retailers. In our studies, we used several payment methods widely available in the marketplace, such that all participants in our datasets have indicated using at least one of the payment methods offered. Future research can further test whether offering certain payment methods makes it easier for the consumer to mentally simulate the payment process compared to others.

We acknowledge that Study 1 faced important limitations due to the unavailability of individual consumer level data such as previous purchases, time spent on website, and cart abandonment among others. This was driven by privacy regulations concerning our collaborating partner, and so we controlled for all the factors we had access to in our product level data (e.g., fixed effects for device type, product category). Further, our dependent variable is the number products added to the cart, and not the actual purchase. Our collaborating firm reported a medium-low correlation between adding products to cart and purchase ($r = .21$; $p = .001$), which we acknowledge as a limitation. However, it is also very important to note that the add to cart button is the only purchase action that can be taken on the product page where we implemented the A/B test. In essence, adding a product to cart is a preliminary step to buying on the subsequent page, and it is where the direct empirical effect of an intention to buy happens. We hope further research can have access to more granular data and more end of the funnel outcomes to explore nuanced effects around the salience of payment options.

While our focus is on exploring the salience of payment options on the product page, retailers can choose to make payment information salient on other parts of their website such as the main landing page. Our theorizing would suggest that this can lead to a similar effect, as long as payment option information is still salient while customers are making their purchase decisions. However, as the temporal difference between the point in which payment method information is communicated to the customers and the point in which customers make a purchase decision (e.g., adding a product to their cart) increases, the salience of payment option information is likely to decrease. Future research could further explore the temporal dynamics at play. Further, various design choices for making payment options salient can also impact other types of shopper behavior such as their basket size, basket composition, or their browsing time, which could be of interest to retailers and can provide avenues for future research.

Finally, in offline retail settings, practices such as placing payment banners on store windows or signage near cash registers could increase the salience of payment options and purchase likelihood. However, cognitive load in offline environments can also be higher, since consumers often shop in more complex and multisensory contexts compared to online settings where product information is typically consolidated on a single screen. This increased cognitive load could potentially reduce the strength of the effect in offline settings. Further, there might be other spending contexts (e.g., donations, paying bills) where payment option salience or mental simulation of payment can lead to negative outcomes due to reduced focus on the benefits gained, greater attention to the loss of resources. As we have not tested our predictions in offline retail environments or other spending contexts, we limit the scope of the current manuscript to online retail contexts, but we believe this could be an interesting direction for future research.

Supplementary materials

Supplementary material associated with this article can be found, in the online version, at doi:10.1016/j.jretai.2026.01.005.

References

Ashby, R., Sharifi, S., Yao, J., & Ang, L. (2025). The influence of the buy-now-pay-later payment mode on consumer spending decisions. *Journal of Retailing*.
Barsalou, L. W. (2008). Grounded cognition. *Annual Review of Psychology, 59*, 617–645.
Benoit, S., Altrichter, B., Grewal, D., & Ahlbom, C. P. (2024). Autonomous stores: How levels of in-store automation affect store patronage. *Journal of Retailing*.
Bhattacharjee, A., Dana, J., & Baron, J. (2017). Anti-profit beliefs: How people neglect the societal benefits of profit. *Journal of Personality and Social Psychology, 113*(5), 671.
Bhattacharyya, A., Jha, S., Guha, A., & Biswas, A. (2023). Should firms display the sale price using larger font? *Journal of Retailing, 99*(1), 17–25.
Blake, T., Moshary, S., Sweeney, K., & Tadelis, S. (2021). Price salience and product choice. *Marketing Science, 40*(4), 619–636.
Bobinski, G., Jr, Cox, D., & Cox, A. (1996). Retail "sale" advertising, perceived retailer credibility, and price rationale. *Journal of Retailing, 72*(3), 291–306.
Boden, J., Maier, E., & Wilken, R. (2020). The effect of credit card versus mobile payment on convenience and consumers' willingness to pay. *Journal of Retailing and Consumer Services, 52*, Article 101910.
Camerer, C., & Loewenstein, G. (2004). Behavioral economics: past, present, future. *Advances in Behavioral Economics* (pp. 3–51). New York, NY, US: Russel Sage Foundation.
Ceylan, G., Diehl, K., & Wood, W. (2024). From mentally doing to actually doing: A meta-analysis of induced positive consumption simulations. *Journal of Marketing, 88*(2), 21–39.
Chandon, P., & Wansink, B. (2002). When are stockpiled products consumed faster? A convenience–salience framework of postpurchase consumption incidence and quantity. *Journal of Marketing Research, 39*(3), 321–335.
Chao, L. L., & Martin, A. (2000). Representation of manipulable man-made objects in the dorsal stream. *Neuroimage, 12*(4), 478–484.
Chatterjee, P., & Rose, R. L. (2012). Do payment mechanisms change the way consumers perceive products? *Journal of Consumer Research, 38*(6), 1129–1139.
Childers, T. L., & Houston, M. J. (1984). Conditions for a picture-superiority effect on consumer memory. *Journal of Consumer Research*, 643–654.
Clement, J., Aastrup, J., & Forsberg, S. C. (2015). Decisive visual saliency and consumers' in-store decisions. *Journal of Retailing and Consumer Services, 22*, 187–194.
Cole, C. (1998). Identifying interventions to reduce credit card misuse through consumer behavior research. In *Proceedings of the Marketing and Public Policy Conference* (pp. 11–13). Washington, DC: Georgetown University Press.
De Visser-Amundson, A., Peloza, J., & Kleijnen, M. (2021). How association with physical waste attenuates consumer preferences for rescue-based food. *Journal of Marketing Research, 58*(5), 870–887.
Drèze, X., & Hussherr, F. X. (2003). Internet advertising: Is anybody watching? *Journal of Interactive Marketing, 17*(4), 8–23.

