

Immersive retailing: The in-store experience

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Abstract

This conceptual article explores why consumers visit physical stores—despite living in a digital-first world—and presents potential ways for retailers to further encourage offline shopping. Although online retailing tends to offer the greatest convenience, brick-and-mortar outlets can offer an immersive in-store experience that combines convenience and interest. The present exposition considers store features within a 2×2 typology of convenience and interest and illustrates how these features contribute, or fail to contribute, to immersive in-store experiences. Other factors, such as ambient stimuli that elicit sensory- and aesthetic pleasure, provide additional paths to immersion. The notions raised may serve as a basis for future research avenues in immersive retailing.

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Introduction

Physical retail stores are facing difficult challenges. In addition to perennial costs such as property and other overhead expenses, competition from online retailing can eat into the customer base and siphon away profits. During the recent pandemic, the fragility of brick-and-mortar outlets seemed especially apparent, with all the store closings heralding a dire future for traditional retailing. Nonetheless, already in 2021, nearly twice as many stores were opening as those that were closing (McKeever 2021). Despite online behaviors becoming increasingly entrenched during lockdowns and periods of social distancing, it appears that shoppers want to visit offline locations, too. This inclination carries numerous potential benefits for retailers. For example, consumers may be more likely to purchase items they have seen in person, more likely to buy additional items, and less likely to make returns (Robertson, Hamilton, and Jap 2020). Personalized service can further contribute to such outcomes (Mittal and Lassar 1996). Physical locations can also reduce costs by removing shipping expenses from returns and by generally

functioning as part of the supply chain (Fernie and Sparks 2018). Furthermore, omnichannel strategies are effective; not only can physical stores also increase traffic to online outlets, but many consumers who shop both online and offline also spend more overall than those who stick to one or the other (Sopadjieva, Dholakia, and Benjamin 2017).

With such benefits to retailers in mind, the current article examines the reasons why shoppers are inclined to visit physical stores and explores potential ways to encourage it further. Although physical retailers may be unable to outdo the convenience provided by their online counterparts (Jiang, Yang, and Jun 2013), we argue that consumers appreciate an immersive in-store experience that combines convenience and interest. Other factors may also play a role in immersion, but we believe that a focus on convenience and interest provides a simple way to explain much; it is a practical lens to illustrate how retailers can encourage immersive in-store experiences, as well as a manageable basis for future research in this domain.

In recent literature, immersion is typically discussed in digital and online contexts such as virtual reality (VR; Slater and Sanchez-Vives 2016). However, immersion is a broader phenomenon—people immerse themselves in environments and activities ranging from play to work assignments (Csikszentmihalyi 1997)—and the present research fo-

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cuses on immersion in a physical store, which may or may not involve digital technology. The term *immersion* pertains metaphorically to the physical experience of being submerged in water; it conveys a reality that fully captures a person's attention and perceptual apparatus (Buttazzoni et al. 2022). Immersive retailing refers to this type of experience in a shopping context, due to elements such as store design, technology utilized therein, atmospherics, or employee behavior. Whereas immersion can come about in a negative context (e.g., war or natural disasters), the current work focuses primarily on positive experiences. In particular, we emphasize interest combined with convenience as a pathway to immersion; interest is what motivates immersion, but inconveniences can impede, disrupt, or distract from immersion. Additionally, factors such as pleasant or congruent stimuli can invite perceptual engagement or in other ways contribute to immersion (Alba and Williams 2013; Biswas 2019; Graf and Landwehr 2015; Krishna 2012). Such other factors, some of which have received much attention elsewhere, are not the main focus of the current exposition, but nor should they be overlooked.

With these notions in mind, we propose a 2×2 typology of consumer convenience and interest that highlights various store features across four quadrants: Features with low convenience and low interest tend to *disengage* consumers, whereas features with low convenience and high interest *stimulate*, those with high convenience and low interest *facilitate*, and those with high convenience and high interest *engage*. One might arguably label the latter quadrant *immerse*, but the label chosen reflects the caveat that the typology is not comprehensive and that other aspects (e.g., pleasure) can play a role in immersion. The 2×2 typology provides a simple but systematic framework to help retailers understand how their current store features contribute, or fail to contribute, to immersive in-store experiences, as well as identify opportunities for improvement. The current approach, with its emphasis on immersive in-store experiences, complements the discussion of such elements in extant literature and may especially benefit scholars and managers with an interest in retailing. Finally, we discuss how retailers can leverage data and analytics in this context, and we present various avenues for future research relevant to academics and industry alike.

Current practices that encourage physical store traffic

Whether or not the present perspectives are strategically employed, retailers can and do utilize advantages inherent in physical stores, with factors such as interior design, architecture, or geographical location encouraging visits and influencing shopping behavior (Ebster 2011; Ghosh and Craig 1983). Physical presence also facilitates sensory engagement (Biswas 2019; Krishna 2012) and provides multisensory sources for an aesthetic impact (Hagtvedt 2022), which in turn can influence purchase decisions—the majority of which are made in the store for some product categories (Ebster 2011). Retailers have therefore long utilized atmospherics (Kotler 1973; Spence et al. 2014; Turley and Chebat

2002), including elements such as color, lighting, and music (Baker, Levy, and Grewal 1992; Bellizzi, Crowley, and Hasty 1983), to increase visits, enhance experiences, and boost revenues. These aspects can play an impactful role in traditional spaces such as shopping malls (Michon, Chebat, and Turley 2005), or in less conventional stores cropping up in workplaces, libraries, museums, and churches (Karrholm 2012). Relatedly, not only can strategic placement at a popular location increase traffic to a store, but sometimes the store itself becomes a tourist attraction (Pantano and Dennis 2019).

