Testing Retail Marketing-Mix Effects on Patronage: A Meta-Analysis

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Abstract

Retailers have always worked to establish close relationships with customers through the retail marketing mix. Thus, the literature has a long tradition of testing the effects of various instruments on retail patronage. This meta-study synthesizes prior research into one comprehensive framework. We use 14,895 effect sizes reported by more than 239,000 shoppers from 41 countries extracted from 350 independent samples, to test the impact of 24 marketing-mix instruments on retail patronage. Specifically, we investigate the direct and indirect effects of these instruments on store satisfaction, word of mouth, patronage intention, and behavior. Product and brand management related instruments display the strongest effects on most outcome variables, whereas price, communication, service and incentive management instruments affect only selected outcomes. Distribution management turns out to be of secondary importance. However, the effectiveness of these instruments depends on the specific shopping context (food/non-food, shopping frequency, single store/agglomeration, hedonic/utilitarian), the retail environment (gross domestic product, country innovativeness, retail sales share, retail employment, Internet era), and the employed method (participant type, study design, data source). Specifically, we reveal most differences for hedonic shopping environments and developed countries. Also, the store's advertising and atmosphere have gained importance in the Internet era, while purchase incentives, in-store orientation, and store location have lost relevance. This study contributes to a synoptic understanding of the comparable effectiveness of retail marketing instruments on retail patronage. It offers insights into the effectiveness of marketing-mix instruments and provides guidance on whether and when to invest in them. It also presents an agenda for future research on marketing-mix instruments.

The phenomenon of retail patronage has received significant attention in the retailing literature (Pan and Zinkhan 2006). Establishing and maintaining a close relationship with customers to convert them into "patrons" still represents a key strategic aim of many firms, as doing so leads to sustainable sales and profits and, thereby, return on investments (Hogreve et al. 2017). A substantial body of research has investigated the various factors that may affect shoppers' store patronage (e.g., store atmosphere, location) and specifically examined the influence of these factors on store satisfaction, word of mouth (WOM), and patronage intention and behavior. Many of these factors are part of retailers' marketing-mix instruments. The marketing-mix represents a set of coordinated tactical instruments that reflect managerially controllable decision parameters

aimed to establish and sustain retail patronage and influence the short- and long-term performance of retail organizations in terms of sales, profits, and return on investment (Berman and Evans 2010; Hogreve et al. 2017). Understanding the effectiveness of different instruments on retail patronage helps explain why customers shop where they do.

Despite its long tradition, literature on retail marketing instruments is fragmented, and empirical findings on various instruments are often inconsistent between studies, making it difficult to offer retail managers concrete guidance on when to employ the different instruments in what contexts (Pan and Zinkhan 2006). The meta-analysis we present herein addresses this issue by synthesizing empirical findings from 350 independent samples and more than 239,000 shoppers, reporting 14,895 effect sizes between mix instruments and retail patronage. In doing so, this research addresses two issues in particular. First, the study shows that most research examines the influence of seven groups of marketing instruments on retail patronage: man-

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agement of products (e.g., product range), services (e.g., parking conditions), brands (e.g., branded products), prices (e.g., perceived value), incentives (e.g., discounts), communication (e.g., advertising), and distribution (e.g., proximity to home) (Chernev 2014). While some studies find an effect for a specific instrument, other studies report no effect for the same instrument. For example, Lumpkin and Burnett (1991) find that low-price offerings are non-significant, while Thelen and Woodside (1997) find a positive effect. To clarify the effectiveness of different instruments, this meta-study summarizes empirical research by testing the impact of 24 marketing-mix instruments on retail patronage. Integrating and testing these instruments in one framework allows us to (1) compare the instruments' relative influence on retail patronage, (2) assess potential direct and indirect effects on patronage by considering mediating effects, and (3) control for potential confounding effects not considered in studies examining only a limited number of instruments. Such a comprehensive consideration of marketing-mix instruments was postulated in early studies in the marketing discipline and grounded in the idea that the application of instruments needs to be coordinated owing to their interdependencies (Chernev 2014). A better understanding of the relative importance of different instruments should help managers allocate their financial resources more successfully across instruments. For example, Walmart spends US$2.9 billion on advertising every year, thus implying the importance of understanding the patronage effects of this instrument (Statista 2017).

Second, the inconsistencies in the literature may also be due to contextual differences across studies, such as country differences. While many studies have examined retail marketing instruments in the U.S. (Baker et al. 2002), other studies have done so in country markets such as Austria (Teller and Reutterer 2008) or Taiwan (Wang 2009). Although shopper behaviors in different countries have become more similar in the past decades, some country differences may still have caused the inconsistencies in prior empirical research. For example, retail marketing instruments focusing on building relationships may work differently in less developed countries, in which social support in daily life is more important to the individual, than in developed countries (Swoboda, Berg, and Dabija 2014). Therefore, the goal of our meta-study is to shed more light on the impact of retail environment characteristics (Gross Domestic Product [GDP], country innovativeness, retail sales share, and retail employment) on the effectiveness of retail marketing instruments.

In addition to environmental differences, the study examines the influence of the shopping context (food/non-food, shopping frequency, single store/agglomeration, hedonic/utilitarian, and Internet era). While in their meta-analysis, Pan and Zinkhan (2006) examine the influence of some contextual factors (e.g., shopping mode, product type), they do not investigate other factors related to the retail environment and shopping context. A better understanding of such moderating effects would not only provide managers with guidance on the effectiveness of marketing-mix instruments and when to employ them, but also contribute to theory by clarifying the generalizability of the effects of specific instruments to the establishment of retail patronage. Kamakura, Kopalle, and Lehmann (2014, p.

121) emphasize the importance of empirical generalization by explaining that "grouping related studies (replications) can provide a more powerful test of specific theories than any single study as well as help identify boundary conditions for them."

Literature

Conceptualization of Retail Patronage

Retailing literature often focuses on the behavioral aspects of retail patronage from a customer's viewpoint and uses the number of store visits and store choice to measure patronage (Pan and Zinkhan 2006). Nevertheless, Baltas, Argouslidis, and Skarmeas (2010) discuss a wider view of retail patronage and propose additional dimensions that describe a close relationship between customers and a retailer. Earlier work by Howell and Rogers (1981) explicitly criticizes the strong focus on the behavioral dimension for neglecting other closely related dimensions of the phenomenon, which they consider vital to understanding what actually constitutes retail patronage, such as attitudinal factors.

In general, patronage describes a close and sustainable relationship between a patron and his or her client (Waite 2012). In a retail context, the patron refers to the customer who patronizes a retailer and its store (Darden, Erdem, and Darden 1983). The concept of patronage in general, and in retailing in particular, is characterized by reciprocity between the partners in this relationship, whereby the retailer offers services to its patron and, in return, the patron displays a positive attitude and behavior toward the retailer. In addition to behavioral aspects, the literature employs several variables to measure patronage, including customer satisfaction (Babin, Darden, and Griffin 1994), patronage intention (Baker et al. 2002), and WOM (Lacey, Suh, and Morgan 2007). Consequently, we use a multi-dimensional approach to the measurement of retail patronage herein and differentiate among WOM, patronage intentions, and behavior as outcome variables. We treat customer satisfaction as an outcome variable but also consider indirect effects on other outcomes.

Evolution of Retail Patronage Research

In reviewing the patronage literature, we observe increasing attention from the beginning of the 1980s and 1990s onward and a growth in such studies. A milestone in retail patronage research is the meta-analysis by Pan and Zinkhan (2006), who were the first authors to give an overview of the determinants of retail patronage behavior. Their work synthesized empirical findings from 80 studies and differentiated between 11 marketing-mix instruments. The authors found that instruments such as atmosphere and low prices influence shoppers' patronage behavior. The current meta-analysis builds on that research and extends it in several ways. In particular, our study examines 24 instruments tested in 350 samples, with many instruments not having been meta-analyzed before. It differentiates between various patronage dimensions because of their possible influence on each other and identifies new moderators that have also not been examined previously.

The number of journal articles on non-store and online retail patronage increased with the advent of the Internet as a shopping medium. The focus of these studies is often on specific online patronage dimensions and antecedents, which is more specialized than store-related patronage research and lacks inclusiveness of key instruments. The more recent emphasis of research on omni- and multi-channel retailing has not significantly considered the phenomenon of cross-channel patronage and its drivers. Thus, the current meta-analysis focuses on store patronage and does not examine cross-channel instruments.

Despite the number of studies on and interest in the phenomenon, we find both a selective focus on one or some instruments in prior research. This focus can be differentiated by sets of instruments in the marketing mix.

Product and service

The core business of retailers is to compile ranges of products and services and ensure availability for consumers to satisfy their wants and needs (Berman and Evans 2010). Accordingly, this group of instruments involves managing the range in terms of depth and width, services related to the shopping process, and the type and quality of products and services. As product and service management represents a key area of retailing, the impact of these instruments is a main feature in patronage literature, particularly product range and quality (Bhatnagar and Ratchford 2004; Mazursky and Jacoby 1986).

Branding

Managing brands and building brand equity have become increasingly important in retailing, particularly as a source of distinctiveness and competitive advantage (Chernev 2014). Most research examines the impact of branding on retail patronage on a product level, though research has also paid attention to the impact of corporate branding.

Pricing

Another set of instruments featured in patronage literature is related to managing prices. Pricing, which translates into a certain image that becomes a salient store attribute (Baker et al. 2002), entails the level of price, including pricing-related cues (e.g., unit pricing) (Zielke 2011). Research frequently focuses on the price level and value.

Incentives

This marketing-mix set subsumes short-term stimuli for customers to patronize stores and incentives to reward loyal behavior. The retail patronage literature significantly features the impact of price promotions (monetary incentives), whereas contributions on the effectiveness of loyalty programs are comparatively limited (non-monetary incentives).

Communication

Retailers regularly communicate with customers to encourage favorable perceptions of the store and retail organization (e.g., Berman and Evans 2010). Retail communication tries to "pre-sell" the store to the customer and represents a key antecedent of patronage. A significant body of research has explored the effectiveness of visual and non-visual atmospheric cues (e.g., Baker et al. 2002; Roschk, Loureiro, and Breitsohl 2017) and the atmosphere in general (e.g., Donovan et al. 1994) on retail patronage. Another important communication medium featured significantly in retail patronage literature is sales personnel and personal selling (Baker et al. 2002). Nevertheless, only a comparatively limited amount of research is available on retail advertising and public relations.

Distribution

This set of instruments involves satisfying demands by making products and services available to customers at the point of sale, and it entails channel and location management in a retail context. The latter has been discussed in retail patronage literature extensively with respect to accessibility of (Bhatnagar and Ratchford 2004) and the temporal and spatial distance to a store and retail agglomeration, such as mall, outlet center or urban store cluster (Arentze and Timmermans 2001). Some studies focus on the effects of consumer logistics and the cost side of distribution undertaken by the customer when they shop.

Online retailing

Research has increasingly investigated the importance of online formats as an alternative or complement to store-based channels service (i.e., customer and delivery services) (Ruby and Zhao 2010) and communication-related instruments (i.e., website and online store characteristics and e-atmospherics) (Szymanski and Hise 2000). Given the nature of store-based versus non-store-based retail formats, the marketing mix is very different, and many instruments outlined are not relevant (e.g., in-store services) or are difficult to compare (e.g., in-store vs. online atmospherics). Instruments relevant for both formats (e.g., product range) are rarely of primary concern in online patronage research.

Current State of Patronage Research

In assessing the current state of research, we observe several patterns and shortcomings related to the (1) number of examined instruments, (2) format and industry focus, and (3) country focus. First, studies either have not tested a comprehensive set of instruments in their research models or have treated them as control variables. This limitation is problematic because the instruments in a retail marketing mix are interrelated, and omission of some key instruments could result in confounding effects. A comprehensive consideration of different patronage measures is also rare, and studies often do not consider indirect effects of instruments through mediators, which prevents a comprehensive understanding of which instruments affect retail patronage—directly, indirectly, and totally.