Drolet, A., & Aaker, J. (2002). Off-target? Changing cognitive-based attitudes. *Journal of Consumer Psychology, 12*(1), 59–68.
Elder, R. S., & Krishna, A. (2010). The effects of advertising copy on sensory thoughts and perceived taste. *Journal of Consumer Research, 36*(5), 748–756.
Elder, R. S., & Krishna, A. (2012). The "visual depiction effect" in advertising: Facilitating embodied mental simulation through product orientation. *Journal of Consumer Research, 38*(6), 988–1003.
Elshiewy, O., & Peschel, A. O. (2022). Internal reference price response across store formats. *Journal of Retailing, 98*(3), 496–509.
Falk, T., Kunz, W. H., Schepers, J. J., & Mrozek, A. J. (2016). How mobile payment influences the overall store price image. *Journal of Business Research, 69*(7), 2417–2423.
Farace, S., Roggeveen, A., Villarroel Ordenes, F., De Ruyter, K., Wetzels, M., & Grewal, D. (2020). Patterns in motion: How visual patterns in ads affect product evaluations. *Journal of Advertising, 49*(1), 3–17.
Federal Reserve Bank of New York. (2022). *Quarterly report on household debt and credit.* https://www.newyorkfed.org/medialibrary/interactives/householdcredit/data/pdf/HHDC_2022Q1.
Feinberg, Richard A. (1986). Credit cards as spending facilitating stimuli: A conditioning interpretation. *Journal of Consumer Research, 13*(3), 348–356.
Fitzsimons, G. J., & Williams, P. (2000). Asking questions can change choice behavior: Does it do so automatically or effortfully? *Journal of Experimental Psychology: Applied, 6*(3), 195.
Gilbert, D. T., Pelham, B. W., & Krull, D. S. (1988). On cognitive busyness: When person perceivers meet persons perceived. *Journal of Personality and Social Psychology, 54*(5), 733.
Gourville, J. T., & Soman, D. (2005). Overchoice and assortment type: When and why variety backfires. *Marketing Science, 24*(3), 382–395.
Grewal, D., Gauri, D. K., Das, G., Agarwal, J., & Spence, M. T. (2021). Retailing and emergent technologies. *Journal of Business Research, 134*, 198–202.
Grewal, D., Herhausen, D., Ludwig, S., & Ordenes, F. V. (2022). The future of digital communication research: Considering dynamics and multimodality. *Journal of Retailing, 98*(2), 224–240.
Gu, Y., & Wu, Y. (2023). Highlighting supply-abundance increases attraction to small-assortment retailers. *Journal of Retailing, 99*(3), 420–439.
Guha, A., Biswas, A., Grewal, D., Verma, S., Banerjee, S., & Nordfält, J. (2018). Reframing the discount as a comparison against the sale price: does it make the discount more attractive? *Journal of Marketing Research, 55*(3), 339–351.
Hayes, A. F. (2018). Partial, conditional, and moderated moderated mediation: Quantification, inference, and interpretation. *Communication Monographs, 85*(1), 4–40.
Herrmann, A., Zidansek, M., Sprott, D. E., & Spangenberg, E. R. (2013). The power of simplicity: Processing fluency and the effects of olfactory cues on retail sales. *Journal of Retailing, 89*(1), 30–43.
Higgins, E. T. (1996). Activation: Accessibility, and salience. *Social psychology: Handbook of basic principles* (pp. 133–168).
Hirschman, Elizabeth C. (1979). Differences in consumer purchase behavior by credit card payment system. *Journal of Consumer Research, 6*(1), 58–66.
Hoyer, W.d., MacInnis, D. J., Pieters, R., Chan, E., & Northey, G. (2020). *Consumer Behavior*. Cengage.
Hoyer, W. D. (1984). An examination of consumer decision making for a common repeat purchase product. *Journal of Consumer Research, 11*(3), 822–829.
Huang, M. H. (2000). Information load: its relationship to online exploratory and shopping behavior. *International Journal of Information Management, 20*(5), 337–347.
Hunt, J. M., Chatterjee, A., Florsheim, R. A., & Kernan, J. B. (1990). Credit cards as spending-facilitating stimuli: A test and extension of Feinberg's conditioning hypothesis. *Psychological Reports, 67*(1), 323–330.
Inman, J. J., Winer, R. S., & Ferraro, R. (2009). The interplay among category characteristics, customer characteristics, and customer activities on in-store decision making. *Journal of Marketing, 73*(5), 19–29.
Jarvenpaa, S. L. (1990). Graphic displays in decision making—the visual salience effect. *Journal of Behavioral Decision Making, 3*(4), 247–262.
Jeannerod, M. (1994). Motor representations and reality. *Behavioral and Brain Sciences, 17*(2), 229–245.
Jeannerod, M. (2001). Neural simulation of action: a unifying mechanism for motor cognition. *Neuroimage, 14*(1), S103–S109.
Jia, Y., Huang, Y., Wyer, R. S., Jr, & Shen, H. (2017). Physical proximity increases persuasive effectiveness through visual imagery. *Journal of Consumer Psychology, 27*(4), 435–447.