In addition to such benefits of brick-and-mortar outlets, retailers can draw on more recent lessons learned from on-line retailing. Although some specific online benefits may be difficult to emulate (e.g., the ease of browsing and purchasing from the comfort of one's own couch), offline alternatives can provide their own versions (e.g., easily accessible locations and fluid check-out processes), including aspects superior to online offerings (e.g., providing easy opportunities to physically handle various products without waiting for delivery). Indeed, the importance of convenience has long been known (Seiders, Berry, and Gresham 2000), whereas the internet has emphasized it further by creating easy alternatives (Jiang, Yang, and Jun 2013). Similarly, the internet provides lessons in terms of interest. For example, much like inbound and content marketing can attract consumers by providing engaging material online, retailers can employ comparable tactics—whether online or offline—to spark interest in their physical locations. Notably, despite the availability of digital technology, in-person experiences remain popular, in contexts ranging from casual social gatherings to live events such as concerts, plays, and sports (Lee and Goldblatt 2020). That insight underscores an advantage that physical stores retain over their online competition.

At the same time, retailers can benefit from realizing that most of their customers live in a digital-first world, characterized by factors such as online channels and a deluge of consumer data (Kannan and Li 2017). Even retailers who prioritize offline operations need to be cognizant of ongoing practices and changes in the digital landscape. For many of those retailers, incorporating online practices such as augmented reality (AR; Tan, Chandukala, and Reddy 2022) and social media marketing (Alves, Fernandes, and Raposo 2016) can help boost sales by generating interest and driving traffic to the stores. Navigating online and offline simultaneously requires agility (Kalaigaman et al. 2021), but a failure to do so can lead to suboptimal results in both domains. Conversely, the strategic application of both online and offline technology can contribute to an immersive in-store experience, with the positive implications it has for outcomes such as revenues and profits.

Table 1 provides a summary of relevant research frameworks pertaining to various in-store shopping contexts. These extant frameworks focus on a specific facet of in-store experience such as in-store visual merchandising (Basu, Paul, and Singh 2022), in-store technology (Grewal et al. 2020), or retail atmospherics (Roggeveen, Grewal, and Schweiger 2020; Turley and Milliman 2000). The current focus on in-store im-

Table 1

Summary of selected in-store retail research frameworks.

<i>Article</i>	<i>Focus</i>	<i>Key takeaways</i>
Basu, Paul, and Singh (2022)	Visual merchandising	Identify research gaps pertaining to visual merchandising and store atmospherics using Theory, Context, Characteristics, and Methods (TCCM) typology. Based on integrated analysis of research between 2000 and 2020 find that visual merchandising as product-driven display function is closely related to store atmospherics as a store-wide display function.
Grewal et al. (2020)	In-store technology	Examine in-store technology via 2×2 typology with the dimensions of convenience and social presence. Discuss how the two dimensions activate vividness, which eventually leads to an increase in sales.
Hubner, Hense, and Dethlefs (2022)	Physical stores as a focal point for omni-channel retail operations	Develop a framework for omni-channel planning that includes demand forecasting, fulfillment location, and assortment and inventory planning. Explore various fulfillment concepts like Buy Online Pick-up in Store (BOPS), Ship-From-Store (SFS), and Digital Assortment Extension (DAE).
Kim, Connerton, and Park (2022)	Buy online & pick up in store (BOPS)	Extend unified theory of acceptance and use of technology (UTAUT) and task-technology fit model (TTF) to propose a conceptual framework for understanding the mechanism behind consumers adopting BOPS. Find personal innovativeness as a strong predictor for customers' BOPS usage intention in an automotive retail environment.
Kim and Lee (2021)	Customer revisit using in-store sensors	Propose a framework for predicting revisit intention of customers using in-store sensors (Wi-Fi signals). Discuss the revisit prediction framework architecture that includes data preprocessing, training, and prediction about customer revisit pattern.
Lee and Ko (2021)	In-store shopping hassles	Explore how shopping hassles differ from service failure by drawing on attribution theory and expectation theory. Provide a classification framework of in-store shopping hassles that include employee-related hassles and task-related hassles.
Roggeveen, Grewal, and Schweiger (2020)	Retail atmospherics	Propose design-ambient-social-trialability (DAST) framework for retail atmospherics. Discuss the mediating role of valence, intensity, attention, and elaboration in the influence of DAST factors on consumers' shopping behavior.
Turley and Milliman (2000)	In-store atmospherics	Focus on how store atmosphere influences shopper behavior. Atmospheric variables are classified into external, general interior, layout and design, point-of-purchase and decoration, and human variables. Discuss how atmospheric variables impact consumer evaluations and behaviors using stimulus, organism, and response (SOR) lens.
Current research	In-store immersive retailing	Develop 2×2 typology with the dimensions of convenience and interest to characterize features that contribute to immersive retailing. Illuminate the theoretical concept of consumer immersion and highlight practical challenges and benefits to retailers. Immersive retailing encompasses numerous in-store features, including ones discussed in the above articles.

mersive retailing encompasses all of these facets, as well as numerous other features.

Convenience and interest

Regardless of their current practices, it can behoove retailers to understand the potential combined roles of convenience and interest in producing outcomes desirable to both the business and the consumers. Convenience refers to factors such as competent salespeople, fluid checkout processes, and credit availability, which reduce the time and effort involved in shopping (Berry, Seiders, and Grewal 2002). Marketers are aware of the large and increasing consumer demand for convenience, and they allocate substantial resources toward providing it as part of effective customer management (Seiders et al. 2007). Not only is convenience valued per se, but it can also moderate the relationship between customer

satisfaction and downstream outcomes such as repurchase behavior (Seiders et al. 2005). For certain desirable outcomes, in other words, even customer satisfaction may not suffice if convenience is lacking.