Second, most studies on retail patronage and its antecedents feature a particular retail format of a specific industry. On a single format level, this is clearly the grocery industry. In terms of supra-store or agglomeration formats, we find studies on shopping centers, particularly malls, most frequently featured. Multi-format comparisons are presented infrequently (Teller, Wood, and Floh 2016), and cross-industry comparisons even

more so (Swoboda, Pennemann, and Taube 2012). Thus, literature provides insufficient insights into which instruments are more effective in various retail contexts.

Third, most of the retail patronage research is domestic in nature. Country comparison and, thus, comparisons between different retail environments (e.g., developed vs. developing countries) are the exception (Severin, Louviere, and Finn 2001). The main focus of studies is on North America and Western European countries (Grewal et al. 2003), which leads to a lack of understanding of which retail instruments are more effective in different retail environments.

In summary, despite the wealth of findings, a comprehensive view of the effects of marketing instruments on retail patronage is missing. This also includes a view of the varying effectiveness of instruments related to different contextual settings.

Conceptual Model, Theoretical Foundation, and Hypotheses

Fig. 1 presents the conceptual framework guiding the meta-analysis. To develop the framework, we reviewed the literature on retail marketing-mix instruments and patronage to identify key constructs. We propose that 24 instruments, assigned to seven groups, affect the outcome variables. Chernev (2014) groups marketing instruments into the following categories: (1) product management, (2) service management, (3) brand management, (4) price management, (5) incentive management (6) communication management, and (7) distribution management. As the influence of individual instruments on patronage has received significant attention, we briefly discuss the underlying theories but do not derive hypotheses. Finally, the framework suggests that the effectiveness of some instruments depends on the shopping context, retail environment, and method.

Theoretical Underpinnings of Retail Patronage

Sheth's (1983) integrated theory of patronage preferences and behavior proposes several groups of factors that form retail patronage. It focuses on how individuals interpret and perceive various stimuli, such as market-, company-, and product-related factors, that affect their attitudes and behavior. In line with stimulus–organism–response theory, research assumes that a set of attributes affects consumer perceptions, which are external to the consumer and act as the originators of his or her behavioral response (Mazursky and Jacoby 1986). These theories are often applied at a retail store level, with the aim to understand the drivers of consumers' store perceptions and patronage behavior (Mazursky and Jacoby 1986). As these theories cover various external factors, researchers often use multi-attribute utility theory to gain more specific insights into retail marketing-mix effects (Wallenius et al. 2008). According to this theory, the utility different instruments provide determines the preference for a given venue and patronage behavior. Instruments can reflect both costs and benefits for customers (e.g., Chernev 2014). Whereas instruments such as accessibility and parking are related to customer costs, retail-offer-related instruments represent customer benefits. The theory proposes that the store providing the most

benefits relative to costs becomes the patronized store (Wallenius et al. 2008). After purchasing, customers compare their initial expectations of the retailer with its actual performance, which influences customer satisfaction and the likelihood of recommending the retailer to family and friends (Oliver 1980). The discussed theories support the view that the application of marketing instruments influences the perception of a store. We thus propose that the instruments influence retail patronage directly, but also indirectly through mediators. Similar to Evanschitzky and Wunderlich (2006), we suggest mediating effects through satisfaction, patronage intentions, and behavior.

Shopping Contexts as Moderators

Food/non-food retail formats

We propose that effectiveness of retail mix instruments differs for retailers carrying food versus non-food items. Customers purchasing food often decide at the point of sale which products to buy and how much to spend (Chandon et al. 2009). Customers often enter different stores with different shopping missions, mindsets, and goals. Particularly in food retailing, customers enter stores without knowing which product decision they will make, but they are keen to browse the store to discover and assess new products. While customers may be aware of their specific needs (e.g., cook for guests, find an inexpensive meal), they do not yet know the solution. These customers frequently engage in unplanned purchases or impulse buying. To explain why these purchases occur, Inman, Winer, and Ferraro (2009) emphasize the importance of in-store stimuli, which illuminate shopping needs consumers are unaware of or activate forgotten needs.

In food retailing, in-store marketing is more important than traditional out-of-store marketing (Egol and Vollmer 2008). Impulse buying studies particularly emphasize the store atmosphere as a cue for customer spending. Appealing music and a tempting scent increase the likelihood of unplanned purchases (Mattila and Wirtz 2001). Retailers also use discounts and other incentives to trigger unplanned buying (Beatty and Ferrell 1998). This literature suggests that personal selling can inspire customers to purchase (Mohan, Sivakumaran, and Sharma 2013). While these instruments may gain importance in food retailing, we also propose that product quality loses relevance when customers decide about their food purchases. Specifically, customers buying groceries are used to inspecting the freshness and quality at the point of sale because these product ranges display greater quality variations (Kerin, Jain, and Howard 1992). As such, product quality is of comparably lower relevance for food than non-food retailers. Thus:

H1. The positive impact of some retail marketing instruments (atmosphere, incentives, personal selling) on customer outcomes is stronger for food retailers, while that of other instruments (quality of products) is stronger for non-food retailers.

Shopping frequency

Frequency of shopping depends primarily on the type of commodity involved (Applebaum 1951). While some retailers offer product ranges that customers purchase on a weekly or

Retail Marketing Mix

Product
  Product range
  Quality of products
Service
  Customer service
  Maneuverability
  Orientation
  Parking
  Retail tenant mix
  Service tenant mix
  Shopping infrastructure
Brands
  Branding product level
  Corporate brand
Incentives
  Monetary incentives
  Non-monetary incentives
Communication
  Advertising
  Atmosphere
  Personnel selling
Price
  Low prices
  Perceived value
Distribution
  Access from parking
  Access to store
  Proximity to home
  Proximity to work
  Spatial distance
  Temporal distance

Shopping contexts
Food (non-food)
Frequent (infrequent)
Agglomeration (non-agglomeration)
Hedonic (utilitarian)

Method
Student sample (non-student)
Cross-sectional (longitudinal)
Secondary data (survey)

Outcomes
Customer satisfaction
Patronage intention
Patronage Behavior
Word of mouth

Retail Environment Characteristics
GDP per capita
Country innovativeness
Share of retail sales
Employment in retailing
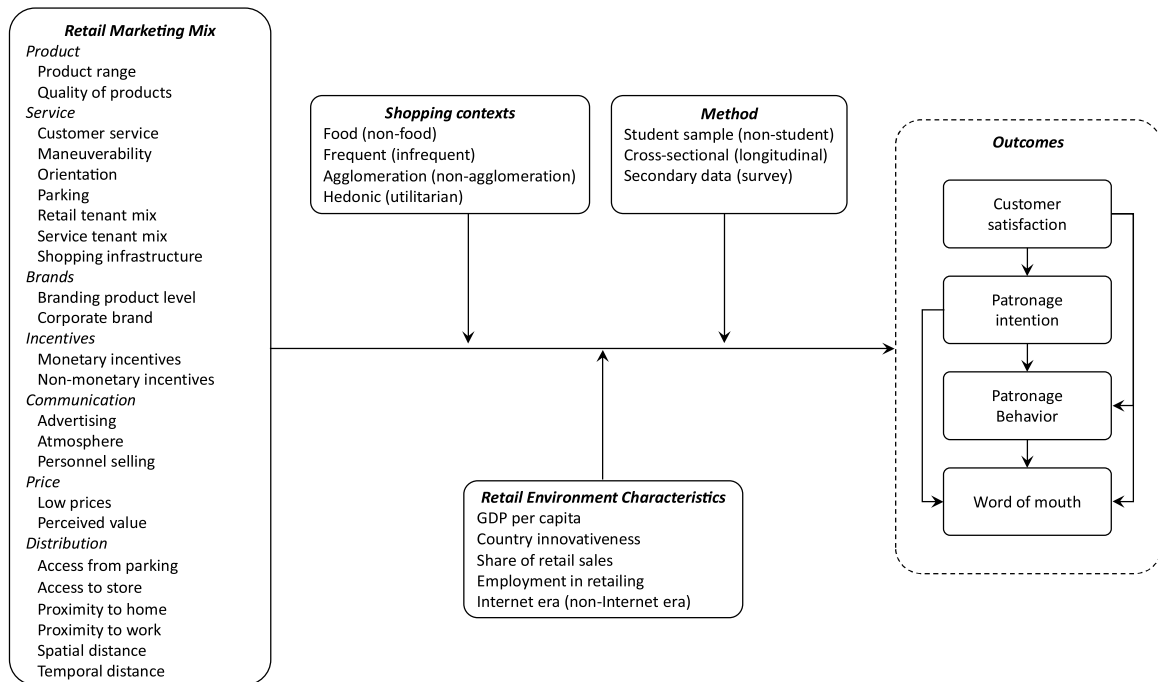Internet era (non-Internet era)

Fig. 1. Meta-analytic framework.

monthly basis (e.g., groceries), others carry items purchased less frequently (e.g., consumer electronics). The more often customers visit a specific store, the more they are exposed to the retailer's marketing instruments. Interactions between customers and firms increase the likelihood of learning about the firms and their offerings (Bendapudi and Leone 2003). Mägi and Julander (2005) explain that customers' price knowledge depends on the frequency of store visits. With frequent interactions, consumers are more likely to store pricing information in their minds. With a better understanding of a store's prices, the offered value gains importance for customers. Kumar, George, and Pancras (2008) show that customers also learn about the retailer's abilities and intentions during interactions. They explain that these experiences encourage customers to try additional services in the store and to interact with sales personnel, leading to additional purchases.

At the same time, literature indicates that some instruments may lose relevance with higher interaction frequency because customers develop a better understanding of the store and its offerings. While expert customers use more information sources and have domain expertise, novice shoppers rely on fewer information sources, such as advertising (Evanschitzky and Wunderlich 2006). Lacking helpful personal experience with a retailer, advertising is more relevant for novice customers. Evanschitzky and Wunderlich (2006) also explain that expert customers are generally more aware of alternative choices. Novice consumers lack this knowledge and also have difficulties in distinguishing important from unimportant information (Dagger and Sweeney 2007). In our study, we also propose that the retail tenant mix which is important for retail agglomerations is less relevant for customers with frequent interactions. Expert customers need fewer stores to complete their shopping

tasks because they know the different stores in an agglomeration well. By contrast, novice customers must browse more stores to complete the same shopping task. Thus:

H2. The positive impact of some retail marketing instruments (perceived value, personal selling, services) on customer outcomes is stronger for frequently visited retail formats, while that of other instruments (advertising, retail tenant mix) is stronger for infrequently visited retail formats.

Retail agglomerations

We differentiate between retail agglomerations and single-store formats in our study. Retail agglomerations, such as shopping malls, are appealing to customers because they provide additional value, given the greater selection of products and services, atmospheric stimuli, and entertainment facilities (Teller, Wood, and Floh 2016). Beatty and Ferrell (1998) explain that customers entering shopping malls receive inspiration there and often spend money without having any specific pre-shopping intentions. Advertising literature also suggests that marketing stimuli presented in positive contexts lead to a more positive appreciation of the stimuli (Aylesworth and MacKenzie 1998). Research explains that the positive evaluation of the context is transferred onto the marketing stimuli, making the instrument more effective in these contexts (Tavassoli, Shultz, and Fitzsimons 1995). We therefore propose that instruments that stimulate purchase are more effective in agglomerations. While instruments, such as advertising and atmosphere, also influence customers in single-store settings, these instruments applied in a highly appreciated context such as a mall lead to a higher effectiveness in influencing patronage (Aylesworth and MacKenzie 1998). At the same time, quality of products, maneuverability, and orientation are comparably less effective in agglomerations.

One main motivation to visit malls is to spend time and engage in recreational browsing (Bloch, Ridgway, and Dawson 1994). Customers visiting malls usually enjoy browsing ranges of different product quality and explore the mall even when doing so requires some time. Thus:

H3. The positive impact of some retail marketing instruments (advertising, atmosphere, incentives) on customer outcomes is stronger in retail agglomerations, while that of other instruments (quality of products, maneuverability, orientation) is stronger in single stores.