Kahneman, D., & Frederick, S. (2002). Representativeness revisited: Attribute substitution in intuitive judgment. *Heuristics and biases: The psychology of intuitive judgment, 49*(49-81), 74.
Kappes, H. B., & Morewedge, C. K. (2016). Mental simulation as substitute for experience. *Social and Personality Psychology Compass, 10*(7), 405–420.
Kopalle, P. K., & Lindsey-Mullikin, J. (2003). The impact of external reference price on consumer price expectations. *Journal of Retailing, 79*(4), 225–236.
Krishna, A., Briesch, R., Lehmann, D. R., & Yuan, H. (2002). A meta-analysis of the impact of price presentation on perceived savings. *Journal of Retailing, 78*(2), 101–118.
Kumar, A., Salo, J., & Bezawada, R. (2024). The effects of buy now, pay later (BNPL) on customers' online purchase behavior. *Journal of Retailing, 100*(4), 602–617.
Larson, J. S., Redden, J. P., & Elder, R. S. (2014). Satiation from sensory simulation: Evaluating foods decreases enjoyment of similar foods. *Journal of Consumer Psychology, 24*(2), 188–194.
Liao, Z., Shi, X., & Wong, W. K. (2014). Key determinants of sustainable smartcard payment. *Journal of Retailing and Consumer Services, 21*(3), 306–313.
Lim, J. H., Rishika, R., Janakiraman, R., & Kannan, P. K. (2020). Competitive effects of front-of-package nutrition labeling adoption on nutritional quality: evidence from facts up front–style labels. *Journal of Marketing, 84*(6), 3–21.
Lisjak, M., & Ordabayeva, N. (2023). How political ideology shapes preferences for observably inferior products. *Journal of Consumer Research, 49*(6), 1014–1031.
Liu, H. H., & Chou, H. Y. (2020). Payment formats and hedonic consumption. *Psychology & Marketing, 37*(11), 1586–1600.
Liu, Y., & Dewitte, S. (2021). A replication study of the credit card effect on spending behavior and an extension to mobile payments. *Journal of Retailing and Consumer Services, 60*, Article 102472.
Lunardo, R., & Saintives, C. (2013). The effect of naturalness claims on perceptions of food product naturalness in the point of purchase. *Journal of Retailing and Consumer Services, 20*(6), 529–537.
Lurie, N. H., & Mason, C. H. (2007). Visual representation: Implications for decision making. *Journal of Marketing, 71*(1), 160–177.
Lynch, J. G., Alba, J. W., & Hutchinson, J. W. (1991). Memory and decision making. *Handbook of consumer behavior* (pp. 1–9).
Maesen, S., & Ang, D. (2024). Buy Now, Pay Later: Impact of Installment Payments on Customer Purchases. *Journal of Marketing*, Article 00222429241282414.
Mafael, A. (2019). How regulatory orientation and feelings of gratitude shape online review helpfulness. *Journal of Consumer Psychology, 29*(4), 601–622.
McCall, M., & Belmont, H. J. (1996). Credit card insignia and restaurant tipping: Evidence for an associative link. *Journal of Applied Psychology, 81*(5), 609.
McCall, M., Trombetta, J., & Gipe, A. (2004). Credit cues and impression management: a preliminary attempt to explain the credit card effect. *Psychological Reports, 95*(1), 331–337.
Miyazaki, A. D., Sprott, D. E., & Manning, K. C. (2000). Unit prices on retail shelf labels: an assessment of information prominence. *Journal of Retailing, 76*(1), 93–112.
Monger, J. E., & Feinberg, R. A. (1997). Mode of payment and formation of reference prices. *Pricing Strategy and Practice, 5*(4), 142–147.
Moore, A., & Taylor, M. (2011). Time to cut up those debit cards? Effect of payment mode on willingness to spend. *Journal of Consumer Policy, 34*, 415–422.
Morewedge, C. K., Huh, Y. E., & Vosgerau, J. (2010). Thought for food: Imagined consumption reduces actual consumption. *Science, 330*(6010), 1530–1533.
Morgan, C., Fajardo, T. M., & Townsend, C. (2021). Show it or say it: how brand familiarity influences the effectiveness of image-based versus text-based logos. *Journal of the Academy of Marketing Science, 49*, 566–583.
National Retail Federation. (2025). *Top 100 retailers 2024 list.* https://nrf.com/researchinsights/top-retailers/top-100-retailers/top-100-retailers-2024-list.
Netemeyer, R. G., Warmath, D., Fernandes, D., & Lynch, J. G., Jr (2018). How am I doing? Perceived financial well-being, its potential antecedents, and its relation to overall well-being. *Journal of Consumer Research, 45*(1), 68–89.
Nisbett, R., & Ross, L. (1980). *Human inference: Strategies and shortcomings of social judgment.* Englewood Cliffs, N.J.: Prentice-Hall.
Orth, U. R., & Wirtz, J. (2014). Consumer processing of interior service environments: The interplay among visual complexity, processing fluency, and attractiveness. *Journal of Service Research, 17*(3), 296–309.
Park, J., Velasco, C., & Spence, C. (2022). Looking sharp": Price typeface influences awareness of spending in mobile payment. *Psychology & Marketing, 39*(6), 1170–1189.