As for interest, some researchers label it an emotion, whereas other researchers describe it as a motivational state (Silvia 2008). There are reasonable arguments for either label, but the current research takes the latter stance; interest is cognitive in nature, and either positive or negative feelings can encourage it (Jones and Reynolds 2006). Regardless of label, interest is akin to curiosity and can motivate exploration and approach behavior (Berlyne 1974; Litman 2005; Loewenstein 1994; Steenkamp and Baumgartner 1992). For shoppers, retailer interest is associated with looking forward to visiting the store again, as well as loyalty, positive word of mouth, and wanting to learn more about the retailer (Jones and Reynolds 2006). In general, interest motivates behavior toward explor-

ing, understanding, experiencing, and participating in the environment. In the current context, the interest may be directed at specific merchandise, store features, or any other aspects of shopping. To the extent that the aspects are central to the in-store experience—a perception that may vary between consumers and situations—those aspects presumably contribute to the immersive nature of that experience.

The relationship between convenience and interest in a retail setting echoes the relationship between fluency and interest in the aesthetics literature (Reber, Schwarz, and Winkielman 2004; Silvia 2008). Whereas fluency entails easy processing, convenience entails easy shopping. However, aspects such as novelty, ambiguity, and complexity can generate interest but do not appear to align well with ease, whether in regard to processing or shopping (Berlyne 1974; Silvia 2008). Nonetheless, there are contexts in which interest and relative ease can successfully combine, as in the psychological experience of flow (Csikszentmihalyi 1997). We argue that a similar case can be made for an immersive in-store experience. Without the motivation inherent in interest, consumers may disregard store features and even fail to process ones that require more cognitive resources than would typically be devoted by uninterested shoppers (Peracchio and Meyers-Levy 1997). Interest encourages immersion, whereas inconvenience can disrupt that process and spark negative emotions such as frustration and irritation. Immersion seems unlikely if a shopping experience is interesting but difficult, or if it is easy but boring. The latter observation reflects the notion that without interest, attention wanders elsewhere, even in convenient circumstances. However, when interest is coupled with a fluid and easy shopping experience, the result is more likely to be an immersive shopping experience, along with customer satisfaction and downstream outcomes such as repeated purchases (Seiders et al. 2005).

Convenient and interesting practices in retailing

Which retailing practices, then, are convenient or interesting? Some practices might be classified as either one, depending on the focus. For example, interior design might be focused on convenient aspects such as practical displays and easily navigable aisles, or on interesting aspects such as novel layouts and striking décor (Mesher 2010). Similarly, plentiful locations and functional architecture can be convenient, whereas more unusual solutions can spark the imagination and invite exploration (Karrholm 2012). Some firms choose one or the other focus, whereas other firms may have a mix. For example, Starbucks has simple, similar stores on a seemingly endless multitude of street corners, but also some stores with strikingly creative architecture and interior design (Mitra 2021).

Other practices can arguably be inherently convenient or interesting. For instance, sensory marketing is utilized to engage consumers' senses (Krishna 2012). Although one cannot rule out the possibility that consumers could find such engagement convenient, it seems more likely that it will spark interest. Conversely, the option to simply tap a credit card at

the check-out counter is presumably less interesting than it is convenient.

Following is a discussion of some selected features identified as encouraging relatively high or low convenience and interest (c.f., Grewal et al. 2020 for a related typology of in-store technology with convenience as one of the factors). See Fig. 1 for a diagrammatical overview of our typology, which characterizes in-store features in terms of convenience and interest, thereby helping to illustrate how current store features may enhance or detract from immersive in-store experiences. Note that the characterizations of features are not intended to be rigid. For example, Fig. 1 characterizes features that *facilitate* as making the shopping process easier without sparking interest. This is not to say that no interest can be involved but just that the core benefit is convenience. Further, the following discussion is not intended to be comprehensive and will only briefly touch on some traditional features, whereas it will dwell longer on a few relatively more recent examples.

Disengage (low convenience, low interest)

Features in the disengage quadrant are low on both convenience and interest, such as architecture and design that are neither aesthetically appealing nor conducive to smooth navigation. These features may involve routine, mundane actions that customers consider to be chores rather than attractive aspects of a shopping experience. For instance, endless aisles with an overwhelming number of choices, many of which do not garner much interest, may complicate shopping and demand cumbersome navigation (Sorenson 2009). Clutter in the shopping environment can add to these effects. Salespeople placed by the entrance or exit, who slow down shoppers with unsolicited offers, might similarly fail to generate excitement. Retailers with too many features of this kind should consider significant changes to increase convenience and spark interest among their customers.

Facilitate (high convenience, low interest)

Features that facilitate shopping need not be interesting, but they provide convenience. Traditional examples include easily reachable locations, clear signage, and helpful employees. More recent examples include mobile and self-checkout options, smart carts, and arrangements to buy online and pick up in the store. We will expand on the latter examples, to better illustrate their role in our typology, and to highlight some related opportunities and challenges.

Mobile and self-checkout

Checkout counters represent a well-known bottleneck for shopping in physical stores, with long lines of customers trying to pay and exit. To ensure a convenient checkout process that frees up time for customers and employees alike, retailers like Carrefour in Europe, Kroger and Amazon Go in the US, and Iuiga in Singapore have introduced mobile and self-checkout options. Mobile checkouts involve customers scanning the products themselves as they pick them up from the

