# Effects of Retargeting on Post-Purchase Behavior in the Tourism Industry

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# Chapter 1: General Introduction

## 1.1 Opening Statement and Context

The tourism industry has undergone a profound transformation in the digital era, embracing advanced digital advertising strategies to engage and entice potential tourists more effectively. Advertising is a crucial bridge between potential travelers and the vast array of travel destinations and services available globally. Through compelling and creative marketing strategies, advertisers aim to captivate and inspire audiences by presenting visually appealing and informative content of the unique characteristics of different locales, such as picturesque landscapes, cultural festivals, luxurious accommodations, and adventure activities. According to Morrison (2022), effective advertising not only captures the essence and excitement of travel experiences, fueling the wanderlust of audiences, but also drives the economic engine of regions dependent on tourism. The primary goal of such advertising efforts is to convert viewers into visitors, leveraging a variety of media platforms to reach diverse audiences and maximize the impact of promotional efforts (Buhalis & Law, 2008). By doing so, advertising supports regional economies and fosters global cultural exchange and understanding (Hudson & Ritchie, 2006).

The digital transformation of the tourism industry represents a pivotal shift from traditional marketing to the integration of advanced digital strategies, fundamentally reshaping the landscape of consumer engagement. E-tourism, or electronic tourism, refers to the digital processes utilized in creating, managing, and marketing tourism products and services, allowing consumers and suppliers to connect directly through technological platforms. The inception of the internet and subsequent advancements in digital technology have revolutionized how travel products are marketed and consumed (Pencarelli, 2020). Initially, digital marketing in tourism was

characterized by essential online bookings and email promotions; however, the advent of social media platforms and mobile technologies brought about a more dynamic interaction between travelers and service providers (Buhalis & Law, 2008). The introduction of sophisticated data analytics has refined these interactions, enabling hyper-personalized experiences catering to individual preferences and behaviors (Sahni et al., 2019). This digital evolution underscores the importance of understanding the impact of technologies such as retargeting. In 2023, the digital marketing landscape witnessed substantial investments by leading Online Travel Agencies (OTAs), with expenditures on Google advertising exceeding eight billion U.S. dollars, and the travel industry experienced a significant digital shift with online sales accounting for 62% of all transactions in 2018. This proportion is expected to rise, with projections indicating that online sales could surpass 75% by 2028, reflecting the increasing consumer preference for the convenience and accessibility of online booking systems (Statista, 2024).

Digital retargeting in marketing refers to the technique of targeting advertisements to consumers based on their previous online behavior, especially useful in the tourism sector where the decision-making process is lengthy and often interrupted. It highlights the necessity of studying their effects on consumer behavior within the e-tourism domain. Retargeting in digital marketing is a powerful tool designed to enhance customer re-engagement by displaying relevant ads to users who have previously visited a website without purchasing (Johnson et al., 2017). Retargeting becomes essential in tourism, where decisions are often pondered over multiple sessions across various platforms. It keeps the travel products top-of-mind, gently nudging the customer towards finalizing their travel plans. By tailoring content that aligns with the previously expressed interests of users, retargeting increases the likelihood of converting earlier browsers into bookers, thereby

enhancing the overall effectiveness of online marketing efforts in the tourism industry (Lambrecht & Tucker, 2013).

On the positive side, retargeting can significantly enhance customer engagement by providing personalized experiences that are directly aligned with user interests and past behaviors. For instance, a user who has searched for flights to a specific destination might receive targeted offers or reminders about special deals on those flights, increasing the likelihood of completing the booking (Candra et al., 2022). This marketing method not only increases conversion rates but also builds a sense of loyalty and satisfaction by offering relevant options that genuinely match the user's needs, ultimately enhancing the user experience within the digital tourism marketplace (Ringvald & Rodriguez Garcia, 2016).

However, retargeting has its drawbacks. One of the main criticisms is the potential for creating a sense of intrusion or annoyance among consumers, especially when the frequency of retargeting ads becomes excessive (Chen & Stallaert, 2014). Additionally, if not finely tuned, retargeting ads can misalign with the current interests or changed circumstances of the user, leading to a perception of irrelevance and a possible negative impact on brand perception. Such negative experiences can detract from the intended benefits of retargeting, leading to diminished customer satisfaction and potentially harming consumers' purchasing experience and future purchasing plans (Lambrecht & Tucker, 2013; Van Doorn & Hoekstra, 2013). Research on retargeting in the tourism industry often emphasizes its technological aspects and positive impacts, neglecting its negative effects and the role of consumer-centric variables. Further exploration in these areas can provide valuable insights for improving digital marketing strategies in tourism.

## 1.2 Research Justification and Gap

This thesis rigorously identifies and explores significant research gaps with critical implications for academic discussion and the practical deployment of digital retargeting in the burgeoning e-tourism sector. The thorough examination of digital retargeting's negative effects on consumer behavior extends beyond academic interest, addressing an essential need to unravel the complexities embedded in contemporary consumer engagement strategies. While the immediate effectiveness of retargeting ads in prompting consumer actions is well recognized (Li & Kannan, 2014), there remains a striking lack of research focused on the negative impact on consumers' purchasing experience, and online behavior. This gap is especially crucial considering the importance of maintaining customer relationships to gain a competitive advantage in the rapidly changing digital marketplace (Bleier & Eisenbeiss, 2015; Lambrecht & Tucker, 2013).