Pennycook, G., Epstein, Z., Mosleh, M., Arechar, A. A., Eckles, D., & Rand, D. G. (2021). Shifting attention to accuracy can reduce misinformation online. *Nature, 592* (7855), 590–595.
Petit, O., Javornik, A., & Velasco, C. (2022). We eat first with our (digital) eyes: enhancing mental simulation of eating experiences via visual-enabling technologies. *Journal of Retailing, 98*(2), 277–293.
Petrova, P. K., & Cialdini, R. B. (2005). Fluency of consumption imagery and the backfire effects of imagery appeals. *Journal of Consumer Research, 32*(3), 442–452.
Pham, L. B., & Taylor, S. E. (1999). From thought to action: Effects of process-versus outcome-based mental simulations on performance. *Personality and Social Psychology Bulletin, 25*(2), 250–260.
Pieters, R., & Wedel, M. (2004). Attention capture and transfer in advertising: Brand, pictorial, and text-size effects. *Journal of Marketing, 68*(2), 36–50.
Prelec, D., & Loewenstein, G. (1998). The red and the black: Mental accounting of savings and debt. *Marketing Science, 17*(1), 4–28.
Prelec, D., & Simester, D. (2001). Always leave home without it: A further investigation of the credit-card effect on willingness to pay. *Marketing Letters, 12*, 5–12.
PricewaterhouseCoopers (2021). *Payments 2025 & Beyond*. PwC, https://www.pwc.com/gx/en/industries/financial-services/publications/financial-services-in-2025/payments-in-2025.html.
Pymnts (2024). *70% of shoppers say payment options influence where they shop online,* PYMNTS.com. Available at: https://www.pymnts.com/news/payment-methods/2024/70-of-shoppers-say-payment-options-influence-where-they-shop-online/ (Accessed: 14 May 2025).
Raghubir, P., & Srivastava, J. (2008). Monopoly money: the effect of payment coupling and form on spending behavior. *Journal of Experimental Psychology: Applied, 14* (3), 213.
Reshadi, F., & Fitzgerald, M. P. (2023). The pain of payment: A review and research agenda. *Psychology & Marketing, 40*(8), 1672–1688.
Reynolds-McIlnay, R., Morrin, M., & Nordfält, J. (2017). How product–environment brightness contrast and product disarray impact consumer choice in retail environments. *Journal of Retailing, 93*(3), 266–282.
Rihn, A., Wei, X., & Khachatryan, H. (2019). Text vs. logo: Does eco-label format influence consumers' visual attention and willingness-to-pay for fruit plants? An experimental auction approach. *Journal of Behavioral and Experimental Economics, 82*, Article 101452.
Schomburgk, L., Belli, A., & Hoffmann, A. O. (2024). Less cash, more splash? A meta-analysis on the cashless effect. *Journal of Retailing*.
Shimp, T. A., & Moody, M. P. (2000). In search of a theoretical explanation for the credit card effect. *Journal of Business Research, 48*(1), 17–23.
Shiv, B., & Fedorikhin, A. (1999). Heart and mind in conflict: The interplay of affect and cognition in consumer decision making. *Journal of Consumer Research, 26*(3), 278–292.
Shiv, B., & Huber, J. (2000). The impact of anticipating satisfaction on consumer choice. *Journal of Consumer Research, 27*(2), 202–216.