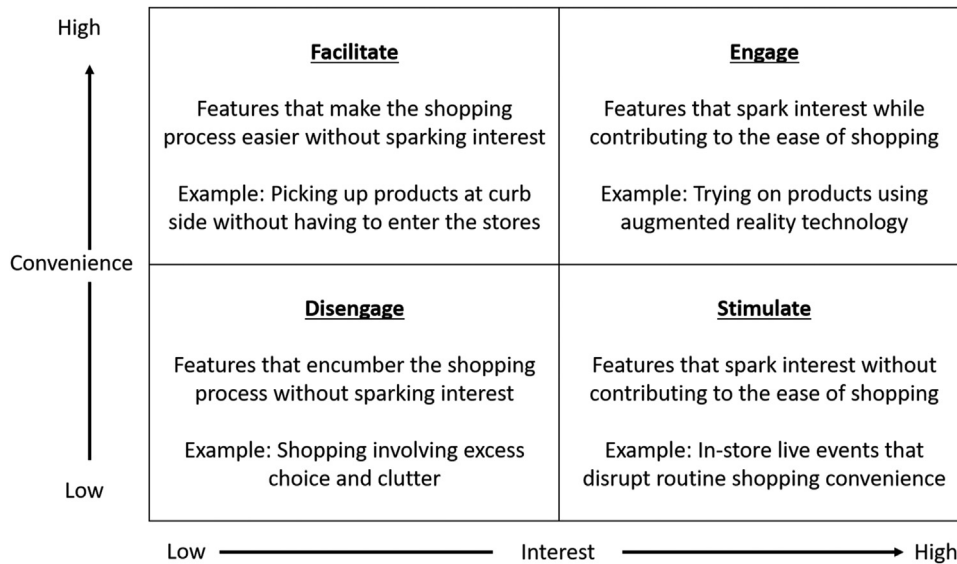


Fig. 1. Features contributing to immersive in-store experiences.

shelves, paying for them on their mobile phones, and leaving without waiting in line. The main aim is to reduce friction and enhance convenience. The number of stores providing mobile self-scanning is expected to increase to 160,000 worldwide by 2027 from about 46,000 in 2021 (Walk-Morris 2022). Adoption of the mobile checkout process has accelerated during and after the Covid-19 pandemic, with 7-Eleven rolling it out in 3000 locations in the US, and with Wegmans, Sam’s Club, and Dollar General either introducing or testing a mobile checkout feature (Walk-Morris 2022). However, mobile checkout is not without challenges. For instance, although it is a convenient option for many shoppers, it could be inconvenient in connection with complex or costly products that might require intervention from a sales representative. More generally, customers who are not very tech savvy might not be comfortable with mobile and self-checkout options. Smooth implementation of mobile and self-checkout also requires that retailers invest in the technology and ensure that it works as planned. The widespread adoption of mobile and self-checkout is lagging due to the associated costs for retailers, as well as glitches experienced by shoppers. For example, Wegmans discontinued its scan-and-go service three years after its 2019 launch, Walmart discontinued its scan-and-go service in 2018 and are now trying to resurrect it. Based on a 2021 report by Raydiant, 67% of 1000 survey respondents had experienced kiosk failure (Monteros 2022).

Smart carts

Similar to the mobile and self-checkout solutions, physical retailers are innovating to make the traditional shopping cart more user friendly and convenient, thereby making shopping more efficient. AI-powered carts come equipped with various sensors to detect products automatically as they are placed in the cart and can also provide additional information such as product weight, which can help in quick self-checkouts. Smart carts can also provide shoppers with recommendations based

on the products just chosen or on past purchases made by the shopper. For example, pasta placed in the cart might prompt a sauce suggestion, or based on the shopper’s purchase history, the cart may raise the possibility of running low on milk. Consumers appreciate functionality of these kinds, and as a result, smart carts are rapidly being deployed in stores around the world. Instacart’s “Connected Stores,” for instance, which are aimed at making in-store shopping experiences more convenient and efficient in numerous local and national retail outlets, include AI-powered carts (Choudhary 2022). Similarly, an Israeli firm called Shopic has announced that they are planning to deploy 2000 AI-powered smart shopping carts across 30 Shufersal supermarkets in Israel by the end of March 2023. Shufersal noticed an 8% increase in monthly spending for shoppers using smart carts and 78% larger basket sizes on average, with checkout taking less than one minute compared to 3.5 min when using self-checkout lanes and 9 min using traditional cashier lanes (Press 2023).

Buy online, pick up in store (BOPS) and curbside pickup

Many physical stores provide inventory information in real time, thereby giving customers options to fulfill their order online and choose a convenient store and time to pick it up. Similarly, curbside pickup involves a store associate carrying the product to the customer’s vehicle in a designated area at the store. These types of arrangements can sometimes be preferable to purchasing from purely online stores, as customers can pick products up at their discretion rather than waiting for delivery. However, the arrangement requires the brick-and-mortar stores to coordinate their product movements efficiently. For instance, if a particular store does not carry or has sold out the relevant product, that store must obtain the item from a nearby store before the customer arrives. Despite such challenges, retailers are reaping rich benefits from BOPS, which accounted for almost half of Home Depot’s online sales in 2018 and 40% of Best Buy’s online sales

in the third quarter of 2020, while its success at Nordstrom led to the creation of exclusive pick-up spaces in residential areas in New York and Los Angeles (Ström 2021). The popularity of BOPS (also referred to as “click and collect”) has also grown rapidly due to Covid-19, as it removes the need for customers to interact with others while shopping. In summary, BOPS has several advantages, including no shipping costs, quick service, quick returns and exchanges, and safe and secure pick-up (Ström 2021).

Stimulate (low convenience, high interest)

Features that stimulate interest, however, need not contribute to convenience. For instance, a store tucked away in a hidden alleyway or nestled atop a skyscraper may pique interest without being convenient. Similar observations can be made for interesting architecture, interior design, and atmospheric elements such as music and ambient scent (Ebster 2011; Biswas 2019; Hagtvedt 2022; Spence et al. 2014). Activities such as art exhibits, in-store live events, and gamification further illustrate the nature of this quadrant in our typology, and we will expand on the latter three examples here.