The effectiveness of retargeting advertisements depends on three key aspects: technological, consumer-related, and contextual factors. Technological factors refer to the digital tools and methods used to target ads to consumers, which are crucial in the changing landscape of digital advertising (Kannan, 2017). Consumer-related factors involve the perceptions and behaviors of the audience, which are essential for understanding how ads are perceived and engaged with (De Mooij, 2019). Contextual factors, such as cultural and market dynamics, also significantly influence ad effectiveness, highlighting the importance of the broader environment in which these ads are placed (Stipp, 2018).

Further complicating the landscape is the exploration of the roles of trust in technology and digital skills, variables stand at the crossroads of consumer engagement yet still needs to be explored conspicuously underexplored within the retargeting context. Trust and digital skills shape the trajectory of consumer interactions with digital advertisements and significantly influence the

resultant engagement outcomes. While the literature provides a scaffold for understanding the impact of trust and digital capabilities on broader digital marketing practices, there exists a striking gap in dissecting how these pivotal factors specifically interact with retargeting strategies, particularly in the nuanced domain of e-tourism (McKnight & Chervany, 2001; Van Deursen & Van Dijk, 2010; Zhu et al., 2019). This gap underscores an urgent need for focused research to unravel the complex interplay between these variables and retargeting outcomes, thereby informing the creation of more sophisticated, effective marketing strategies.

Moreover, the influence of cultural values on consumer responses to retargeting ads introduces an additional, yet critical, dimension of complexity. In an era where the e-tourism marketplace is inherently global, engaging consumers across a tapestry of cultural backgrounds, the nuanced understanding of how cultural heterogeneity influences behavior towards retargeting ads is crucial. Current research offers limited guidance on how cultural variations affect digital marketing effectiveness, suggesting a significant gap in knowledge regarding the role of cultural values in digital marketing (Hofstede, 1980; Mueller et al., 2014). This gap highlights a critical need for research integrating cultural considerations into digital marketing strategy evaluations and underscores the potential for enhancing global consumer engagement through culturally attuned marketing practices.

In extending the discourse, this thesis is ambitiously positioned to bridge these identified gaps, aiming to comprehensively explore the impacts of digital retargeting within the e-tourism sector. By undertaking a granular analysis of the intricacies of consumer satisfaction and loyalty, examining the moderating effects of trust and digital skills, and assessing the influence of cultural values, this research endeavors to enrich our theoretical landscape and provide actionable insights for navigating consumer engagement in the digital epoch. Through this holistic analysis, the thesis

aims to make substantive contributions to the ongoing discourse on digital marketing strategies, furnishing valuable insights poised to steer the future direction of the e-tourism industry towards more engaging, consumer-centric, and culturally responsive marketing paradigms.

In venturing beyond the traditional confines of digital marketing and consumer behavior studies, this thesis introduces novel perspectives on the post-purchase effects of retargeting within the e-tourism domain. It distinguishes itself by intricately examining how cultural values, trust, and digital skills collectively shape the consumer's digital journey post-purchase—a facet previously uncharted with this degree of specificity in the e-tourism context. This research pioneers the integration of Hofstede's cultural dimensions at an individual level, offering a refined lens through which the global diversity of consumer responses to retargeting is observed and deeply understood. Furthermore, juxtaposing consumer reactions across varied cultural backdrops unveils how globalization and digital innovation intersect, reshaping consumer expectations and engagement in the digital age. Such an approach fills a significant gap in the existing literature and sets a precedent for future explorations into the dynamic interplay between digital marketing strategies and the evolving cultural contours of consumer behavior.

## 1.3 Theoretical Framework

The theoretical underpinning of this research intricately blends the Expectation Confirmation Theory (ECT) with nuanced insights from cultural studies, alongside theories about trust and digital skills, to dissect the multifaceted impact of digital retargeting within the e-tourism landscape. At the heart of this framework, ECT suggests that consumer satisfaction emerges when their post-purchase experiences either meet or exceed their initial expectations, influencing their likelihood to repurchase and their overall brand loyalty (Bhattacherjee, 2001; Oliver, 1980). This

theory serves as the bedrock for understanding the pivotal role of consumer expectations in navigating the digital marketing ecosystem.

To further enrich this foundation, the framework integrates the notion of trust, particularly emphasizing trust in technology, as a critical element that shapes how consumers engage with digital platforms and advertisements. It posits that trust could significantly moderate the relationship between expectation confirmation and satisfaction, suggesting that a robust trust in technology might enhance the positive effects of expectation confirmation on consumer satisfaction (McKnight & Chervany 2001; Gefen & Straub, 2004)

Digital skills, defined as the competencies required to navigate and utilize digital content effectively, is another dimension woven into this theoretical fabric. The hypothesis here is that individuals with greater digital skills might have a distinct approach to processing and evaluating retargeting ads, which could uniquely influence their post-purchase satisfaction and intentions to repurchase (Hargittai, 2005; Van Deursen & Van Dijk, 2010).

Furthermore, this framework embraces Hofstede's cultural dimensions theory to probe how underlying cultural values shape consumer reactions to retargeting ads in an e-tourism setting (Hofstede, 1980). By incorporating cultural considerations, the study recognizes the vast diversity of the consumer base. It aims to unravel how cultural traits such as individualism versus collectivism, uncertainty avoidance, and power distance might color the perceptions and effectiveness of digital marketing strategies (De Mooij & Hofstede, 2010).