Hedonic/utilitarian consumption

We also distinguish between hedonic (or experiential) and utilitarian (or functional) shopping contexts (Childers et al. 2002). While customers in hedonic shopping contexts seek enjoyment and perceive shopping as fun, utilitarian shopping contexts reflect "shopping as work," with the aim to purchase products as efficiently as possible (Babin, Darden, and Griffin 1994). Hedonic and utilitarian shoppers also display a different type of shopping behavior. Motivation theory suggests that two types of motivation drive human behavior: extrinsic and intrinsic (Deci 1975). The marketing instruments included in our model represent extrinsic motivation through low prices, incentives, quality of products, and convenient locations, because they focus on the provision of functional benefits. The model also addresses intrinsic motivation through in-store atmosphere, the (service) tenant mix, and customer services, which provide customers with pleasure and satisfaction during the shopping trip. Dennis et al. (2012) also explains that particularly the entertainment and ambience in a store are appealing for hedonic shoppers. We propose that instruments addressing extrinsic needs are more important in utilitarian shopping contexts, while those addressing intrinsic needs are more important in hedonic contexts. Thus:

H4. The positive impact of some retail marketing instruments (atmosphere, service tenant mix, customer service) on customer outcomes is stronger in hedonic shopping contexts, while that of other instruments (low prices, incentives, product quality, proximity from home/work, spatial and temporal distance) is stronger in utilitarian shopping contexts.

Retail Environment Characteristics as Moderators

GDP per capita

According to the concept of cross-national distances, countries differ in their business systems and economic context (Berry, Guillén, and Zhou 2010). Economic differences such as a country's income level (GDP per capita) may influence customers' decision-making and spending behavior in different countries (Miller, Reardon, and McCorkle 1999). Specifically, in the international business literature, these indicators are related to consumer purchasing power and preferences (Berry, Guillén, and Zhou 2010). Consumers in countries with a low GDP have a lower disposable income, which in turn leads to lower shopping expenditures (Mallen 1996). Their main shopping motivation is satisfying their basic needs with limited resources. In these countries, shoppers are more likely to buy inexpensive products

and rely more on the perceived value (Hsieh, Pan, and Setiono 2004). These customers prefer discount stores to other formats (Herstein and Vilnai-Yavetz 2007). Price-conscious and low-income shoppers put less emphasis on convenience and service in stores. Conversely, customers living in high GDP countries not only can afford satisfying higher needs but also have different preferences for products and services (Hsieh, Pan, and Setiono 2004). Literature indicates that when basic needs are met, customers try satisfying other psychological and self-fulfillment needs (Maslow 1943, 1954). The shopping motivation of customers with a higher disposable income includes high levels of shopping enjoyment, convenience, and the ability to reap immediate gratification (Wakefield and Inman 2003). Shoppers in developed countries are frequently exposed to shopping experience signals, which stimulate their latent needs. They are more receptive to atmosphere, product and corporate branding, and services. Thus:

H5. The positive impact of some retail marketing instruments (atmosphere, corporate branding, customer service) on customer outcomes is stronger in developed countries, while that of other instruments (low prices, perceived value) is stronger in less developed countries.

Country innovativeness

International business research stresses that countries vary in innovativeness levels (e.g., Nachum, Zaheer, and Gross 2008). In particular, countries differ in their capacity to create knowledge, facilitate innovations, and provide support for new business ideas and societal change (Furman, Porter, and Stern 2002). Country innovativeness may thus be related to speed of technology adoption and product knowledge (Morgeson et al. 2011). For example, customers in innovative countries are able to try new retail services, for example, through non-store-based shopping channels and to experiment with different communication technologies (e.g., Trott 2012). Adoption of new retail innovations (e.g., self-service technologies) is more likely in innovative countries, which in turn leads to lower usage of traditional retail formats (e.g., Evanschitzky et al. 2015). Customers in these country markets are less loyal to retailers overall, reducing the effectiveness of instruments that are the pillars of traditional rather than innovative retail offers. We therefore propose that in-store service provision (service), purchase stimulation (atmosphere), specific product attributes (quality, product branding), and location are less influential in innovative countries. Thus:

H6. The positive impact of some retail marketing instruments (customer service, atmosphere, quality of product, product branding, proximity to home/work) on customer outcomes is weaker in innovative than less innovative countries.

Share of retail sales

The use of marketing instruments depends on the industry structure in a specific country (Ramaswamy, Gatignon, and Reibstein 1994). The share of retail sales on GDP is an important macro-economic indicator that reflects the significance and attractiveness of a particular industry. International marketing and strategic management literature indicate that larger markets

attract new entrants that fuel competition. Gatignon, Anderson, and Helsen (1989, p. 44) stress that each firm "decides, for each marketing instrument, whether to respond to an entrant by counterattacking, retreating, or not responding." Therefore, we propose that marketing instruments show different effectiveness in markets with a higher than lower share of retail sales. Retailers in competitive markets rely more strongly on marketing instruments that attract new customers and retain existing customers, to increase their market shares (Hawes and Crittenden 1984). Aggressive and retaliatory competitive strategies in these environments include competing by lowering prices (low prices), investing in product quality (quality of products), investing in value-added services (customer service, retail tenant mix), and spending more money on promotional activities (incentives) (Hawes and Crittenden 1984; Ramaswamy, Gatignon, and Reibstein 1994). Thus:

H7. The positive impact of some retail marketing instruments (low prices, quality of products, customer service, retail tenant mix, incentives) on customer outcomes is stronger in countries with a high than a low share of retail sales on GDP.

Employment in retailing

Another key characteristic of retail environments is the role of employment. Whereas approximately 10% of the workforce in the U.S. and U.K. are employed in the retail industry, most European countries and China have a relatively low retailing employment ratio (3%–6%; Euromonitor International 2014). We propose that the effects of marketing instruments depend on shoppers' interactions with frontline employees in retailing. Research argues that employees have various responsibilities and that they are invaluable to customers during their shopping trips (Reynolds and Beatty 1999). Employees regularly inform shoppers about product benefits and ongoing promotions and advise them on their choices (Reynolds and Beatty 1999). Therefore, the quality of products and in-store incentives likely have a more positive impact on patronage when recommended by an employee (Gwinner, Gremler, and Bitner 1998). Employees can also help customers find solutions to their current shopping needs when browsing in the store. The availability of alternative retail stores is, consequently, less relevant when shoppers can rely on employee advice and support. As employees represent the face of the retail organization and are essential for communication with customers, the advertising of the store loses relevance as a communication medium (Goff et al. 1997). Personal face-to-face interaction therefore outperforms anonymous and mediated communication through advertising. Thus:

H8. The positive impact of some retail marketing instruments (product quality, incentives) on customer outcomes is stronger in countries with a higher share of the workforce in retailing, while that of other instruments (advertising, retail tenant mix) is stronger in countries with a lower share of the workforce in retailing.

Internet era

Around 2000, pure dot-com players such as Amazon.com emerged and grew exponentially. As a result, customer can now easily search for online product information and visit price comparison websites (Berman and Evans 2010). The quality and availability of information have dramatically increased over the years, which in turn has led to an elevation of expectations, making it more difficult for store-based retailers to satisfy customers (Blut et al. 2015). Oliver (1980) explains that customers' expectations act as comparison standards when they assess retailers. Customer expectations have changed, especially as online retailers offer lower prices and better incentives, location-independent delivery, and wider assortments than offline retailers (Berman and Evans 2010). Store-based retailers often struggle to compete with online retailers using these instruments; instead, they are forced to make greater investments in store atmosphere, advertising, and the corporate brand to remain competitive. Thus:

H9. The positive impact of some retail marketing instruments (advertising, atmosphere, corporate branding) on customer outcomes is stronger in the Internet era, while that of other instruments (incentives, low prices, product range, spatial/temporal distance) is stronger in the non-Internet era.

Method Moderators

Type of participants

Scholars have widely discussed the use of students in social science research and their ability to serve as surrogates for other consumers. Studies employing students often show a tendency to produce larger effect sizes (Orsingher, Valentini, and de Angelis 2009). This can be explained by the homogeneity of student samples, which in turn leads to less error variance in measurement (Peterson 2001). Thus:

H10. The positive impact of retail marketing instruments on customer outcomes is stronger in studies employing student rather than non-student samples.

Study design

This moderator accounts for differences in data collection and differentiates between cross-sectional and longitudinal data. Similar to Blut et al. (2015), we propose stronger effects in longitudinal studies. The rationale is that a time lag may exist between the measurement of customer perceptions and the actual behavior. Mittal and Kamakura (2001) explain that this time lag can extend from a few days or weeks to even years in some cases, making the effect sizes stronger in longitudinal studies. Thus:

H11. The positive impact of retail marketing instruments on customer outcomes is stronger in longitudinal than cross-sectional studies.

Data source

The data source may also account for systematic differences in between-study variances (Eisend 2015). Given that retail studies frequently use secondary data sources and surveys, it may be that the data source represents a moderator. The extent of common-method variance is often higher in studies using single-source data, leading to larger effect sizes in survey studies (Orsingher, Valentini, and de Angelis 2009). Thus:

H12. The positive impact of retail marketing instruments on customer outcomes is stronger in studies based on survey rather than secondary data.

Method

Data Collection and Coding

We selected studies for this meta-analysis that provided information on the effects of retail marketing-mix instruments on retail patronage. To identify relevant studies, both published and unpublished, we conducted an elaborate search strategy. First, we used online databases, such as ABI/INFORM, EBSCO, Science Direct, and dissertation databases (Proquest), to carry out a computerized bibliographic search. We selected keywords such as "store atmosphere," "store loyalty," and "retail patronage" for the search. Second, we examined 40 marketing journals reported in the ABS journal ranking (2017). Third, we searched the World Wide Web for working papers, books, abstracts, and conference proceedings using combinations of keywords (e.g.; "store brand" and "store loyalty"). Last; we screened the references in the publications obtained for additional studies.

We based the decision to include a specific publication on three criteria. First, studies must have examined constructs such as retail marketing-mix instruments, store satisfaction, WOM, patronage intention, or behavior. Second, only quantitative studies must have been used for analysis. Third, relevant effect sizes must have been available (e.g., correlation). From these criteria, the analysis included 350 independent samples and a total of 239,008 shoppers from 237 articles. The final number of effect sizes was 14,895. A full list of these studies is provided in the Web Appendix.

We developed a coding scheme used by four coders to extract effect size information and study characteristics (two coders were authors of this study). At the beginning of the coding process, all coders were instructed to use construct definitions for classifying variables (Web Appendix). Thirty percent of all articles were double-coded. Coding consistency was sufficiently high (overall agreement >95%), and any differences in coding were resolved through discussion. The coders also extracted additional study characteristics, such as the year of the study and country information. The coders dummy-coded the shopping context, including food focus of store (1 = food; 0 = non-food), frequency of store visits (1 = frequent; 0 = infrequent), agglomeration level (1 = agglomeration; 0 = single store), and hedonic context (1 = hedonic; 0 = utilitarian). We coded dummies for type of participants (1 = students, 0 = non-students), study design (1 = cross-sectional, 0 = longitudinal), and data source (1 = secondary data, 0 = survey data). We dummy-coded whether the studies were conducted after 2000, when Internet shopping began gaining momentum. We used the country information to merge the meta-data with secondary data, including the country's Gross Domestic Product per capita (International Monetary Fund 2016), country innovativeness (Global Innovation Index 2017), retail sales as share of Gross Domestic Product and employment in retailing as a share of national employment (Euromonitor 2014).

Integration of Effect Sizes

In total, we included 24 marketing instruments and four outcome variables in the analysis. Research has usually measured the relationships between antecedents and outcome variables by means of correlations (e.g., Babic Rosario et al. 2016). Therefore, the effect size in this meta-analysis is represented by correlation coefficients (r). The r-statistic is often used because it is scale-free, easily interpretable, and robust (Grewal, Puccinelli, and Monroe 2017). If other statistical information (e.g., t-tests) was available, we used it to convert the effect sizes into correlations (Hunter and Schmidt 2004). Some studies used regressions and did not report correlation information. To incorporate the standardized beta coefficients of these primary studies, we used the conversion formula Peterson and Brown (2005) suggest. If a study provided multiple associations for the same relationship, we averaged the effect sizes and reported them as a single data point (Palmatier et al. 2006).