Art exhibits

Artworks figure in retail outlets in various ways, ranging from family-owned stores with a few scattered paintings from local artists on the walls to full-blown exhibitions at Gucci or Nordstrom (Wang, Xu, and Zhang 2023). Although the artworks tend to spark interest as well as boost the appeal of associated products (Hagtvedt and Patrick 2008), there is little reason to suspect that they contribute to shopping convenience. Under certain circumstances, the artworks can even decrease product appeal, at least for luxury goods, because experiencing art can elicit a sense of self-transcendence, which decreases the desirability of mundane pursuits such as personal status (Wang et al. 2023). It is perhaps unsurprising that art does little to boost convenience, to the extent that art transcends functional concerns (Hagtvedt 2022). Relatedly, ambiguity, which tends to be central to artistic expression, is often at odds with marketing communication goals such as ease of understanding (Hagtvedt 2015; Zeki 2001). However, art retains a unique capacity to spark interest, which retailers can draw on to their advantage, whether to attract customers to their location, keep them from moving too fast through the store, or inspire them to spread word of mouth.

In-store live events

Live events are conducted in stores to build buzz and interest, and to create a sense of community. Brands may thereby introduce new products or attract new customers, while reinforcing loyalty among existing customers. For example, product sampling is a popular in-store event with both immediate and long-term impacts on sales due to category expansion, although its effectiveness depends on the store characteristics (Chandukala, Dotson, and Liu 2017). Launch parties are another form of in-store live events conducted by brands. For

instance, beauty pop-up Beautyque had a week-long launch event for makeup and skincare products in New York, which included aesthetician consultations followed by makeup tutorials and manicures provided by specialists (Scianna 2021). Such events tend to increase foot traffic while educating customers about new products. Whereas numerous kinds of retailers presumably can benefit from these events, they are perhaps a particularly good fit for cosmetics, fashion, and health-related products, given the need for advice and live interaction in such categories. For example, Chanel’s pop-up store Atelier Beaute in 2019 allowed customers to try out their newer collections, take pictures, and get expert advice by booking a 20-minute consultation (Mukherjee 2022). If done right, events such as these can enhance a shopping experience and leave a lasting impression. However, they can also be inconvenient; customers participating in the events may find that they are time-consuming and effortful, whereas customers uninterested in the events might find them distracting and become annoyed at the need to navigate associated clutter and crowded aisles in the store.

Gamification

Similar to in-store live events, the main idea behind gamification, which involves the use of games or puzzles in a non-game situation, is to enhance consumer interest. In turn, research finds that promotional games at retail stores leads to increased consumer spending (Hock, Bagchi, and Anderson 2020). Although gamification is more popular and prevalent in online retail, offline stores are also working on integrating it with an aim towards engaging customers and increasing brand awareness, loyalty, and sales. For instance, customers buying drinks at Starbucks receive stars, and when a certain threshold is reached, the stars can be redeemed for other drinks or prizes. Similarly, Toys-R-Us has incorporated games in its physical stores, where customers are expected to collect QR codes and scan them in-store to redeem online vouchers (Ekbote 2022). Adoption of gamified solutions is especially high in the retail sector (28.6% market share, followed by the education sector) with the worldwide gamification market expected to grow at 27.4% (CAGR) and aiding in the rise of engagement and loyalty by about 30% (Georgiou 2023).

Engage (high convenience, high interest)

In the current typology, engaging experiences are both convenient and interesting. Retailers can create such experiences by, for instance, combining offerings, using innovative technologies or non-traditional store layouts, or building an open, flexible, and scalable digital infrastructure (Mueller 2022). Some specific examples of engaging features include functional aesthetics, visual merchandising and atmospherics, on-site restaurants, micro-retailing solutions, and AR and VR technologies.

Functional aesthetics

The aforementioned notion that artworks transcend functional concerns does not imply that aesthetics cannot have a

functional purpose. Further, the perception of a well-designed function can have its own aesthetic impact, as in an eagle's flight, a stallion's gallop, or an automobile's handling (Hagtvedt 2023). One might assume that many consumers, when scrolling content on an iPhone's screen for the first time, experience beauty in this functionality. Similarly, they may appreciate the aesthetics of buildings, interiors, and products—not necessarily in spite of functionality, but in part because of how that functionality affects them. For instance, consumers might find a retail store to be aesthetically pleasing in part because of how easily they can move through it and gain sensory access to the merchandise. As a related example, interstitial space in product displays lead consumers to perceive the products as aesthetically pleasing (Sevilla and Townsend 2016), and a similar effect might apply to the store itself. In such cases, the aesthetic appeal appears aligned with both interest and convenience.

Visual merchandising and atmospherics

Relatedly, the role of visual merchandising as a product-driven display function is closely associated with the store-wide display function of atmospherics (Basu, Paul, and Singh 2022). Depending on how they are employed, both may arguably fit within the stimulate quadrant or the engage quadrant of the current typology; these features tend to be interesting, but they can also be convenient. For instance, visuals may not only attract attention but also illustrate products' usage or location. Similarly, scents and sounds may spark interest, but they may also guide consumers through a store. Physical retail stores often invest a great deal in visual merchandising intended to attract customers and encourage them to explore options, thereby increasing sales; industry research suggests that 93% of shoppers consider visual impressions while making a purchase decision (Chakraborty 2022). Nike's immersive 3D world retail display, called Nikeland, provides a life-like experience for customers at Nike's House of Innovation in New York City (Domingo 2022). Similarly, Coach New York has created a huge dynamic 3D immersive installation where the brand mascot, a T-rex, virtually jumps out of a store window with the focal brand's products in its mouth, and Seed Heritage in Melbourne offers a unique store-within-store experience to quickly draw customers' attention towards offered products (Chakraborty 2022).