This synthesis of theoretical perspectives seeks not only to align with established consumer behavior and digital marketing theories but also to pioneer the examination of the interplay between cultural nuances, trust, and digital skills within the context of digital marketing. The

framework aims to offer a holistic understanding of the dynamic interactions between digital retargeting practices and consumer behavior, contributing valuable insights to both the academic discourse and practical strategies in the ever-evolving domain of e-tourism marketing. Through this comprehensive theoretical lens, the study aspires to illuminate the complex web of factors that influence consumer engagement and satisfaction in the digital age, providing a roadmap for navigating the challenges and opportunities presented by digital retargeting in the e-tourism sector.

## 1.4 Objective and Research Questions

Reflecting on the rich tapestry of insights woven through the literature review, which unveils the complex interplay between digital retargeting practices, consumer behavior, and the subtle yet profound influences of cultural values and digital skills, the overarching objective of this thesis is to dissect and understand the multifaceted effects of retargeting strategies within the e-tourism sector. This inquiry delves into the post-purchase behaviors of consumers, aiming to illuminate how the nuanced interplay of retargeting strategies with individual differences in trust, digital skills, and cultural backgrounds shapes these behaviors. In doing so, the thesis endeavors to bridge theoretical gaps and enhance practical applications in digital marketing, aspiring to bolster consumer satisfaction, foster repurchase intentions, and amplify the efficacy of digital marketing strategies across a digitally diverse and culturally rich global marketplace.

To navigate this exploration, the research is anchored by an array of questions that stem from the intricate themes identified within the three thematic papers:

*Q: How do post-purchase retargeting ads impact consumer behavior in the e-tourism sector?*

This question investigates the direct and indirect influences of retargeting ads on consumers' post-purchase experiences, investigating the potential enhancement or diminution of satisfaction levels and future brand engagements.

*Q: To what extent do consumers' trust and digital skills moderate the relationship between exposure to retargeting ads and consumers' post-purchase behavior?*

This question examines how these individual characteristics mediate the relationship between retargeting strategies and consumer reactions, potentially shaping attitudes towards future purchases.

*Q: How do cultural patterns affect responses to post-purchase retargeting?*

By measuring cultural values individually and grouping tourists based on similarities in these values, we offer a new approach to exploring cultural heterogeneity. By exploring the spectrum of cultural dimensions, this inquiry aims to identify how cultural diversity affects the reception and efficacy of retargeting campaigns (De Mooij & Hofstede, 2010).

All these questions can help e-tourism businesses leverage insights from retargeting strategies to develop a more effective, consumer-centric marketing approach. This question contemplates the application of research insights into practical strategies for e-tourism marketers, aiming to devise retargeting approaches that are not only technologically sophisticated but also deeply attuned to consumer preferences and cultural nuances.

The research addresses comprehensive questions, aiming to fill gaps identified in existing literature. It seeks to provide a detailed understanding of how digital marketing practices interact with various aspects of consumer behavior. The anticipated findings are expected to offer marketers in the e-tourism industry actionable insights. These insights will help in developing

retargeting strategies that are personalized, culturally considerate, and designed to foster long-term consumer engagement and loyalty.

## 1.5 Methodology Overview

This thesis explores e-tourism consumer behavior through empirical studies conducted in different cultural settings, particularly in Saudi Arabia and Spain. The comprehensive methodological framework integrates Partial Least Squares Structural Equation Modeling (PLS-SEM), Confirmatory Factor Analysis (CFA), and Hierarchical Clustering Analysis (HCA) to analyze the responses collected from a sample of e-tourism consumers thoroughly.

The thesis began with Chapter 2, focusing on e-tourism consumers in Saudi Arabia. The data collection method involved distributing survey links via social media, resulting in a substantial engagement with 396 valid responses from 850 invitations. The survey assessed constructs such as expectation confirmation, satisfaction, repurchase intentions, and perceptions of retargeting. This chapter employed PLS-SEM to estimate the causal relationships among these constructs, with an innovative focus on the impact of the time spent online in various categories as a significant variable influencing consumer responses (Hair et al., 2021).

Chapters 3 and 4 extended the dataset to include 405 participants from Spain and Saudi Arabia. The questionnaires, designed to probe deeper into constructs including trust, digital skills, and cultural values, were drafted in English and translated into Arabic and Spanish using the back-translation method (Brislin, 1976) to ensure linguistic and cultural accuracy. The same dataset was utilized in these chapters to maintain methodological consistency and validity.

The statistical approach in these chapters continued with using PLS-SEM for structural modeling, a robust method especially beneficial for exploratory research and smaller sample sizes

(Hair et al., 2019). Chapter 3 introduced moderation analysis to examine how variables like trust and cultural values influence the foundational relationships within the model (Becker et al., 2018; Sarstedt et al., 2016a). Meanwhile, Chapter 4 applied CFA to validate the scales of the cultural dimensions, followed by HCA to identify underlying patterns within the data. HCA, chosen for its ability to reveal nested structures within the data, was complemented with the Elbow Method and Silhouette Analysis to determine the optimal number of clusters and assess their distinct characteristics (Murtagh & Legendre, 2014; Rousseeuw, 1987).