To correct effect sizes for differences in measurement reliability, we used Hunter and Schmidt's (2004) suggested procedure. Specifically, we divided each correlation by the square root of the product of the reliabilities of the independent and dependent variables.[1] For studies that did not report the reliability for a particular variable, we imputed the sample-size-weighted mean reliability calculated from all studies that did report that variable's reliability. Effect sizes were sample-size-weighted, and the summary effect sizes were calculated on the basis of random-effects models (Hunter and Schmidt 2004). In addition, we report the standard deviations of corrected correlations and associated confidence and credibility intervals. While the confidence intervals indicate the amount of error around the estimate of the mean effect size due to sampling error, the credibility intervals describe the distribution of effect sizes (Whitener 1990). Large credibility intervals suggest the extent to which moderators account for the unexplained variance.

We also examined the heterogeneity in the effect size distribution by calculating the Q-statistic test of homogeneity for each relationship (Hunter and Schmidt 2004). A significant Q-test also suggests the need for moderator analysis. Finally, we addressed the file-drawer problem by calculating the fail-safe N (Rosenthal 1979). The fail-safe N refers to the number of studies averaging null results that would be necessary to lower a significant relationship to a barely significant level (p = .05). Rosenthal (1979) discusses tolerance levels and suggests that fail-safe Ns should be greater than $5 \times k + 10$, where k is the number of correlations. We also create funnel plots, which plot the effect sizes

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[1] A small proportion of effect sizes is based on path coefficients (1.28% of 14,895 effect sizes). Path coefficients have already been corrected for measurement attenuation and were not corrected again. However, the results of the analyses are the same as when correcting them. The average difference in effect sizes between both approaches is marginal ($\Delta r < .001$).

against a measure of study size. An asymmetric plot indicates the potential of publication bias.

Calculation of the Structural Equation Model

We applied structural equation modeling (SEM) to test our model. We used the coded effect sizes to compile a correlation matrix including the most often tested variables (Grewal, Puccinelli, and Monroe 2017). This correlation matrix served as data input for LISREL 9.2. As Viswesvaran and Ones (1995) suggest, we used the harmonic mean of all sample sizes as the sample size for the calculations ($N = 11,924$).

Moderator Analysis

We used Hierarchical Linear Modeling (HLM) software to test the proposed moderators. Hox (2010) and Bijmolt and Pieters (2001) recommend this testing approach because it is unlikely that studies reporting multiple measurements are independent of one another. HLM allows us to account for the nesting not only of multiple instruments within one study but also of multiple outcomes. The random-effects model differentiates between two levels, the effect size level (level 1) and the study level (level 2) (Pastor and Lazowski 2018).[2] The dependent variable is the reliability-adjusted correlation, which is regressed on level 1 and level 2 variables. As suggested by Hox (2010), we dummy-coded the marketing instruments and outcome variables and included them on level 1. We also calculated cross-level interactions between the dummy-coded instruments on level 1 and the moderators on level 2 (de Jong, de Ruyter, and Lemmink 2004) to estimate the following model:

Level 1 $Y_{ij} = \beta_{0j} + \beta_{1j} * X_{ij} + \varepsilon_{ij}$ and

Level 2 $\beta_{0j} = \gamma_{00} + \gamma_{01} * W_{0j} + \mu_{0j}$,

$\beta_{1j} = \gamma_{10} + \gamma_{11} * W_{1j} + \mu_{1j}$,

where Y_{ij} is the ith reliability-adjusted correlation of the jth study, X_{ij} refers to the level 1 predictors (marketing mix, outcomes), W_{0j} and W_{1j} are the level 2 predictors (shopping context, retail environment, method), ε_{ij} is the residual error on level 1, and μ_{0j} and μ_{1j} are the residual error terms at level 2.

Results

Descriptive Statistics

To test the marketing-mix effects, we first synthesized existing research by calculating the averaged correlations for different instruments with outcome variables. We could relate 24 instruments to customer satisfaction (Table 1). For most instruments, we averaged at least 30 effect sizes, except for

advertising, which is often examined in econometric models that do not report standardized effect sizes. Non-monetary incentives are also infrequently examined. As predicted, most instruments positively affect customer satisfaction, except temporal distance to the store. The descriptive results display the strongest effect sizes for retail tenant mix ($r = .52$), product range (.47), service tenant mix (.46), customer service (.46), and corporate brand (.45). The findings give an initial indication that most of the retail marketing instruments are generally capable of satisfying customers. We also conclude that, within each instrument group, at least one instrument is of greater importance than the others.

Table 1 suggests similar results for the other outcome variables. For patronage intention, most instruments are related to this outcome, except spatial and temporal distance. The strongest averaged effect sizes appear for product range (.49), corporate brand (.47), perceived value (.45), and retail tenant mix (.40). Regarding patronage behavior, most instruments show a significant impact. As expected, the correlations of marketing instruments are weaker for this outcome, though the instruments do vary in affecting patronage, with stronger effects for advertising (.39), non-monetary incentives (.18), perceived value (.17), and corporate brand (.16). The results indicate that all retail marketing instruments are related to WOM. The strongest averaged effects are for retail tenant mix (.49), product range (.47), customer service (.45), and corporate brand (.42).[3]

The calculated fail-safe Ns exceed Rosenthal's (1979) proposed tolerance levels for most significant relationships (79 of 90), suggesting that our findings are robust against publication bias. We find fail-safe Ns below the tolerance levels for spatial and temporal distance and a few instruments related to patronage behavior (access from parking, non-monetary incentives, parking, and proximity from home/work). The funnel plots do not show evidence of a publication bias. We also observe a need for a moderator analysis because of the wide credibility intervals and the significant Q-tests of homogeneity. We report details on the fail-safe Ns, Q-tests of homogeneity, and descriptive statistics in the Web Appendix.

SEM Results

To better understand the simultaneous effects of the instruments, we calculated a SEM using the derived correlation matrix displayed in Table 1. In total, we could examine 26 variables in the SEM (Table 2).[4] The instruments explain 42.9% of satisfaction variance, 61.1% of patronage intention, 10.4% of patronage behavior, and 77.8% of WOM.

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[2] We calculated the intra-class correlation (ICC) which indicates the proportion of the within-study variance to the total variance (Raudenbush and Bryk 2002). The ICC is .51 indicating that 51% of the variance is between studies and 49% is within studies. The use of HLM is therefore justified.

[3] We compare effects of instruments that are fully under the retailer's control with instruments that are less so. The less controllable instruments are access to store, proximity to home, proximity to work, retail tenant mix, service tenant mix, spatial distance, temporal distance, and parking. The results indicate stronger effects for controllable instruments on outcomes, including satisfaction ($r_{control} = .27$, $r_{lesscontrol} = .18$, $p < .05$), patronage intention ($r_{control} = .29$, $r_{lesscontrol} = .21$, $p < .05$), patronage behavior ($r_{control} = .11$, $r_{lesscontrol} = .06$, $p < .05$), and WOM ($r_{control} = .32$, $r_{lesscontrol} = .22$, $p < .05$).

[4] We excluded advertising from the analysis because of missing correlations and merged monetary and non-monetary incentives to one incentive category.

Table 1

Relationship between retail marketing instruments and retail patronage.