Soman, D. (2001). Effects of payment mechanism on spending behavior: The role of rehearsal and immediacy of payments. *Journal of Consumer Research, 27*(4), 460–474.
Soman, D. (2003). The effect of payment transparency on consumption: Quasi-experiments from the field. *Marketing Letters, 14*, 173–183.
Soster, R. L., Gershoff, A. D., & Bearden, W. O. (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.
Sun, J. J., Bellezza, S., & Paharia, N. (2021). Buy less, buy luxury: Understanding and overcoming product durability neglect for sustainable consumption. *Journal of Marketing, 85*(3), 28–43.
Taylor, S. E., Crocker, J., Fiske, S. T., Sprinzen, M., & Winkler, J. D. (1979). The generalizability of salience effects. *Journal of Personality and Social Psychology, 37*(3), 357.
Taylor, Shelley E., Pham, Lien B., Rivkin, Inna D., & Armor, David A. (1998). Harnessing the imagination: Mental simulation, self-regulation, and coping. *American Psychologist, 53*, 429.
Taylor, S. E., & Thompson, S. C. (1982). Stalking the elusive" vividness" effect. *Psychological Review, 89*(2), 155.
Thomas, M., Desai, K. K., & Seenivasan, S. (2011). How credit card payments increase unhealthy food purchases: Visceral regulation of vices. *Journal of Consumer Research, 38*(1), 126–139.
Tokunaga, H. (1993). The use and abuse of consumer credit: Application of psychological theory and research. *Journal of Economic Psychology, 14*(2), 285–316.
Tucker, M., & Ellis, R. (1998). On the relations between seen objects and components of potential actions. *Journal of Experimental Psychology: Human Perception and Performance, 24*(3), 830.
Urbany, J. E., Bearden, W. O., & Weilbaker, D. C. (1988). The effect of plausible and exaggerated reference prices on consumer perceptions and price search. *Journal of Consumer Research, 15*(1), 95–110.
Venkataramakrishnan, Siddhart (2021). *Klarna and stripe announce 'buy now, pay later' Partnership*. Financial Times. June 28, 2022 https://www.ft.com/content/841e0d03-f547-4a1f-b1f4-ef9a8ac7ab1f.
Verkijika, S. F., & Neneh, B. N. (2021). Standing up for or against: A text-mining study on the recommendation of mobile payment apps. *Journal of Retailing and Consumer Services, 63*, Article 102743.
Williams, G. (2022). *Retailers are embracing alternative payment methods, though cards are still king*. NRF. January 20, 2023 https://nrf.com/blog/retailers-are-embracing-alternative-payment-methods-though-cards-are-still-king.
Xie, H., Minton, E. A., & Kahle, L. R. (2016). Cake or fruit? Influencing healthy food choice through the interaction of automatic and instructed mental simulation. *Marketing Letters, 27*, 627–644.
Yao, J., & Oppewal, H. (2016). Unit pricing increases price sensitivity even when products are of identical size. *Journal of Retailing, 92*(1), 109–121.
Zarco, C., Giráldez-Cru, J., Cordón, O., & Liébana-Cabanillas, F. (2024). A comprehensive view of biometric payment in retailing: A complete study from user to expert. *Journal of Retailing and Consumer Services, 79*, Article 103789.
Zellermayer, O. (1996). *The pain of paying. unpublished dissertation, department of social and decision sciences*. Pittsburgh, PA: Carnegie Mellon University.