Each chapter's analysis contributed to a nuanced understanding of e-tourism consumer behavior, elucidating both commonalities and differences across different cultural contexts. The integration of findings from these empirical studies emphasizes the effectiveness of competitive retargeting ads and the profound influence of cultural factors on consumer behaviors. This synthesis reinforces the theoretical frameworks employed and provides practical insights for marketers in the e-tourism industry. By employing sophisticated statistical techniques and ensuring rigorous data collection and analysis procedures, this thesis offers substantial contributions to understanding e-tourism marketing strategies and consumer behavior dynamics in a cross-cultural framework.

## 1.6 Significance of the Study

This study significantly advances the understanding of digital retargeting's nuanced effects on post-purchase consumer behavior in e-tourism, exploring how these strategies intersect with crucial factors like trust, digital skills, and cultural values. It fills critical gaps in the academic literature on consumer behavior and digital marketing, offering new insights that blend psychological and cultural perspectives (Gretzel et al., 2015). Theoretically, it enriches the dialogue around digital

marketing’s long-term impacts, challenging existing frameworks to accommodate the complex dynamics of consumer engagement post-purchase.

Practically, the implications of this research are particularly valuable for e-tourism marketers. The findings provide actionable insights for crafting more personalized, effective, and culturally attuned marketing campaigns in an industry where standing out and maintaining consumer loyalty is paramount. These tailored strategies aim to enhance consumer satisfaction and underscore the importance of ethical marketing practices that respect consumer privacy and promote transparency.

Overall, this study contributes to a deeper theoretical understanding and equips practitioners with the knowledge to implement ethical and effective retargeting strategies. By doing so, it addresses the pressing need for marketing approaches that are both innovative and considerate of the diverse preferences and values of a global consumer base, marking a significant step forward in the discourse on digital marketing ethics and effectiveness.

## 1.7 Structure of the Thesis

The thesis is designed to systematically unfold the complexities of digital retargeting within the e-tourism sector. Each chapter builds on the insights gained in the preceding one, progressively deepening the understanding of digital marketing's influence on consumer behavior.

Chapter 2 sets the foundational stage by analyzing e-tourism consumers in Saudi Arabia. It assesses basic constructs such as expectation confirmation, satisfaction, and repurchase intentions related to retargeting. This serves as the basis for more complex analyses in subsequent chapters.

Chapter 3 expands on the initial findings by incorporating trust and digital skills into the analysis. It compares data from Saudi Arabia and Spain, exploring how individual differences moderate the effectiveness of retargeting ads. This chapter enriches the foundational relationships examined previously by adding an intercultural dimension to the analysis.

Chapter 4 integrates cultural values, employing advanced statistical methods to reveal how cultural diversity influences consumer responses to retargeting. This chapter synthesizes the insights from earlier chapters, adding a cultural layer to the established models.

Each chapter of this thesis methodically builds on the findings of its predecessor, addressing interconnected research questions that deepen the understanding of digital retargeting's impact on consumer behavior in varying cultural contexts. This sequential approach not only enriches the narrative but also enhances the robustness of the analysis. The structure adheres to stringent academic standards and aligns strategically with the thesis's overarching aim: to deliver actionable insights that can significantly improve digital marketing strategies in the e-tourism sector. By elucidating these connections clearly in the introduction, the thesis sets a coherent path for exploring complex consumer dynamics within the digital tourism marketplace.

# 2. Chapter 2: A Dark Side of Retargeting? How Advertisements That Follow Users Affect Post-Purchase Consumer Behavior: Evidence from the Tourism Industry in Saudi Arabia

## 2.1 Introduction

In today's digitized world, retargeting has emerged as a crucial tool in digital marketing. By creating messages tailored to users' past online behaviors, businesses aim to enhance sales and engage more effectively with their audiences. Yet, this modern technique comes with its intricacies. The tourism industry, with its significant reliance on e-platforms for bookings and the transient nature of its offerings, presents unique challenges and opportunities for retargeting.

The well-documented efficacy of retargeting in driving initial purchases is in stark contrast with the relatively unexplored post-purchase phase. After finalizing a purchase, consumers frequently encounter similar adverts, potentially influencing their satisfaction with their decision. This ongoing exposure can reshape their perception of the initial provider and influence their likelihood to repurchase or recommend the service to others. This scenario suggests a potential dark side to retargeting which might not only affect consumer satisfaction but also long-term brand loyalty and trust.

Using the e-tourism industry in Saudi Arabia as a backdrop, this study delves into this critical area of post-purchase retargeting. With Saudi Arabia emphasizing tourism as a significant component of its broader future vision, grasping the nuances of digital strategies like retargeting becomes paramount. Through this specific context, we aim to illuminate a phenomenon that holds global relevance but carries distinct implications for emerging digital economies like Saudi Arabia.

## 2.2 Literature Review & Hypotheses

Dynamic retargeting targets past website visitors using customized adverts, reflecting products or services they've previously viewed online. This digital marketing strategy has become prevalent because it is technologically easy to implement, reaches a vast target audience in real-time, and allows marketers to identify consumer interests and match their needs with available products. Previous research by Lambrecht and Tucker (2013) outlines a retargeting system based on three main entities: retargeters, advertisers, and consumers. Retargeters aggregate advertising space across social sites like Facebook, LinkedIn, WordPress, and YouTube, connecting advertisers to consumers. This advertising space is then sold to advertisers who wish to promote their products by showing adverts to consumers. The effectiveness of this strategy has attracted much attention from researchers, in terms of the importance of advert personalization, positive and negative effects, importance of timing and frequency, advertising exposure, and variations of retargeting ads effects across different stages of the consumer journey.