	Access from parking	Access to store	Advertising	Atmosphere	Branding product	Corporate brand	Customer service	Incentives (mon.)	Incentives (non-mon.)	Low prices	Maneuverability	Orientation	Parking	Personal selling	Perceived value	Product range	Proximity to home	Proximity to work	Quality of products	Retail tenant mix	Service tenant mix	Shop. infrastructure.	Spatial distance	Temporal distance	SAT	PI	PB	WOM
k	910	1162	67	1362	1081	1147	1265	1211	26	1239	1019	1171	1060	1261	1188	1319	839	833	1399	947	923	1109	923	950	1350	1681	1276	1162
Access from parking		38	–	38	38	33	38	38	–	38	38	38	38	33	38	36	33	33	38	38	38	38	31	31	39	39	31	39
Access to store	.34		2	55	43	48	53	48	1	58	45	50	46	48	48	53	34	34	53	40	38	46	35	35	52	66	52	42
Advertising	–	.08		5	–	7	11	2	1	3	–	2	–	5	–	2	–	–	3	–	–	1	–	–	3	17	2	1
Atmosphere	.25	.16	.61		45	46	64	55	1	59	47	53	45	70	54	66	35	34	70	40	39	52	37	40	83	104	71	54
Branding product	.19	.14	–	.20		42	46	50	–	44	42	44	46	44	43	50	33	33	49	39	39	44	41	41	43	57	43	42
Corporate brand	.14	.31	.37	.27	.33		45	45	1	53	40	46	36	47	51	50	33	33	56	34	33	38	34	34	62	98	62	40
Customer service	.23	.13	.19	.33	.54	.51		54	2	55	40	47	47	62	47	64	33	33	65	39	38	50	38	41	68	80	63	43
Incentives (mon.)	.18	.14	.71	.17	.28	.23	.38		3	52	45	56	47	54	51	61	34	34	62	39	39	48	42	45	45	64	59	42
Incentives (non-mon.)	–	–.03	.40	.18	–	.48	.29	.23		1	–	–	–	–	–	–	–	–	–	–	–	1	–	–	4	11	3	–
Low prices	.12	.11	.11	.15	.16	.18	.26	.53	.02		44	53	45	51	51	65	34	34	63	40	39	48	35	35	53	85	59	43
Maneuverability	.32	.24	–	.26	.32	.31	.36	.22	–	.17		44	41	40	46	43	33	33	45	38	38	41	34	34	42	47	37	42
Orientation	.36	.29	.22	.30	.30	.36	.42	.25	–	.20	.60		42	50	52	57	34	34	58	39	39	50	37	40	47	63	54	42
Parking	.46	.14	–	.13	.16	.15	.24	.20	–	.19	.21	.20		45	41	48	34	34	50	38	38	42	40	40	43	49	44	41
Personal selling	.15	.17	.35	.36	.36	.39	.58	.61	–	.29	.34	.37	.16		50	62	34	34	71	34	34	47	42	45	64	89	64	42
Perceived value	.18	.17	–	.21	.35	.37	.53	.58	–	.58	.25	.31	.24	.45		53	33	33	59	40	39	44	34	34	66	79	54	48
Product range	.25	.18	.29	.30	.76	.44	.49	.47	–	.33	.32	.35	.19	.43	.45		35	34	72	37	37	48	42	45	59	87	73	40
Proximity to home	.20	.48	–	.04	.05	.12	.06	.06	–	.03	.08	.15	.11	.02	.05	.05		34	34	33	33	34	32	32	34	36	32	33
Proximity to work	.04	.35	–	.02	.05	.00	.05	.05	–	.06	.06	.11	.06	.03	.02	.01	.26		34	33	33	34	32	32	33	33	32	33
Quality of products	.21	.16	.06	.32	.54	.24	.45	.35	–	.32	.34	.36	.18	.37	.51	.58	.06	.06		39	39	55	42	45	75	105	67	50
Retail tenant mix	.22	.22	–	.24	.57	.48	.55	.32	–	.25	.25	.35	.21	.35	.41	.75	.05	.07	.47		39	39	31	31	45	45	33	44
Service tenant mix	.20	.16	–	.20	.44	.30	.50	.31	–	.30	.26	.30	.20	.33	.36	.47	.00	.04	.37	.62		39	31	31	40	39	32	39
Shopping infrastructure	.19	.10	.30	.21	.21	.31	.27	.22	.38	.16	.26	.39	.22	.35	.20	.26	.10	.05	.25	.25	.27		37	40	50	57	44	42
Spatial distance	–.09	–.34	–	.00	.02	.02	.03	–.04	–	.00	–.01	–.05	–.01	–.01	.03	.01	–.31	–.21	.03	.01	.04	.01		42	34	44	42	34
Temporal distance	–.08	–.38	–	–.01	.11	.01	.07	.08	–	.00	.02	–.06	–.01	.04	.03	.06	–.28	–.28	.10	.04	.01	.00	.50		34	44	45	34
SAT	.20	.21	.15	.32	.39	.45	.46	.27	.20	.29	.30	.35	.16	.43	.38	.47	.08	.07	.40	.52	.46	.23	.04	.02		108	61	63
−95% CI	.16	.17	.13	.28	.35	.39	.42	.24	.01	.26	.27	.30	.13	.39	.33	.43	.04	.03	.36	.47	.43	.20	.00	–.02		–	–	–
+95% CI	.24	.24	.17	.37	.43	.51	.51	.30	.38	.31	.33	.39	.20	.46	.42	.52	.12	.10	.44	.58	.49	.25	.07	.05		–	–	–
−80% CR	.07	.08	.15	.08	.24	.17	.23	.16	–.03	.19	.19	.17	.04	.25	.14	.26	–.06	–.04	.17	.31	.35	.15	–.06	–.08		–	–	–
+80% CR	.33	.33	.15	.56	.54	.73	.70	.39	.43	.39	.41	.52	.29	.61	.62	.69	.21	.18	.64	.74	.57	.31	.14	.12		–	–	–
N	>11K	>11K	630	>28K	>16K	>19K	>19K	>10K	>1K	>26K	>11K	>11K	>11K	>22K	>17K	>15K	>10K	>10K	>20K	>14K	>30K	>12K	>10K	>8K		–	–	–
PI	.18	.23	.28	.17	.24	.47	.23	.34	.31	.27	.20	.30	.16	.26	.45	.49	.11	.05	.35	.40	.37	.17	–.01	–.01	.59		75	61
−95% CI	.14	.19	.20	.13	.20	.43	.18	.31	.21	.23	.17	.26	.13	.22	.41	.44	.07	.01	.31	.36	.32	.13	–.04	–.05	.56		–	–
+95% CI	.21	.27	.37	.21	.28	.52	.29	.40	.42	.31	.23	.34	.19	.29	.49	.54	.15	.09	.38	.44	.43	.22	.02	.04	.63		–	–
−80% CR	.05	.02	.08	–.09	.07	.22	–.08	.12	.10	.04	.08	.11	.05	.05	.24	.17	–.03	–.07	.14	.23	.16	–.03	–.12	–.18	.36		–	–
+80% CR	.30	.43	.49	.42	.42	.73	.54	.59	.53	.51	.32	.49	.27	.46	.66	.81	.26	.18	.55	.56	.58	.38	.10	.16	.83		–	–
N	>10K	>17K	>3K	>41K	>10K	>28K	>28K	>40K	>2K	>27K	>28K	>18K	>12K	>31K	>35K	>39K	>12K	>8K	>33K	>13K	>11K	>17K	>10K	>27K	>25K		–	–
PB	.04	.02	.39	.11	.06	.16	.10	.10	.18	.09	.06	.06	.05	.08	.17	.02	.05	.04	.13	.08	.09	.05	.04	.01	.17	.16		43
−95% CI	.02	–.02	.20	.08	.04	.13	.07	.07	.13	.07	.04	.04	.03	.05	.11	–.01	.03	.03	.10	.06	.07	.04	.01	.00	.13	.11		–
+95% CI	.06	.06	.58	.14	.07	.19	.13	.14	.24	.12	.07	.08	.07	.10	.24	.04	.07	.05	.16	.11	.11	.07	.06	.03	.21	.20		–
−80% CR	.04	–.14	.24	–.04	.06	.03	–.02	–.04	.18	–.02	.06	.02	.05	–.01	–.13	–.13	.05	.02	–.02	.07	.09	.05	–.02	.00	.00	–.09		–
+80% CR	.04	.18	.55	.25	.06	.29	.22	.25	.18	.20	.06	.11	.05	.17	.48	.16	.05	.06	.28	.10	.09	.05	.09	.03	.35	.41		–
N	>9K	>13K	469	>19K	>12K	>28K	>28K	>18K	363	>23K	>10K	>17K	>10K	>16K	>12K	>34K	>6K	>24K	>30K	>9K	>7K	>11K	>9K	>14K	>13K	>19K		–
WOM	.21	.17	.38	.31	.36	.42	.45	.25	–	.15	.32	.33	.17	.33	.29	.47	.07	.06	.39	.49	.39	.19	.04	.04	.74	.73	.19	
−95% CI	.17	.14	.38	.27	.33	.36	.42	.22	–	.12	.27	.30	.13	.30	.27	.43	.03	.04	.36	.45	.35	.18	.00	.00	.72	.70	.15	
+95% CI	.24	.21	.38	.38	.49	.48	.48	.29	–	.18	.37	.36	.20	.36	.32	.51	.10	.09	.43	.54	.42	.21	.07	.07	.77	.77	.23	
−80% CR	.09	.05	.38	.13	.29	.17	.34	.12	–	.04	.13	.22	.04	.22	.20	.32	–.05	.00	.24	.32	.26	.16	–.06	–.07	.60	.55	.03	
+80% CR	.32	.29	.38	.49	.43	.68	.56	.38	–	.26	.52	.44	.30	.44	.39	.62	.18	.13	.54	.66	.52	.23	.13	.15	.89	.92	.36	
N	>8K	>13K	81	>18K	>10K	>28K	>11K	>15K	–	>10K	>11K	>9K	>10K	>12K	>12K	>22K	>9K	>10K	>8K	>33K	>14K	>9K	>11K	>8K	>29K	>36K	>14K	

Harmonic mean: 11,924. The numbers in the lower half of the table are sample-size-weighted reliability-corrected correlations between constructs; the upper half displays the number of effect sizes. SAT = satisfaction; PI = patronage intention; PB = patronage behavior; WOM = word of mouth; k = number of effect sizes; N = cumulative sample size; CI = confidence interval; CR = credibility interval.

Table 2
Results of the SEM.

Instrument	Relationship	B	t	R²
Product	Product range → SAT	.02	1.01	42.9%
	Quality of products → SAT	.08*	8.14	
Service	Customer service → SAT	−.04*	3.31	
	Maneuverability → SAT	.02*	1.94	
	Orientation (incl. shelf management) → SAT	.04*	3.83	
	Parking → SAT	−.02*	2.30	
	Retail tenant mix → SAT	.19*	14.66	
	Service tenant mix → SAT	.17*	17.50	
	Shopping infrastructure → SAT	−.05*	6.44	
Brand	Branding product level → SAT	.02	1.20	
	Corporate brand/reputation → SAT	.18*	19.15	
Incentive	Incentives → SAT	−.15*	13.67	
Communication	Atmosphere → SAT	.08*	9.75	
	Personal selling → SAT	.23*	21.53	
Price	Low prices (prices) → SAT	.11*	12.34	
	Perceived value → SAT	.04*	3.25	
Distribution	Access from parking → SAT	.04*	4.12	
	Access to store → SAT	−.02	1.52	
	Proximity to home → SAT	.05*	5.55	
	Proximity to work → SAT	.04*	5.00	
	Spatial distance from point of origin → SAT	.04*	4.96	
	Temporal distance from point of origin → SAT	.01	.66	
–	SAT → PI	.46*	60.23	61.1%
Product	Product range → PI	.53*	40.75	
	Quality of products → PI	.06*	7.60	
Service	Customer service → PI	−.26*	27.69	
	Maneuverability → PI	−.07*	9.41	
	Orientation (incl. shelf management) → PI	.11*	13.12	
	Parking → PI	.03*	4.96	
	Retail tenant mix → PI	−.27*	24.95	
	Service tenant mix → PI	.20*	25.61	
	Shopping infrastructure → PI	−.06*	8.36	
Brand	Branding product level → PI	−.31*	30.91	
	Corporate brand/reputation → PI	.29*	36.69	
Incentive	Incentives → PI	.13*	13.65	
Communication	Atmosphere → PI	−.07*	10.64	
	Personal selling → PI	−.14*	15.18	
Price	Low prices (prices) → PI	−.17*	22.06	
	Perceived value → PI	.27*	30.56	
Distribution	Access from parking → PI	.00	.44	
	Access to store → PI	−.01	1.04	
	Proximity to home → PI	.03*	3.63	
	Proximity to work → PI	.04*	6.76	
	Spatial distance from point of origin → PI	−.03*	4.54	
	Temporal distance from point of origin → PI	.03*	3.86	
	PI → PB	.10*	6.92	10.4%
	SAT → PB	.08*	5.84	
Product	Product range → PB	−.44*	20.95	
	Quality of products → PB	.11*	8.86	
Service	Customer service → PB	−.10*	6.60	
	Maneuverability → PB	.01	1.23	
	Orientation (incl. shelf management) → PB	−.05*	3.78	
	Parking → PB	−.01	1.09	
	Retail tenant mix → PB	.11*	6.76	
	Service tenant mix → PB	−.01	.55	
	Shopping infrastructure → PB	−.02*	1.67	
Brand	Branding product level → PB	.18*	11.30	
	Corporate brand/reputation → PB	.17*	13.11	
Incentive	Incentives → PB	.12*	8.40	
Communication	Atmosphere → PB	.10*	9.41	
	Personal selling → PB	−.05*	3.55	

Table 2 (*Continued*)

Instrument	Relationship	B	t	R^2
Price	Low prices (prices) → PB	−.00	.33	
	Perceived value → PB	.09*	6.19	
Distribution	Access from parking → PB	.03*	2.94	
	Access to store → PB	−.12*	10.09	
	Proximity to home → PB	.06*	5.66	
	Proximity to work → PB	.04*	3.79	
	Spatial distance from point of origin → PB	.04*	4.16	
	Temporal distance from point of origin → PB	−.05*	4.21	
	PB → WOM	.05*	9.87	77.8%
	PI → WOM	.64*	92.65	
	SAT → WOM	.36*	54.31	
Product	Product range → WOM	−.15*	14.13	
	Quality of products → WOM	.04*	5.85	
Service	Customer service → WOM	.32*	43.50	
	Maneuverability → WOM	.12*	21.15	
	Orientation (incl. shelf management) → WOM	−.07*	11.62	
	Parking → WOM	.01	1.09	
	Retail tenant mix → WOM	.17*	20.91	
	Service tenant mix → WOM	−.13*	21.06	
	Shopping infrastructure → WOM	.01*	2.47	
Brand	Branding product level → WOM	.06*	7.98	
	Corporate brand/reputation → WOM	−.14*	21.65	
Incentive	Incentives → WOM	.04*	5.37	
Communication	Atmosphere → WOM	.08*	16.42	
	Personal selling → WOM	−.06*	8.28	
Price	Low prices (prices) → WOM	−.04*	6.48	
	Perceived value → WOM	−.26*	36.81	
Distribution	Access from parking → WOM	.00	.74	
	Access to store → WOM	−.01*	1.71	
	Proximity to home → WOM	−.02*	3.68	
	Proximity to work → WOM	−.01*	2.04	
	Spatial distance from point of origin → WOM	.03*	5.35	
	Temporal distance from point of origin → WOM	−.01*	2.68	

* $p < .05$ (one-tailed). SAT=satisfaction; PI=patronage intention; PB = patronage behavior; WOM=word of mouth.

Product

The results suggest that the quality of products represents a key patronage factor because it is positively related to all four outcome variables. This instrument also displays strong indirect effects on other outcomes through satisfaction. By contrast, retailers' product range does not influence customer satisfaction but instead has a direct effect on purchase intentions. With a greater product range, customers intend to patronize the retailer.

Service

The results for the instruments indicate several differences. While we observe significant effects of maneuverability, orientation, and the retail and service tenant mix for customer satisfaction, we also find that parking, customer service, and shopping infrastructure are less likely to satisfy customers. These instruments seem to have direct effects on other customer outcomes, such as WOM and patronage intention.

Brands

The debate over whether the corporate brand or the product brand is more important has a long tradition. We find strong and consistent positive effects of the corporate brand on most outcomes, except WOM. Product brands also affect outcome variables; while they do not affect customer satisfaction and intentions, they do influence patronage behavior and WOM.

Price

The retailer's price is a key determinant of customer satisfaction. We find that low prices mainly influence satisfaction but not the other outcomes. The product value positively affects all outcome variables except WOM.