In-store restaurants

A number of retailers are also partnering with restaurants and eateries; the option to take a break during shopping to enjoy some food can be convenient and make the excursion more interesting, too. For example, Kroger has partnered with Kitchen United and Saladworks to offer in-store food halls and salad bars, respectively, while California-based boba tea chain Percolate partnered with Sprouts Farmers Market's 380 stores to provide in-store tea tasting options (PYMNTS 2023).

Micro-retailing

Consistent with the aforementioned observations that endless aisles with overly large assortments can be detrimental to

both convenience and interest (Sorenson 2009), some stores, such as IKEA, Target, and Sephora, are downsizing to provide better curated selections of products and to present them in a more appealing manner. IKEA's micro stores allow customers the opportunity to interact with staff and physically experience a limited selection of products before placing online orders. Both the show pieces and IKEA's larger assortment of products are available online, for delivery within 24 h (Gilliland 2018). Argos has opened 41 "digital stores" in Sainsbury's supermarkets, allowing customers to pick up products ordered online. The convenient solution provides exposure to both Argos and Sainsbury stores (a store-within-a-store experience). Sephora studio, another micro store, provides customers with a personalized boutique experience rather than a regular large mall store experience (Gilliland 2018). In addition to having limited space requirements, micro stores are relatively easy to set up in desirable locations and staff with local residents (Gilliland 2018).

Augmented reality

Whether in large or small stores, the use of AR is steadily on the rise among retailers, to entertain, educate, and help customers to evaluate products, as well as enhance consumption- and post-purchase experiences (Fritz, Hadi, and Stephen 2022; Tan, Chandukala, and Reddy 2022). For instance, Starbucks reserve roastery enables customers to visualize the coffee making process (Dahlstrom 2017). Walmart is partnering with Nickelodeon to let customers interact with in-store signage, thereby transforming their shopping experience into an adventure. Lowe's in-store navigation app provides pertinent information while shopping, and BMW showrooms have tablets that allow customers to customize the design and colors of cars (Marr 2021).

Virtual reality

Along with AR, VR is increasingly being used in brick-and-mortar stores. For example, Nike customers can scan items in-store to view additional information using AR, or they can enter a virtual world to visualize Nike's entire supply chain and see where the products are made (Marr 2021). Similarly, Toms has incorporated VR into hundreds of their physical stores, to virtually transport customers to Peru. For every \$3 Toms makes, the company donates \$1 to people in the supply chain, this technology allows customers to virtually experience some of the related impact (Marr 2021).

Mixed reality

As the name suggests, mixed reality (MR) combines AR and VR, bringing virtual elements into AR environments, thus enhancing the consumer experience without the intensity of a full VR immersion (Byondxr 2022). Despite being in early stages of development, MR helps to integrate offline stores with realistic and interesting online shopping experiences. For example, Bloomingdale's' collaboration with Ralph Lauren during Father's Day included a number of large touchscreens that consumers could use to browse and customize virtual products and to visualize entire outfits (Morozova 2017). The

general interest in these immersive technologies is high; according to a recent survey, 61% of the respondents were more likely to buy from a brand that uses such technologies, and 64% of leading consumer brands are beginning to invest in them (Baar 2020).

A typology in flux

Broadly speaking, a recommendation for retailers would be to move from features in the disengage quadrant toward features in the other three, and especially toward the engage quadrant. However, it should be noted that not all features are equally practical to implement for each company, brand, product category, or set of circumstances. Indeed, the ease or desirability of implementing specific features may change over time. In addition, the extent to which a given feature fits into a given quadrant may also change over time. For instance, repeating the same live in-store events might eventually cause them to lose their luster, with the result being disengaged customers. Similarly, novel AR features might eventually lose their entertainment value but retain their convenience value, thereby moving these features from the engage quadrant to the facilitate quadrant. Furthermore, consumers may vary a great deal in which features they find to be interesting or convenient; given this heterogeneity, retailers should keep an eye on tendencies within their own customer base. In other words, whereas the current typology is intended as a guiding framework, retailers will need to actively monitor changing circumstances to evaluate the usability of specific features. Given that features may vary in the extent to which they spark short-lived or lasting interest, retailers must also weigh the benefits of continually stimulating interest in various ways against the potential drawbacks of doing so, such as monetary costs or disrupted continuity in store operations. Relatedly, if stores undergo radical changes in efforts to spur interest, customers could be turned off as a result (Breugelmans et al. 2023).

The role of pleasure and other factors

As noted at the outset, the combination of convenience and interest is not an exhaustive explanation for the potential of immersion in retailing contexts or elsewhere. For example, pleasant sensory stimuli such as lighting, music, and ambient scent can be intrinsically appealing and invite approach behavior (Biswas 2019; Knasko 1995; Krishna 2012; Spence et al. 2014). Whereas sensory engagement thus contributes to immersion, it might also be noted that the experience of immersion can in itself provide pleasure. In other words, alongside interest and convenience, pleasure may play a central role in immersion. Other potential factors include stimuli that provoke arousal or emotions of various kinds, to the extent that those stimuli are captivating to shoppers. Some of the associated effects would be captured by the current typology of interest and convenience, but future research may add more nuance to the framework. Such research could also consider the roles of factors such as evolving product categories and diverse and changing demographics; it may not be

just the typology presented here that is in flux, but also the individuals, products, brands, and environments involved in immersion.

Agenda for future research

To develop convenient and interesting features that fit with their stores, retailers rely on access to information. They need data about both the seller side (e.g., pricing effects, promotional expenditures) and the buyer side (e.g., customer engagement, purchase behavior). The former data are obtained relatively easily, but the latter require efforts such as unobtrusively observing and recording in-store behaviors. Fortunately for retailers, new technologies can provide access to new types of data about shopper behaviors. For instance, AR screens and apps, digital displays and signage, electronic price labels, innovative payment options, RFID tags, and motion sensors enable retailers to collect detailed information about shoppers and their behaviors in the store. Notably, several of the relatively recent features that provide convenient and interesting in-store experiences for customers also provide retailers with opportunities to collect this latter type of data. Linking to Fig. 1, store features in the disengage quadrant are associated with fewer sources of data compared to features in the other quadrants. Features in the engage quadrant are associated with the largest amount of information due to data obtained from sources such as AR/VR interfaces. This additional information can help retailers analyze customer behavior and gain insights to improve current immersive experiences as well as develop new ones for the future. Advances in artificial intelligence (AI) and machine learning (ML) are facilitating the handling and analysis of the growing quantity of data.