Building upon the effectiveness of this strategy, Sahni et al. (2019) identified positive effects of retargeting, discovering that retargeting leads to a 14.6% increase in users revisiting a website within the first four weeks of targeting, with a 33% efficiency rate in the first week. Their study found complementarity in retargeting, where users exposed to advertising in the first week were significantly influenced by retargeting in the second week, indicating a positive effect on purchasing decisions. Importantly, the research did not show a decrease in retargeting effectiveness with increased exposure.

Shifting to economic dimensions, Chen and Stallaert (2014) examined the economic impacts of behavioral targeting in online marketing. The authors used a horizontal differentiation model to analyze the user-ad alignment. They found that behavioral targeting can notably increase

revenue for online publishers, sometimes even doubling it. However, outcomes depend on advertiser competition and valuations. The study identified two main effects: the competitive effect and the propensity effect, which determine the revenue outcomes. Importantly, while behavioral targeting can elevate overall welfare and assist smaller advertisers, large advertisers might see fewer benefits and might hesitate to shift away from conventional advertising.

Several studies have examined the dual-edged nature of retargeting. For instance, Kim and Ohk (2017) carried out research involving 258 participants to assess the contrasting effects of retargeting. Their findings indicate that when executed effectively, retargeting can elicit positive emotions in potential customers, thereby exerting a favorable impact. However, if the quality of retargeting falls short, it can have adverse consequences, affecting the company's brand reputation and causing unfavorable emotional responses in customers. A similar phenomenon occurs with excessive banner ad displays, as overuse of retargeting can induce feelings of pressure and erode trust in potential customers.

Building on prior research, Zarouali et al. (2017). delved into how advertising on Facebook affects adolescents' skepticism and purchase intentions. It found that retargeting ads generally increase purchase intentions. However, when adolescents receive information about the advertising technique or have high privacy concerns, their skepticism increases, leading to lower purchase intentions. These findings have implications for policymakers, practitioners, and educators.

On a related note, Farman et al. (2020) explored consumer reactions to retargeting ads, which are sometimes deemed "creepy.". The study with 280 participants revealed that behavioral targeting boosted purchase intent directly, but also had indirect negative implications. Specifically, it led to heightened perceptions of marketing surveillance, resulting in increased feelings of threat,

psychological reactance, negative ad views, and reduced purchase intent. The indirect cost of this perceived surveillance was quantified at a 4.5% reduction in purchase intent.

Navigating the fine line between personalization and privacy, Van Doorn and Hoekstra (2013) focused on the balance between personalizing ads for consumers and the implications for privacy. Results show that high levels of personalization can make consumers feel intrusive and decrease their purchase intentions. Discounts don't fully counteract this effect. However, when ads closely align with consumers' needs, they can partially alleviate intrusiveness, but excessive personalization can still reduce purchase intentions.

Further to the interplay between levels of personalization and privacy concerns, research by Aguirre et al., (2015) delves into the impact of the influence of various methods for gathering data on the success of online advertising tailored to the individual, shedding light on the personalization paradox. It finds that transparent data collection enhances personalization success, while covert methods lead to reduced effectiveness due to heightened consumer vulnerability. In a similar context, Bleier and Eisenbeiss (2015) found that for less trusted retailers, high-depth personalization leads to increased reactance and privacy concerns, negatively affecting click-through intentions.

Emphasizing the importance of privacy in retargeting ads, a survey by Cooper et al. (2023) included 818 US internet users revealed that 26% like relevant ads and accept some tracking methods, 25% are neutral, 34% prefer relevant ads but are cautious about data collection, and 15% oppose the methods entirely. These findings shed light on diverse perspectives concerning retargeting ads and their privacy implications.

Acknowledging the significance of timing in retargeting ads, a study by Li et al. (2021) examined how the timing of e-commerce retargeting ads impacts consumer behavior. For instance, it uncovers that displaying ads too early can diminish consumers' purchase intentions. Their research, involving over 40,500 customers, indicates that early retargeting (30 to 60 minutes following shopping cart abandonment.) reduces purchase likelihood, while late retargeting (between one and three days later) influences purchases in a positive manner. These insights provide a valuable understanding of how consumers respond to these ads.

Building on the theme of user behaviors, Jiang et al. (2021) analyzed the correlation between research intensity and the effects of retargeting ads, using a dataset obtained from Taobao.com, the largest Chinese e-commerce platform, comprising behaviors of 104,189 consumers. Their results uncover significant findings regarding retargeting strategies. Notably, users displaying higher search intensity exhibited considerably higher conversion rates from retargeting advertisements. This insight sheds light on the effectiveness of retargeting efforts based on user search behaviors on online retail platforms.

Recent research took a turn towards the effect of retargeting ads in various stages of the consumer journey, Semerádová and Weinlich (2023) found that retargeting ads' performance varies significantly at different customer journey stages. Their study, spanning one month in 2021 and repeated in 2022, analyzed 432 retargeting ads from a Czech online retailer. It revealed that standard retargeting is effective for utilitarian browsing, while dynamic retargeting is superior on social networks. Additionally, their research emphasizes that retargeting ads serve unique purposes at different consumer journey stages.