Incentives

Promotions are intended to attract shoppers and encourage additional spending. Accordingly, we find that incentives affect consumers' patronage intention, behavior as well as WOM. However, we do not see any effect on customer satisfaction.

Communication

We examined the effects of communication through store atmosphere and personal selling. The latter instrument displays a stronger indirect effect through customer satisfaction. The atmosphere and personal selling personnel improve satisfaction. While atmosphere has a weaker effect on satisfaction, it is positively related to WOM and patronage behavior. Neither of the two instruments affects patronage intentions positively.

Distribution

We find that four of the six instruments are related to satisfaction and patronage behavior, including access from parking, proximity from home/work, and spatial distance to the store. Similarly, we find that several instruments are positively related to patronage intention (except access to store, access from parking, and spatial distance). Distribution instruments do not affect WOM with the exception of spatial distance.

Table 3 summarizes the direct, indirect, and total effects in our SEM; the results confirm the importance of mediators (e.g., satisfaction, patronage intentions) when assessing the effects of retail marketing instruments. While some instruments have strong direct effects on outcome variables, other variables influence customer behavior indirectly.

Results of Moderator Analysis

Table 4 displays the results of the moderator analysis. Given the complexity of the model with 199 interaction effects, we estimated the interaction effects in 23 models for each marketing instrument. We also tested different combinations of interaction effects to assess the stability of the results. Finally, we tested the extent of multi-collinearity in the model. The maximum variance inflation factor is only 2.786 at level 1 and 3.837 at level 2; thus, the extent of multi-collinearity is acceptable. We also assessed the distribution of residuals in the HLM and find normal distribution of residuals. In line with our previous analyses, the results indicate that the marketing instruments have a differential impact on customer outcomes. We also find that the effectiveness of marketing instruments depends on the proposed moderators, as various cross-level interactions are significant.

Shopping context

Among the shopping context-related moderators, we find most support for the moderating influence of hedonic/utilitarian consumption differences, followed by agglomeration focus, frequency of shopping, and food/non-food retailing (Table 4). First, with regard to differences between *food and non-food retailing*, in line with H1, we observe that personal selling is more important for food retailers than non-food retailers. Surprisingly, store atmosphere, incentives, and product quality have the same effects across contexts.

Second, we find that some marketing instruments are of greater importance for *infrequently visited retail formats* than for frequently visited formats. It seems that customers who frequently visit a particular store consider the perceived value and personal selling more than customers who make infrequent shopping trips. These findings support our predictions in H2. Also in line with our assumptions, for frequently visited retail formats, advertising is less relevant. It seems that frequent customers rely on their past experiences, so advertising is less important. Surprisingly, the effect of customer service is non-significant, and retail tenant mix gains importance with frequent visits.

Third, we find that the instruments also differ between *retail agglomerations* and single-store formats, as customers are more open to spending their shopping budgets when visiting the former format and enjoy browsing an agglomeration. While advertising is essential for these formats, we find that product quality and maneuverability affect patronage less in an agglomeration context (H3). These attributes are part of the browsing experience. In addition, shoppers perceive easy access to agglomerations as part of the shopping experience. We do not find any differences for atmosphere, incentives, and orientation.

Fourth, the results indicate differences between *hedonic* and *utilitarian* offerings. In hedonic retail settings, customers put greater emphasis on service tenant mix and customer service. For utilitarian shopping contexts, customers appreciate incentives and proximity to home/work and spatial distance, both of which ensure faster shopping; thus, H4 is supported. We also observe that advertising is more important for utilitarian customers. We do not find differences for shopping atmosphere, product quality, and low prices.

Country setting

The results of testing country characteristics suggest significant differences across countries in the effectiveness of marketing instruments. The results show most differences for GDP and country innovativeness, but differences also exist in terms of the share of retail sales and retail employment in a country. Regarding *GDP*, we find that seven of the twelve significant retail marketing instruments gain importance in countries with higher GDP. We find stronger effects for store atmosphere, corporate brands, and customer service, which is in line with H5. Also in line with our predictions, we find that low prices and perceived value gain importance in countries with lower GDP. We observe that product branding, orientation, quality of products, and temporal distance matter in high GDP countries, while advertising, incentives, and maneuverability matter in low GDP countries.

With regard to *country innovativeness*, we find that five of the nine significant instruments are less relevant in more innovative countries. In these markets, retailers develop new forms of retailing and new instruments, making traditional instruments less relevant. We observe a decreasing importance of atmosphere, products brands, and quality of product (H6). In-store orientation and temporal distance are also less relevant, while access to store, advertising, perceived value, and product range gain importance.

Country differences also exist depending on *share of retail sales on GDP*. The findings suggest a greater impact of two of the six significant instruments. Proximity to home and low prices gain importance with an increasing share of retail sales (H7), while access to store, product branding, product range, and spatial distance lose importance. Contrary to our predictions, we find no effects for incentives, product quality, retail tenant mix, and services.

Regarding *retail employment*, we find that six of the eight predictors are more effective in countries with greater retail employment. As H8 suggests, incentives gain importance in these countries, while retail tenant mix loses relevance. Advertising also gains relevance, while product quality is non-significant.

Last, the results reveal that the effectiveness of retail marketing instruments has changed in the Internet era. In line with

Table 3
Direct, indirect, and total effects.

Instrument	IV	DV: SAT			DV: PI				DV: PB				DV: WOM			
		D	I	T	D	I	T	Rel. imp.	D	I	T	Rel. imp.	D	I	T	Rel. imp.
	PB												.05	–	.05	
	PI								.10	–	.10		.64	.00	.65	1%
	SAT				.46	–	.46		.08	.04	.12	27%	.36	.30	.65	31%
Product	Product range	.02	–	.02	.53	.01	.53	1%	−.44	.05	−.39	12%	−.01	−.02	−.03	40%
	Quality of products	.08	–	.08	.06	.04	.10	27%	.11	.02	.12	11%	.00	.03	.02	54%
Service	Customer service	−.04	–	−.04	−.26	−.02	−.28	6%	−.10	−.03	−.13	19%	.08	.01	.09	10%
	Maneuverability	.02	–	.02	−.07	.01	−.06	11%	.01	−.01	.01	36%	.06	−.18	−.12	61%
	Orientation	.04	–	.04	.11	.02	.12	12%	−.05	.02	−.03	32%	−.14	.31	.18	64%
	Parking	−.02	–	−.02	.03	−.01	.03	24%	−.01	.00	−.01	9%	.04	−.01	.03	32%
	Retail tenant mix	.19	–	.19	−.27	.09	−.18	32%	.11	.00	.11	3%	−.04	−.04	−.07	32%
	Service tenant mix	.17	–	.17	.20	.08	.28	21%	−.01	.04	.03	55%	.12	−.04	.09	29%
	Shopping infrastructure	−.05	–	−.05	−.06	−.02	−.08	23%	−.02	−.01	−.03	29%	−.07	.09	.02	83%
Brand	Branding product level	.02	–	.02	−.31	.01	−.31	2%	.18	−.03	.15	16%	.01	.01	.01	39%
	Corporate brand	.18	–	.18	.29	.08	.37	18%	.17	.05	.22	19%	−.26	.20	−.06	79%
Incentive	Incentives	−.15	–	−.15	.13	−.07	.06	55%	.12	−.01	.11	5%	−.15	.33	.18	65%
Communication	Atmosphere	.08	–	.08	−.07	.04	−.04	50%	.10	.00	.10	3%	−.02	.05	.03	62%
	Personal selling	.23	–	.23	−.14	.11	−.03	77%	−.05	.02	−.04	30%	−.01	.06	.05	55%
Price	Low prices	.11	–	.11	−.17	.05	−.12	31%	.00	.00	−.01	33%	.04	.10	.13	42%
	Perceived value	.04	–	.04	.27	.02	.29	5%	.09	.03	.12	20%	.17	−.05	.13	26%
Distribution	Access from parking	.04	–	.04	.00	.02	.02	46%	.03	.01	.04	12%	−.13	.24	.11	69%
	Access to store	−.02	–	−.02	−.01	−.01	−.02	32%	−.12	.00	−.13	2%	−.06	.06	.00	95%
	Proximity to home	.05	–	.05	.03	.02	.05	32%	.06	.01	.07	11%	.32	−.20	.12	62%
	Proximity to work	.04	–	.04	.04	.02	.06	23%	.04	.01	.05	16%	.01	−.07	−.06	55%
	Spatial distance	.04	–	.04	−.03	.02	−.01	61%	.04	.00	.05	4%	.03	.01	.04	20%
	Temporal distance	.01	–	.01	.03	.00	.03	9%	−.05	.00	−.04	7%	−.01	.02	.01	80%

D = direct effect; I = indirect effect; T = total effect; % = relative importance of indirect effects. SAT = satisfaction; PI = patronage intention; PB = patronage behavior; WOM = word of mouth.

Table 4

Results of moderator analysis.