There is a large potential for research employing technologies that inform retailing decisions ranging from product assortments to store layouts. For instance, The North Face has implemented WeatherFX, a predictive analytics program that taps into weather patterns and customer behavior data to help guide decisions about staffing, products to stock, and cross-channel marketing efforts at various store locations (Mintz 2020). In-store data on shopper movements (Ewen 2022) and interactions with products across various categories (Burke, Chandukala, Christensen 2023) can also help retailers to design efficient store layouts. Further, retailing outlets such as Farfetch's Store of the Future link their online and offline data to enhance the in-store experience. In its London store, Farfetch uses its online data in-store to connect clothing racks, touch-screen-enhanced mirrors, and sign-in stations to enable customers to try alternative products and payment methods without having to leave the changing room—thus merging online shopping with boutique shopping (Moore 2020).

In summary, not only are immersive in-store features providing new data sources, but the developments in data and analytics are also generating new insights into how to provide an immersive shopping experience. If managed properly, the self-reinforcing cycle may benefit both retailers and consumers. These observations emphasize the strides that have

been made in immersive retailing, as well as the opportunities for future improvements in this realm. However, research is needed to guide these developments, as questions remain for both traditional and more recent forms of physical store features. The following sections illuminate some potential avenues for such research.

Research questions for store features

Location

If a store's location has a specific appeal, when and why does it matter whether the store's features resonate with that appeal (Ghosh and Craig 1983)? For instance, does a particularly convenient location give rise to expectations about a convenient shopping experience in the store, too? Does a historic landmark or similar attraction suggest that the proximal store should echo that attraction in its interior design or product selection? Are there specific types of proximal attractions that lend themselves to specific types of stores and in-store experiences?

Architecture

Are there architectural elements that are particularly effective in drawing consumers into a store? For example, when might large windows and transparent displays entice potential shoppers, and when might less transparent alternatives evoke more curiosity (Lange, Rosengren, and Blom 2016; see Patrick, Atefi, and Hagtvéd 2017 for related notions in the context of packaging)? Further, how do such elements affect the shopping experience once consumers have ventured into the store? Are there tradeoffs to consider? For instance, perhaps stores that are more transparent (vs. opaque) from the outside are enticing but make the products seem less special once the customers are inside.

Product assortment and physical interaction

Similar tradeoffs may arise within the store. For example, eclectic assortments can be interesting, but they can also detract from a holistic store image, especially as customers can readily see the incongruities in an offline environment (Patrick and Hagtvéd 2011; Lamberton and Diehl, 2013). Further, the ability to touch and handle merchandise can be an advantage over online stores, but all the touching by other shoppers might also make the products seem less appealing (e.g., due to contagion; Huang, Ackerman, and Newman 2017). Products purchased online and delivered in a van may also have been touched and handled, but then the interaction is perhaps less salient to the consumer. In general, to the extent that physical presence magnifies the potential for immersive experience, it might also boost the negative aspects of that experience. A related topic pertains to the assortment available for browsing and buying. Whereas physical stores facilitate physical interaction, space considerations make it difficult to compete with the vast assortment available from online vendors with large warehouses. However, too much choice might also lead to cognitive overload and impede shopping (Chernev, Böckenholt, and Goodman 2015). Research is

needed to map out the circumstances under which more or less choice is preferable. As one salient example, luxury stores often have few items displayed with ample space, sometimes emulating museums and galleries (Logkizidou et al. 2019; Sevilla and Townsend 2016). How do different combinations of assortment size, display mode, and ability to handle products jointly influence an immersive in-store experience? Further, how do connotations of such factors interact with those of other branding efforts at the point of sale (e.g., exclusive luxury appeals interacting with the increasingly popular manifestations of corporate social responsibility, such as charity appeals; Hagtvéd and Patrick 2016).

Interior design and atmospherics

Product displays can also combine with general interior design to shape the in-store experience. For instance, stores can be organized to present offerings prominently and transparently or tuck away treasures to be found by curious customers (Ross, Bolton, and Meloy 2023). The former is presumably more convenient, but the latter could feasibly spark interest. A great deal of research on interior design, atmospherics, and sensory effects suggests ample opportunities to stimulate an immersive in-store experience (Krishna 2012; Roggeveen, Grewal, and Schweiger 2020; Spence et al. 2014). More work is needed to illuminate how these aspects influence specific shopping behaviors such as browsing or buying. For example, pleasant music might combine well with the coffee aroma at Dunkin' and inspire customers to linger in the store, but that is not necessarily what the company wants.

Biometrics

Biometrics represents another potential source of disconnect between what a company and its customers want. For instance, facial recognition may be convenient to both parties, in that it can provide individual-level information that facilitates individualized service, and it can also be used as a payment method (Moriuchi 2021). However, these types of technologies and procedures can spark privacy concerns (Inman and Nikolova, 2017). Future research could investigate the extent to which such tradeoffs affect immersive shopping experiences. For example, perhaps individualized service delights, whereas worrying about privacy leads to a mix of emotions that require careful navigation. More generally, what are the roles of emotions related to technologies that facilitate immersive in-store experiences but with which consumers may not be entirely comfortable?