Building on the post-purchase stages, Villas-Boas and Yao (2021) investigated the optimal retargeting strategy for firms. When consumers search for product information, researchers

highlighted the limited control firms have over retargeting ads. They pointed out that consumers might continue to receive these ads even after completing a purchase, which could potentially affect the post-purchase impact of retargeting ads.

The existing research has acknowledged the gap in understanding the post-purchase effects of retargeting ads. Johnson et al. (2017) have stated that if retargeting ads lead to reactance in consumers, it can undermine the effectiveness of advertising. Therefore, as discussed by Baek and Morimoto (2012), it is important to acknowledge that the influence of these ads goes beyond their role in driving initial purchases. They also have the power to shape consumers' post-purchase behavior, impacting their satisfaction levels and shaping their intentions for future purchases.

Our research focuses on the negative effects of retargeting on the post-purchase stage of the buying process. To study this effect, we frame retargeting within ECT, as this makes it possible to link retargeting with expectation confirmation, satisfaction, and repurchase intentions. ECT was created to clarify how satisfaction is influenced by expectations, perceived experiences, and the disconfirmation of those expectations (Oliver, 1977, 1980). ECT compares consumer notions regarding a service or product before purchase (expectation) with their post-purchase opinion of the product (experience). It, therefore, measures whether expectations are met.

The association between expectation confirmation, satisfaction, and repurchase intentions is well-documented in existing research. and has also been tested in several contexts, including e-tourism by Zhong et al. (2015) in a study that aimed to understand Chinese user behavior regarding mobile travel booking services utilizing the expectation confirmation theory, and found that expectation confirmation is a significant driver of their satisfaction, and users' intention to continue using mobile travel booking services primarily hinges on how satisfied consumers are.

The type of retargeting ads, whether for less or more competitive offers than the initial purchase, is assumed to influence the consumer's expectation confirmation and satisfaction by altering the reference point. Consumer satisfaction after purchasing an offer (A) depends on the quality of the post-purchase competitive offer (B) and the offer (C). Offers by competitive websites using retargeting ads may be better or worse than the purchase (offer A). However, in this study, we only consider the case where the post-purchase retargeting offer is considered more competitive than the original purchase from the respondent's perspective. Competitive retargeting ads are assumed to modify a consumer's original expectations (Pinquart et al., 2021) and are also assumed to indirectly affect satisfaction and repurchase intentions.

In a study conducted by Chen and Lin (2019), the impacts of online advertising on user satisfaction and future buying behavior through social media were examined. The research delved into the role of e-word of mouth—a notable form of social media marketing—and its influence on user intentions such as continued usage, participation, and purchases. Through a survey of 502 social media users, Chen and Lin identified that social identification and perceived value are significant mediators. These factors not only impact user satisfaction directly but also shape their broader intentions on social media platforms.

To understand the correlation between using digital platforms and making purchases on the internet Zhang et al., (2017) analyzed data from 7,402 unique users, monitoring their internet-based searching and buying actions throughout a year, encompassing 140,291 distinct purchase transactions. The findings show a positive correlation between increased overall social network usage and a rise in online shopping activity. Advertising exposure is related to the time a consumer spends viewing media. It has been found that greater exposure to advertising, including on social media platforms, is associated with better advert content recall and a higher probability of

purchase. The more time consumers spend online, the more likely they will encounter relevant information or better promotional offers. The link between advertising efficacy and online time is closely related to consumer information processing. Thus, we included the daily time spent online as a factor that can moderate the effect of retargeting ads.

Existing research has extensively explored the influence of retargeting in digital marketing, but a clear gap remains regarding its post-purchase implications. Building on this foundation, our study aims to assess the influence of retargeting ads following a purchase on the confirmation of expectations, satisfaction, and repurchase intentions among Saudi Arabian e-tourism users. We will also evaluate the potential influence of advertising exposure on retargeting effects. The subsequent hypotheses have been developed in light of the preceding literature review. (Figure 2.1).

***H1:*** *Expectations confirmation has a positive association with satisfaction.*

***H2:*** *Satisfaction has a positive association with repurchase intentions.*

***H3****: Retargeting is negatively related to expectation confirmation.*

***H4****: Retargeting is negatively and indirectly related to satisfaction and repurchase intentions.*

***H5***: *The daily time spent online by users has a significant impact on their perception of retargeting ads, leading to differences in expectations confirmation, satisfaction, and repurchase intentions.*