DV: rel.-adj. correlation	MOD: access fr. parking	MOD: access to store	MOD: advertising	MOD: atmosphere	MOD: branding product	MOD: corporate brand	MOD: customer service	MOD: incentives	MOD: low prices	MOD: maneuverability	MOD: orientation	MOD: parking	MOD: perceived value	MOD: Personnel selling	MOD: Product range	MOD: Proximity to home	MOD: Proximity to work	MOD: Quality of prod.	MOD: Retail tenant mix	MOD: Service tenant mix	MOD: Shop. Infrastr.	MOD: Spatial distance	MOD: Temporal distance
Level 1 effects																							
Intercept	.25*	.25*	.25*	.25*	.25*	.25*	.25*	.25*	.25*	.25*	.25*	.25*	.26*	.25*	.25*	.25*	.25*	.25*	.23*	.25*	.25*	.25*	.24*
Access to store	.10*	.10*	.10*	.10*	.12*	.10*	.10*	.11*	.10*	.10*	.10*	.10*	.11*	.10*	.10*	.10*	.10*	.10*	.10*	.10*	.10*	.10*	.11*
Access from parking	.18*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*	.11*
Advertising	.17*	.17*	.13*	.18*	.18*	.17*	.16*	.18*	.17*	.17*	.17*	.17*	.17*	.17*	.17*	.17*	.17*	.17*	.17*	.17*	.17*	.17*	.18*
Atmosphere	.20*	.20*	.20*	.24*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.21*
Branding product	.25*	.24*	.25*	.25*	.24*	.24*	.25*	.26*	.25*	.25*	.25*	.25*	.25*	.24*	.24*	.25*	.25*	.25*	.25*	.25*	.25*	.25*	.25*
Corporate brand	.29*	.28*	.29*	.29*	.30*	.26*	.28*	.29*	.29*	.29*	.28*	.29*	.30*	.29*	.29*	.29*	.29*	.29*	.29*	.29*	.29*	.29*	.29*
Customer service	.23*	.23*	.23*	.23*	.23*	.23*	.21*	.23*	.24*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.24*
Incentives	.20*	.20*	.20*	.21*	.20*	.20*	.20*	.22*	.20*	.20*	.20*	.20*	.20*	.20*	.19*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.21*
Low prices	.13*	.13*	.13*	.13*	.13*	.13*	.12*	.13*	.08*	.13*	.13*	.13*	.13*	.13*	.15*	.13*	.13*	.11*	.13*	.13*	.13*	.13*	.13*
Maneuverability	.16*	.16*	.16*	.16*	.16*	.16*	.16*	.16*	.16*	.20*	.16*	.16*	.16*	.16*	.16*	.16*	.16*	.16*	.16*	.16*	.16*	.16*	.16*
Orientation	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.18*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.20*	.21*
Parking	.08*	.08*	.08*	.08*	.08*	.08*	.08*	.08*	.08*	.08*	.08*	.09*	.08*	.08*	.08*	.08*	.08*	.08*	.08*	.08*	.08*	.08*	.08*
Perceived value	.19*	.19*	.19*	.20*	.19*	.18*	.18*	.20*	.19*	.19*	.19*	.19*	.26*	.18*	.18*	.19*	.19*	.21*	.19*	.19*	.19*	.19*	.19*
Personnel selling	.20*	.20*	.20*	.20*	.20*	.19*	.19*	.20*	.20*	.20*	.19*	.20*	.19*	.19*	.19*	.20*	.19*	.19*	.20*	.20*	.19*	.20*	.20*
Product range	.26*	.26*	.26*	.26*	.26*	.26*	.25*	.26*	.25*	.26*	.26*	.26*	.26*	.26*	.22*	.26*	.25*	.26*	.26*	.26*	.26*	.26*	.26*
Proximity to home	.03	.03	.03	.03	.03	.03	.03	.03	.03	.03	.03	.03	.03	.03	.03	.00	.03	.03	.03	.03	.03	.03	.03*
Proximity to work	.01	.01	.01	.01	.01	.01	.01	.01	.01	.01	.01	.01	.01	.01	.01	.01	.08	.01	.01	.01	.01	.01	.01
Quality of products	.23*	.23*	.23*	.23*	.23*	.22*	.22*	.23*	.22*	.23*	.22*	.23*	.20*	.22*	.24*	.23*	.23*	.26*	.23*	.23*	.23*	.23*	.23*
Retail tenant mix	.33*	.33*	.33*	.32*	.33*	.33*	.33*	.33*	.33*	.33*	.33*	.33*	.33*	.33*	.33*	.33*	.33*	.33*	−.36*	.33*	.33*	.33*	.33*
Service tenant mix	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.23*	.28*	.23*	.23*	.23*
Shop. infrastructure	.12*	.12*	.12*	.11*	.12*	.11*	.11*	.12*	.12*	.12*	.11*	.12*	.11*	.11*	.12*	.12*	.12*	.11*	.12*	.12*	.14*	.12*	.12*
Spatial distance	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	.02	.01
Temporal distance	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21	−.21
PI	.13*	.14*	.13*	.14*	.14*	.13*	.13*	.13*	.14*	.13*	.13*	.13*	.14*	.13*	.14*	.13*	.13*	.14*	.14*	.13*	.13*	.13*	.13*
SAT	.22*	.22*	.22*	.21*	.22*	.22*	.22*	.22*	.22*	.22*	.22*	.22*	.21*	.22*	.22*	.22*	.22*	.22*	.21*	.22*	.22*	.22*	.22*
WOM	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*	.18*
Level 2 effects																							
Main effects																							
Food (non-food)	−.04	−.03	−.03	−.04	−.03	−.04	−.03	−.03	−.04	−.04	−.04	−.04	−.03	−.04	−.03	−.03	−.04	−.03	−.06	−.04	−.03	−.04	−.04
Frequent (infrequent)	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.01	−.02	−.01	−.01	−.01	−.03	−.01	.00	−.01	−.01	.02	.02	−.01	−.01	−.01	−.01
Agglomeration (non)	−.02	−.03	−.02	−.01	−.02	−.02	−.01	−.02	−.01	−.03	−.02	−.02	−.02	−.02	−.02	−.02	−.01	−.02	−.02	−.02	−.02	−.02	−.02
Hedonic (utilitarian)	.03	.03	.04	.03	.04	.03	.03	.04	.03	.03	.04	.03	.04	.04	.04	.03	.03	.04	.04	.04	.04	.02	.03
GDP per capita	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
Country innovativeness	.00	.00	.00	.00	−.01	.00	.00	.00	.00	.00	.00	.00	−.01	.00	.00	.00	.00	.00	−.01	−.01	.00	.00	−.01
Share of retail sales	.01	.01	.01	.01	.01	.01	.01	.01	.00	.01	.01	.01	.01	.01	.01	.01	.01	.01	.00	.01	.01	.00	.01
Employment in retailing	.00	.00	.00	.00	.00	.01	.01	.00	.01	.01	.00	.00	.01	.01	.00	.00	.00	.00	.00	.01	.00	.01	.01
Internet era (non)	.10*	.10*	.10*	.10*	.10*	.10*	.10*	.10*	.11	.10	.10*	.10*	.11*	.10*	.10	.10	.10*	.09	.10	.09	.10	.10	.09
Student sample	.09*	.09*	.08*	.07*	.09*	.10*	.08*	.09*	.09*	.09*	.09*	.09*	.11*	.07*	.09*	.09*	.08*	.09*	.09*	.09*	.09*	.04*	.09
Cross-sectional	−.12*	−.11*	−.12*	−.12*	−.11*	−.10*	−.13*	−.11*	−.07*	−.14*	−.12*	−.11*	−.12*	−.10*	−.11*	−.12*	−.12*	−.10*	−.12*	−.12*	−.11*	−.12*	−.12*
Secondary source	−.29*	−.27*	−.29*	−.29*	−.33*	−.27*	−.28*	−.29*	−.32*	−.29*	−.29*	−.29*	−.31*	−.29*	−.26*	−.29*	−.29*	−.29*	−.29*	−.29*	−.29*	−.29*	−.29*
Interaction effects																							
Food (non-food) × MOD	–	.14*,a	.22*	.04	.00	.04	.00	−.03	.04	−.26*	−.02	.02	−.06	.06*	−.02	.06	–	−.12	−.20*	–	.10*	−.10	−.12
Frequent (infrequent) × MOD	−.13	.05	−.41*	−.09	−.01	.08*	.03	−.04	.06	–	.06	.00	.25*	.06*	.05	.06	−.13*	.00	.37*	–	−.04	−.08	.01
Agglomeration (non) × MOD	−.13	.20*	−.09	−.09	−.02	.00	.11*	−.04	.00	−.19*	−.05	−.04	.03	.02	.05	−.10	−.13*	−.18*	.58*	–	.06	−.06	−.16
Hedonic (utilitarian) × MOD	−.05	−.03	−.15*	.02	.06	.08*	.09*	−.05*	−.02	−.05	−.02	.00	.02	.01	−.02	−.24*	−.13*	−.02	.05	.17*	.00	−.29*	–
GDP per capita × MOD	.00	.00	−.01	.01	.01*	.01	.01	−.01	−.01	−.01	.01*	.00	−.01	.00	.00	.00	.00	.01*	.00	.00	.00	.00	.01*
C. innovativeness × MOD	.02	.01	.03*	−.01	−.01	.00	.00	.00	.00	−.01	−.01*	−.01	.06*	.00	.02*	.00	.00	−.02*	.00	−.03	.00	−.01	−.07*
Share of retail sales × MOD	−.03	−.03*	−.01	−.01	−.04*	−.01	.00	.00	.04*	.02	.00	.01	−.01	.00	.07*	.00	.02	.03	.14	.01	−.08*	.12	
Employment in ret. × MOD	−.03	.05*	.06*	.01	.03*	−.03*	−.01	.01*	−.01	.01	.00	.00	.01	.00	−.01	−.02	.00	.00	−.05*	.04	.02*	.06	.09
Internet era × MOD	–	−.07	.51*	.09*	.01	.06	.01	−.06*	−.09	−.04	−.10*	−.01	−.03	−.03	−.04	−.07	.01	.01	−.09	−.22	−.04	−.16*	−.28*

* p < .05. The first row displays the instrument tested in the moderator analysis.

a Effect size of moderator food × access to store is .14 in the table. We do not propose interaction effects between method moderators and specific instruments.

H9, the effects of advertising and atmosphere increase and those of incentives and temporal/spatial distance decrease in studies conducted in the Internet era. The effectiveness of corporate branding, product range, and low prices does not show a difference after the advent of online retailers.

Method moderators

The results for method moderators yield significant effects for all three moderators. In line with our predictions, the effect sizes are stronger in studies using student samples (H10), longitudinal designs (H11), and survey data (H12).

Discussion

This research was motivated by the need to integrate prior research on retail marketing-mix instruments and their influence on retail patronage. The aim was to contribute to the literature by collecting empirical findings on marketing-mix effects, examining the effectiveness of different instruments, and providing cross-context theorizing on the impact of shopping context and retail environment characteristics on retail marketing instruments. The study synthesized 14,895 effect sizes of retail marketing instruments reported by 239,008 shoppers from 41 countries to develop a research agenda. In doing so, the study answers questions of *whether* and *when* to invest in specific marketing-mix instruments.

First, most instruments related to the management of the (1) product, (2) service, (3) brand, (4) price, (5) incentive, (6) communication, and (7) distribution influence at least one dimension of retail patronage directly. Furthermore, the importance of most retail marketing instruments differs across the various outcome variables. The only exception is quality of products, which matters for all examined outcomes. We find that instruments of all seven groups directly affect customer satisfaction. However, some predictors have significantly greater effectiveness in influencing retail patronage than others. While personal selling (communication), the retail and service tenant mix (service), corporate brand (brand), and low prices had the strongest impact on customer satisfaction, instruments like temporal distance (distribution) and product brands (brands) had a lower or even non-significant impact. Surprisingly, we do not find a positive effect of incentives on customer satisfaction. Evanschitzky et al. (2012) explain that transactional customers mainly visit a store for specific incentives and are less likely to develop a long-term relationship.

In addition, the importance of most retail marketing instruments differs for other outcome variables. Specifically, we find that product range, corporate brand, perceived value, service tenant mix, incentives, and in-store orientation strongly affect *patronage intention*. However, product brands, the corporate brand, incentives, retail tenant mix, and quality of products strongly affect *patronage behavior*. This finding underscores the differences in what affects intention versus actual behavior in a retail setting. For example, product brands are more relevant for changing actual shopping behavior than intentions. As such, carrying strong product brands may prevent customers from switching stores, as they do not need to go elsewhere to find their favorite brands, but carrying these brands neither satisfies customers nor helps them develop strong patronage intentions. Several other instruments also show a significant, positive impact on customer satisfaction but, at the same time, reduce patronage intentions. For example, store atmosphere can please customers, and they enjoy the shopping experience, but customers also seem to realize that, particularly in premium stores, they may not be able to afford purchasing frequently.

Moreover, customer service, retail tenant mix, maneuverability in store, and atmosphere strongly influence WOM. These instruments are related to the retailer's key product and service offer and are significant to shoppers who are only willing to recommend stores to family and friends that are truly important to them, with the effect that such recommendations improve their social standing. Surprisingly, some instruments do not display positive effects, such as perceived value and low prices of products. While customers may improve their social standing by telling family and friends about pleasant shopping experiences and the product and retail tenant offer, displaying a strong interest in discounts may reduce their social rank. We also observe that most location-related do not influence WOM; presumably, family and friends already know about retailers in their area.

Second, our study suggests that the magnitude of the relationships between marketing instruments and outcomes depends on the shopping and country context. We find that the impact of several instruments on retail patronage differs depending on what kind of products are offered, how often and whether a store is visited, and whether a shopping destination mainly serves hedonic or utilitarian customer needs. Of note, only acces from parking and parking show the same impact on patronage across all tested contexts. For shopping context, this is also true for product range, orientation, branded products, atmosphere, low prices, and temporal distance. The impact of service tenant mix, personal selling, and proximity to work on patronage is independent of the country setting. The effectiveness of all other instruments cannot be generalized across these contexts so easily.

Regarding shopping context, we find some differences in retail marketing instruments depending on whether food or non-food products are offered (e.g., maneuverability, shopping infrastructure, personal selling, and access to store), frequency of shopping (e.g., corporate brand, advertising, retail tenant mix, and personal selling), and agglomeration/single stores (e.g., quality of products, customer service, access to store, and maneuverability). We observe most differences when comparing formats with a hedonic retail focus as compared to those with a utilitarian focus (e.g., customer service, service tenant mix, corporate brand, and incentives). Research argues that the hedonic–utilitarian dichotomy is one of the most important factors in retailing. Babin, Darden, and Griffin (1994) show that consumers behave differently depending on their specific consumption motivations. While utilitarian shoppers engage in shopping out of necessity, hedonic shoppers desire rich experiences from shopping.

The moderating results also reveal a few surprising findings. For example, atmosphere and incentives had the same effects on food and non-food retailing. It seems that both instruments trigger unplanned purchases but are also capable of influencing

shoppers. In addition, access to store is more important for food than non-food retailers, which was not hypothesized. We interpret this with respect to the exhaustive nature of food shopping, which is a frequent and necessary task due to the characteristics of food products (i.e., perishability, sensitivity, weight, and volume). We also proposed atmosphere to be more important in agglomerations and in hedonic shopping situations, but it seems that the instrument is of universal importance across shopping contexts. Finally, we find that advertising is of greater importance for utilitarian settings, as shoppers may use it to prepare their shopping trips.