Employees and customers

Similar questions arise in regard to employee behaviors, which may contribute to or detract from in-store experiences. Employees can build rapport via attentive and courteous interactions (Gremler and Gwinner 2008), but preferences for privacy and personal space may vary between individuals and depend on circumstances (Esmark and Noble 2018). Similarly, customers vary in preferences for crowding from other shoppers (Pons, Laroche, and Mourali 2006). Future research should investigate such individual, cultural, and situational

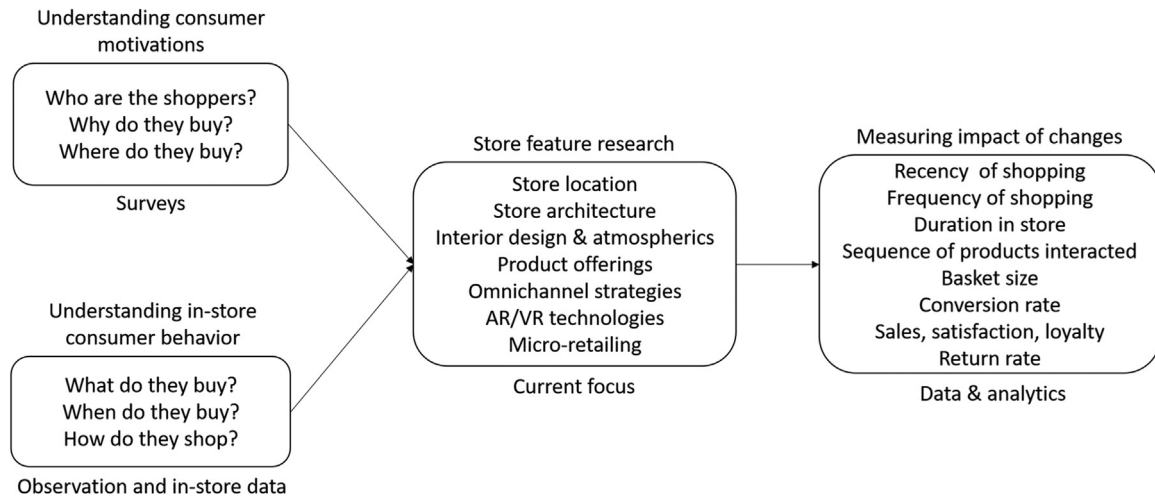


Fig. 3. Levels of research focus.

differences in regard to the influences of factors such as employee interactions and personal space on immersive in-store experiences.

Omnichannel strategies

Similar questions arise in regarding different aspects of omnichannel strategies. For instance, when and under what conditions does online gamification enhance offline immersive experiences? Are omnichannel strategies, such as ones involving online influencers promoting offline stores, effective in driving store traffic and improving shopping experiences? Why or why not?

AR/VR technology

Likewise, how does AR technology, which entertains and educates customers, drive store traffic, and how does it affect variables such as sales or brand loyalty? Does the use of AR technology to enhance post-purchase experiences increase future purchases? Can AR technology be used to create better customer recommendation systems? Do brands and retailers successfully use AR or VR to forge faster paths to innovation with increased access to large amounts of behavioral and observational data about customer experiences? If so, which steps are they taking to succeed? Do firms require new strategic marketing frameworks to assess the role played by technologies like AR/VR in enhancing immersive experiences (Hoffman et al. 2022)? Can AR/VR technologies spur sustained customer interest and facilitate convenient shopping experiences, or is the novelty factor an essential component that will wear off over time? How do retailers increase the synergy between AR/VR technologies and traditional marketing activities like advertising and promotions to improve shopping experiences? (See Tan, Chandukala, and Reddy (2022) for additional research queries pertaining to effective AR experiences.)

In-store restaurants

Even though retailers are partnering with restaurants to provide shoppers with more immersive experiences, the im-

pact of these partnerships is unclear. Specifically, how does opening in-store restaurants in retail stores influence customer purchase behavior and store loyalty? Can the in-store restaurant be distracting to customers and diners? What types of restaurants are ideal partners for retailers and what selection criteria should the retailers use in their decision-making?

In-store live events

How should retailers measure the impact of in-store launch parties and live events? Does the traffic created by the buzz of live events actually translate into long-term loyalty, or is the impact on sales transitory? Are certain types of brands or product categories particularly well suited for such events? How should the retailer deal with customers uninterested in the live events to ensure that they do not lose these customers in the future?

Smart carts

Given that smart carts provide a running total of the products purchased, it is possible that shoppers become more conscious of their spending and spend less. Does using AI powered shopping carts increase or decrease customer spending and retailer sales? How does the use of smart carts enhance product exploration and planned or unplanned purchase behavior? Does the use of smart carts influence customers' store loyalty?

Micro-retailing

With their diminished sizes, micro-retail stores are meant to be convenient, but do they perform better than larger regular retail stores in enhancing customer interest? Does a store-within-a-store enhance shopper experiences for both stores, or does it aid one store more than the other? If so, what are the factors that decide which store benefits and which store does not? Are the costs to retailers of setting up such stores justified in the long-run?

Concluding observations

Two observations may be useful to keep in mind when contemplating research opportunities. First, the research can involve empirical input at different levels, including consumer motivations and behaviors that inform the implementation of store features, as well as measurements of the impacts of such features. (See Fig. 3 for a sketch of relationships between focus levels.) Second, assessments of offline retailing practices should include the consideration of online alternatives.

This co-existence of offline and online options formed part of the impetus for the current work. Physical retail stores are continually challenged by their online counterparts, and although it often may be difficult to compete with the convenience of online retail, a physical presence offers unique opportunities for immersive experiences that combine convenience and interest. By introducing store features in a 2×2 typology of convenience and interest, we provide a practical lens for retailers to evaluate the role of these features in providing immersive in-store experiences. However, a great deal of research is needed to guide and supplement such evaluations.

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