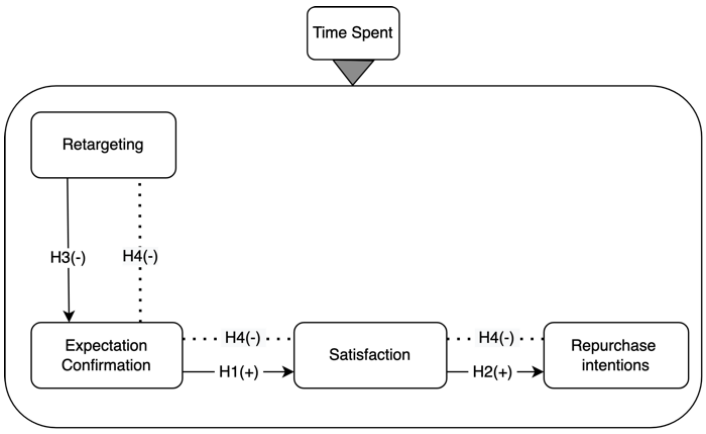


**Figure 2.1** *Theoretical model*

## 2.3 Methodology

The sample consisted of e-tourism consumers in Saudi Arabia. Each participant purchased an online tourism service and was exposed to more competitive post-purchase retargeting ads. Participants were administered a questionnaire with measurement items regarding the four constructs: expectation confirmation, satisfaction, repurchase intentions, and retargeting. The survey was drafted in English and then translated into Arabic using the back-translation procedure (Brislin, 1976). A form's hyperlink was distributed through social media, and individuals willing to take part in the survey provided their email addresses. Subsequently, an automated email containing the survey link was dispatched to those respondents. A total of 850 emails were sent; 396 valid responses were collected after removing incomplete questionnaires, yielding a 46.5% response rate. This rigorous approach ensured data collection efficiency and minimized potential biases, providing a comprehensive dataset for analysis.

The questionnaire responses were scored according to a 7-point Likert scale from 1 (“strongly disagree”) to 7 (“strongly agree”). Table 2.1 provides the definitions, list of items, and

references for each construct in this study. We used scales Bhattacherjee (2001) introduced to measure expectation confirmation, and satisfaction. Repurchase intentions scale was adapted from (Yi & La, 2004). To assess the impact of retargeting, we created a scale based on Dubrovski's (2001) consumer buying-decision model.

**Table 2.1** *Construct definitions and measurements.*

| Construct | Definition | Measurement | Source |
|---|---|---|---|
| Expectations (EC) | The degree to which perceptions match (confirmation) or differ from (disconfirmation) expectations | EC1. The online service of the e-tourism website meets my expectations.<br>EC2. The e-tourism website provides me with all the essential info to decide.<br>EC3. The sales service and payment process provided by the e-tourism website meet my expectations. | Bhattacherjee (2001), Oliver (1980) |
| Satisfaction (ST) | The degree of contentment and happiness that consumers derive from their purchase | ST1. I feel satisfied by the choice to utilize the service from the e-tourism website.<br>ST2. I made a wise decision by choosing the service from the e-tourism website.<br>ST3. I feel happy with my previous choice to utilize the service from the e-tourism website<br>ST4. I believe using the services provided by the e-tourism website was the right thing to do. | Bhattacherjee (2001), Oliver (1980) |
| Repurchase intentions. | An assessment of the probability that a | RI1. I'm likely to continue purchasing from the e-tourism website rather than discontinuing it. | Yi and La (2004), Chan et al. (2015) |

| Construct | Definition | Measurement | Source |
|---|---|---|---|
| (RI) | customer will conduct another transaction through the e-tourism website or app. | IRI2. I intend to continue using the service of the e-tourism website I used rather than use another e-tourism website. | |
| Retargeting (RE) | An evaluation of how competitive the post-purchase retargeting ads were in relation to the consumers' actual purchase. | RE1. The retargeted advert offer was better in terms of value than the offer I purchased.<br>RE2. The retargeted advert offer was cheaper than the offer I purchased.<br>RE3. The retargeted advert offer was better in terms of features than the offer I purchased<br>RE4. The reputation of the e-tourism website showing the retargeted advert was better than the e-tourism website I purchased from. | A scale that has been formulated and derived from the consumer buying-decision model (Dubrovski, 2001) |

Time spent online was classified into three categories: <1 hour, 1-5 hours, and >5 hours (12.87%, 65.65%, 21.46% of the participants, respectively). This categorization was used as various studies have found that most internet users are online for an average of 1 to 5 hours daily. (Fettahlıoglu et al., 2019; Moralista & Oducado, 2020; Mutalik et al., 2018), including in Saudi Arabia (Al-Zahrani, 2015).

In terms of statistical methods, this study employed Partial Least Squares Structural Equation Modeling (PLS-SEM) to estimate the model, a multivariate technique that enables analysis of a multiblock of manifest variables (MVs) forming latent variables (LVs) when a system of linear relationships is hypothesized to exist between the blocks (Vinzi et al., 2010). PLS-SEM

estimates the causal relationship between LVs that maximizes the explained variances between blocks (Hair et al., 2021). This method has several advantages: it provides robust estimates when working with small sample sizes, is free from the distribution hypothesis (Hair et al., 2019), and is especially indicated when the research approach is exploratory, and prediction-driven. PLS-SEM includes two model estimates: an outer model analyzing the connection between LVs and MVs, and an inner model that examines the causal relationship between LVs.

Using an iterative algorithm, LVs are estimated using MVs according to the nature of the relationship, following a reflective or a formative scheme (outer model). A reflective scheme is used when the LV causes the set of MVs, and MVs are highly correlated with each other, whereas a formative scheme is used if MVs cause the LV. Finally, the path coefficients (inner model) that reflect the strength of the causal relationships between LVs are estimated using multiple or simple linear regression. For technical details of the method and the validation criteria used for the outer and inner models, see Vinzi et al. (2010), Hair et al. (2019), and Do Valle and Assaker (2015).