Third, our study reveals the importance of retail environment characteristics. The results suggest that the effectiveness of the different instruments depends on the country's GDP, innovativeness, share of retail employment, share of retail sales, and Internet era. Much of the examined research on retail marketing instruments has been conducted in the U.S. Our study suggests that scholars should consider the different retail environments in different country markets to better understand retail patronage. In particular, we find that the effectiveness of more than half of the investigated instruments differs in influencing retail patronage. For example, branding—on a product and corporate level—plays a more important role in more developed countries, while incentives and prices are less important in developed countries. In addition, many instruments are less effective in innovative countries because customers are used to provider switching, independent of the employed instruments. The results also suggest that marketing instruments work differently in competitive markets in which firms try to retain or increase their market shares. Furthermore, the results indicate that in countries with the possibility to interact more frequently with retail employees, particularly the understanding of incentives improves. Advertising also gains importance because employees help customers understand advertised offers. Finally, we find that several instruments gained importance with the advent of the Internet (e.g., advertising), while others lost relevance (e.g., spatial/temporal distance).

Fourth, our study assessed the influence of method moderators. The study clarifies that stronger effects exist in student samples, longitudinal designs, and studies using survey data. The findings thus suggest that studies should avoid student samples, use more longitudinal research designs, and combine data sources to ensure that associations are not inflated.

Managerial Implications

The findings of the meta-study have several practical implications for retail managers. In particular, they provide guidance on the importance of different retail marketing instruments in creating value for customers and supporting a retailer's strategic value proposition in the market. Table 5 describes the most essential instruments retail managers can use to establish and sustain retail patronage. For example, they can focus on different customer outcomes—from satisfaction, to WOM, to patronage intention and behavior—and take retail-specific factors into account, such as the shopping frequency (frequent/infrequent trips), the format (agglomeration/single store), and the shopping context (hedo-

nic/utilitarian), as well as environment-specific factors (e.g., country's GDP per capita).

Retailers intending to encourage positive WOM could focus on product management in particular and invest in the product range and quality of products, for example, by implementing category management initiatives and focusing on high-quality key suppliers in retail buying. Whereas the impact of product range is homogeneous across different shopping contexts, improvement of product quality varies and is, for example, less significant in agglomeration settings.

In addition, brand management-related instruments are effective in enhancing patronage behavior, arguably the most important patronage measure, as it translates most directly into sales and profits. However, strengthening the corporate brand, for example, by communicating the organizational brand values and building a consistent positive reputation is more effective in developed retail environments, while increasing the share of branded products in the range is less effective in innovative and concentrated environments.

Finally, the results show the relative importance of distribution management-related instruments over others and reveal that location characteristics do not account for key drivers of patronage. Nevertheless, they represent essential second-tier instruments for retailers, particularly the selection and management of store locations.

Agenda for Future Research

In addition to contributing to a better understanding of the effectiveness of different retail marketing instruments and providing new insights into the relevance of contextual factors, this study offers guidance for future research. Table 6 provides a structured agenda for future studies on retail patronage. The research questions are largely driven by the descriptive nature of quantitative meta-analyses, even when they are based on theory. Meta-studies can synthesize the state of the art in a field, but they may not necessarily reveal the *why* of it. The research agenda therefore suggests using more grounded theory and studies to further expand understanding (Deshpande 1983). For example, meta-analyses allow researchers to identify under-researched aspects in a field. While we differentiate between low prices and perceived value in our study, we could not include reference pricing as an instrument. Future research could examine how consumers perceive side-by-side price comparisons or pricing-per-unit approaches in different contexts.

It is also likely that the impact of antecedents, such as accessibility, product range, atmosphere, and convenience, are affected by the evolution of store-based retailing into part of an omni-channel value chain. Thus, research should investigate new antecedents relevant in a non-store environment, such as home delivery or return services. Future research could assess differences when comparing pure brick-and-mortar stores with brick-and-click stores or pure online stores. These moderator analyses require more data, and studies rarely combine online and offline instruments.

Retail marketing-mix instruments usually jointly influence shoppers in their decision making, and their effects may be

Table 5
Managerial implications.

Retail marketing instruments		SAT	PI	PB	WOM	Shopping context				Country characteristics				
						Food (non-food)	Frequent (infrequent)	Agglomeration (store)	Hedonic (utilitarian)	GDP per capita	Innovativeness	Share of retail sales	Retail Employment	Internet era
Product management	Product range		✓1.		✓1.	o	o	o	o	o	↑	↓	o	o
	Quality of products	✓4.	✓5.	✓3.	✓3.	o	o	↓	o	↑	↓	o	o	o
Service management	Customer Service				✓4.	o	o	↑	↑	↑	o	o	o	o
	Maneuverability				✓6.	↓	–	↓	o	↓	o	o	o	o
	Orientation	✓9.	✓4.			o	o	o	o	↓	↓	o	o	↓
	Parking		✓10.			o	o	o	o	o	o	o	o	o
	Retail tenant mix	✓2A.		✓6A.	✓4A.	o	↑	–	o	o	o	o	↓	o
	Service tenant mix	✓3A.	✓4A.		✓5A.	–	–	–	↑	o	o	o	o	o
	Shopping infrastructure					↑	o	o	o	o	o	o	↑	o
Brand management	Branded products			✓2.		o	o	o	o	↑	↓	↓	↑	o
	Corporate brand	✓2.	✓2.	✓1.	✓2.	o	↑	o	↑	↑	o	o	↓	o

Category	Instrument												
Incentive management	Monetary/non-monetary incentives		⑦	⑤	⑩	o	o	o	↓	↓	o	o	↑	↓
Communic. management	Advertising					↑	↓	↑	↓	↓	↑	o	↑	↑
	Atmosphere	⑤		⑥	⑤	o	o	o	o	↑	↓	o	↑	↑
	Personal selling	①				↑	↑	o	o	o	o	o	o	o
Price management	Low prices	③				o	o	o	o	↓	o	↑	o	o
	Perceived value		③	④		o	↑	o	o	↓	↑	o	o	o
Distribution management	Access from parking	⑩		⑩		–	o	o	o	o	o	o	o	–
	Access to store					↑	o	↑	o	o	↑	↓	↑	o
	Proximity to home	⑥	⑧	⑦	⑨	o	o	o	↓	o	o	↑	o	o
	Proximity to work	⑧	⑥	⑧	⑦	–	↓	↓	↓	o	o	o	o	o
	Spatial distance	⑦		⑨	⑧	o	o	o	↓	o	o	↓	o	↓
	Temporal distance		⑨			o	o	o	-	↑	↓	o	o	↓

Notes. Numbers in circles represent the ranking of the 10 highest impacts of instruments on retail patronage dimensions (e.g., 1 = highest impact, per retail patronage category); capital A in the encircled numbers indicate an instrument exclusively relevant for retail agglomerations; arrows indicate a positive (↑), a negative (↓), and no effect (o) of the moderator on the interaction between the instrument and retail patronage; a dash indicates that a moderator is not applicable or data are unavailable.

Table 6
Research agenda on retail marketing mix instruments.

Issue	Research questions and comments
Endogenous mechanisms	*What other marketing instruments should be considered?* Despite being comprehensive, this meta-analysis does not cover all facets of retail patronage and its driving factors. Future research could focus in more detail on additional facets of retail instruments—for example, other pricing image dimensions or atmospheric cues.
	How is retail patronage of online and omni-channel retailers affected? It is likely that the meaning and the impact of the instruments are affected by the evolution of store-based retailing into part of an omni-channel value chain. Patronage research could use adapted measures to capture this changing meaning and importance for customers, including new instruments such as delivery or return services and website quality.
Outcome variables	*Do absolute constructs sufficiently measure retail patronage?* Baltas, Argouslidis, and Skarmeas (2010) stress the importance of considering that consumers patronize sets of stores rather than one or a few stores. Future research should take into account relative measures, such as share of visits and share of spending.
	What are other retail patronage measures? The measures used in this research are limited and could be extended to, for example, a more situational dimension to derive a more holistic understanding of patronage. In particular, spending per trip for goods and services, conversion rate per trip (visit vs. purchase), willingness to stay, and retention time could be useful additions in future research.
Moderating mechanisms	*What is the impact of the shopping situation on retail patronage?* Van Kenhove, De Wulf, and Van Waterschoot's (1999) seminal work investigates the strong impact of the shopping situation on consumer behavior. This is widely neglected in retail patronage research and calls for more consideration through the extension of the model with independent variables such as, for example, shopping task, shopping company, and weather.
	What other consumer groups need to be considered in retail patronage research? Most authors try to produce results that are generalizable to wider populations—typically the clientele of a store and catchment areas. Few focus on distinct customer groups such as older, disabled, or spatially disadvantaged consumers.
	How generalizable are the findings in the literature? The meta-analysis process shows geographic pockets of extensive patronage research. Vast areas such as South America and Africa have not received significant attention in research on retail patronage. We clearly identify a need for more replication studies.
Method	*What is the detailed research and analysis design of retail patronage?* The detailed examination of retail patronage research reveals a need to better report methodological details that would make replication in different settings possible. This relates to research design details (e.g., sample selection procedures, population, survey situation) as well as details of the applied analysis approach, including statistical ratios such as correlations, reliability, and validity measures.
	How do retail patronage and its antecedents change over time? Most of the identified studies used cross-sectional data. Although this may be understandable because of resource restrictions, it neglects the changing nature of retail patronage research over time. More studies that apply a longitudinal approach in investigating retail patronage are required.
	How are retail instruments and retail patronage variables measured? This research reveals that there is no common ground in terms of the measurement of the variables of our conceptual model. We suggest there is a need for further scale development in this area, providing comprehensive measures for the instruments.
	What other methods, apart from surveys, could be used to investigate retail patronage? Few studies use different methodological approaches. More exploratory and qualitative research should be used. Aspects such as ethnographic studies, accompanied shopping trips including think-aloud protocols, focus-group discussion, and observation could be used in combination.

synergistically. While these effects are difficult to test in meta-analyses that focus mainly on study-level moderators, future research should try to explore which marketing instruments interact with each other.[5]

Finally, we observed in the meta-analysis that sometimes the effect sizes of some instruments turned negative. The results of a multi-level modeling with dummy-coded effect sizes (negative vs. positive) suggest that negative correlations are more likely for the location instruments: proximity to home, proximity to work, spatial distance, and temporal distance. The negative correlations are also more likely for student samples and data collected from secondary sources. Future studies should continue assessing these negative effects.

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[5] In 6.10% of collected studies, the authors examined interaction effects. Less frequently, these studies examined interactions between two instruments (Ha 2009). More frequently, they tested interactions between instruments and socio-demographics (Evanschitzky and Wunderlich 2006) or relational variables (Walz and Celuch 2010).

Limitations

This meta-analysis also has several limitations that are inherent to this method. First, the limited number of published studies and the contextual settings examined prevented us from investigating different emerging markets in more detail. Recent research indicates that shoppers in developing markets differ in their preferences and choices from shoppers in developed markets, making this a useful moderator. As more studies accumulate, the number of moderators examined can be expanded. Second, Jak and Cheung (2018) propose a new approach that imputes missing variables in structural equation models. Given the size of our model, we could not impute the missing data with this approach, but suggest that future studies use it. Third, the HLM model considers the nesting of the data, whereas the SEM does not. Future studies should reassess the model with software that supports multi-level SEM. Finally, meta-analyses have a retrospective view and focus on synthesizing prior research. Given the changes in technology, retailers may use different marketing instruments in the future to establish patronage. The

role of technology is under-researched in that context and is likely to impact the effectiveness of marketing instruments (e.g., self-service technology).

Appendix A. Supplementary data

Supplementary data associated with this article can be found, in the online version, at https://doi.org/10.1016/j.jretai. 2018.03.001.

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