To test the effect of time spent online on the model's coefficients, we used multigroup analysis (MGA), a standard way to analyze the effect of a categorical variable when using PLS-SEM (Hair et al., 2017). Different models are estimated, one for each level of a categorical variable, and the model coefficients are then compared using a statistical test to check for significant differences. In our case, we estimated three models reflecting time spent online (<1 hour, 1-5 hours, and >5 hours). Among the several available tests (see Hair et al., 2017 for a review), we used the multigroup analysis PLS-MGA proposed by Henseler et al. (2009). Smart PLS3 (Ringle et al., 2015) was used to estimate PLS-SEM and to perform PLS-MGA.

## 2.4 Results

Since all constructs were reflective, following Hair et al., (2019) and Do Valle and Assaker (2015), LVs were validated by calculating classical quality indices: Cronbach's alpha, composite reliability (CR), and average variance extracted (AVE). Loadings' strength as well as significance were also checked using 5000 bootstrapping resamples (Hair et al., 2019; Latan & Noonan, 2017) (see Table 2.2). Both Cronbach's alpha and composite reliability were exceeding the minimum threshold of 0.7, AVE exceeded the minimum threshold of 0.5 in all cases, and all loadings surpassed the suggested value of 0.7 (Hair et al., 2019) and were significant according to the bootstrap intervals. Also, discriminant validity was assessed by the heterotrait-monotrait (HTMT) ratio, as proposed by Franke and Sarstedt (2019) (see Table 2.3), resulting in values lower than the conservative threshold of 0.85 in all cases. Furthermore, common method bias (CMB) was checked using the full collinearity test approach (Kock, 2015). The results are presented in Table 2.4. Since the variance inflation factor (VIF) was below the 3.3 threshold for all latent variables, according to Kock (2015), CMB could be ruled out.

**Table 2.2** *Reliability and validity criteria.*

| Construct/indicators | Factor loadings | 2.50% | 97.50% | Alpha | CR | AVE |
|---|---|---|---|---|---|---|
| Expectations (EC) | | | | 0.845 | 0.906 | 0.763 |
| EC1 | 0.870 | 0.830 | 0.903 | | | |
| EC2 | 0.885 | 0.847 | 0.915 | | | |
| EC3 | 0.866 | 0.816 | 0.900 | | | |
| Satisfaction (ST) | | | | 0.722 | 0.877 | 0.781 |
| ST1 | 0.873 | 0.838 | 0.902 | | | |
| ST2 | 0.887 | 0.849 | 0.919 | | | |

| Construct/indicators | Factor loadings | 2.50% | 97.50% | Alpha | CR | AVE |
|---|---|---|---|---|---|---|
| ST3 | 0.889 | 0.847 | 0.921 | | | |
| ST4 | 0.848 | 0.790 | 0.893 | | | |
| Repurchase intentions (RI) | | | | 0.868 | 0.910 | 0.716 |
| RI1 | 0.904 | 0.875 | 0.927 | | | |
| RI2 | 0.863 | 0.817 | 0.899 | | | |
| Retargeting (RE) | | | | 0.897 | 0.929 | 0.765 |
| RE1 | 0.829 | 0.768 | 0.873 | | | |
| RE2 | 0.883 | 0.850 | 0.911 | | | |
| RE3 | 0.859 | 0.809 | 0.895 | | | |
| RE4 | 0.812 | 0.759 | 0.856 | | | |

**Table 2.3** *HTMT ratios.*

| | Value | 2.50% | 97.50% |
|---|---|---|---|
| Repurchase intentions -> expectations | 0.720 | 0.601 | 0.829 |
| Retargeting -> expectations | 0.375 | 0.223 | 0.513 |
| Retargeting -> repurchase intentions | 0.206 | 0.070 | 0.371 |
| Satisfaction -> expectations | 0.764 | 0.679 | 0.836 |
| Satisfaction -> repurchase intentions | 0.827 | 0.741 | 0.908 |
| Satisfaction -> retargeting | 0.273 | 0.143 | 0.407 |

**Table 2.4** *Evaluation of common method bias.*

| | Expectations | Repurchase intentions | Retargeting | Satisfaction |
|---|---|---|---|---|
| VIF | 1.004 | 1.010 | 1.045 | 1.054 |

Results of the inner model are detailed in Figure 2.2 and Table 5 (path coefficients, significance, and model goodness-of-fit) and in Table 6 (model predictive power). Expectations confirmation had a positive impact on satisfaction (b=.666), and satisfaction had a positive impact on repurchase intentions (b=.670). As expected, retargeting had a negative impact on expectation confirmation (b=-.324). All coefficients were significant according to the confidence intervals, supporting hypotheses H1–H3. We also found support for hypothesis H4, since retargeting also had significant indirect effects on both satisfaction (b=-.216) and repurchase intentions (b=-.145) (Table 2.5).

**Table 2.5** *Path coefficients, confidence intervals, and SRMR.*

| Effect | H | Path coefficient | β | 2.50% | 97.50% | Significant |
|---|---|---|---|---|---|---|
| | H1 | Expectations on satisfaction | 0.666 | 0.589 | 0.737 | yes |
| Direct | H2 | Satisfaction on repurchase intentions | 0.670 | 0.593 | 0.740 | yes |
| | H3 | Retargeting on expectations | -0.324 | -0.447 | -0.201 | yes |
| Indirect | H4 | Retargeting on satisfaction | -0.216 | -0.296 | -0.139 | yes |
| | H4 | Retargeting on repurchase intentions | -0.145 | -0.201 | -0.092 | yes |
| | | SMSR = 0.054 | | | | |

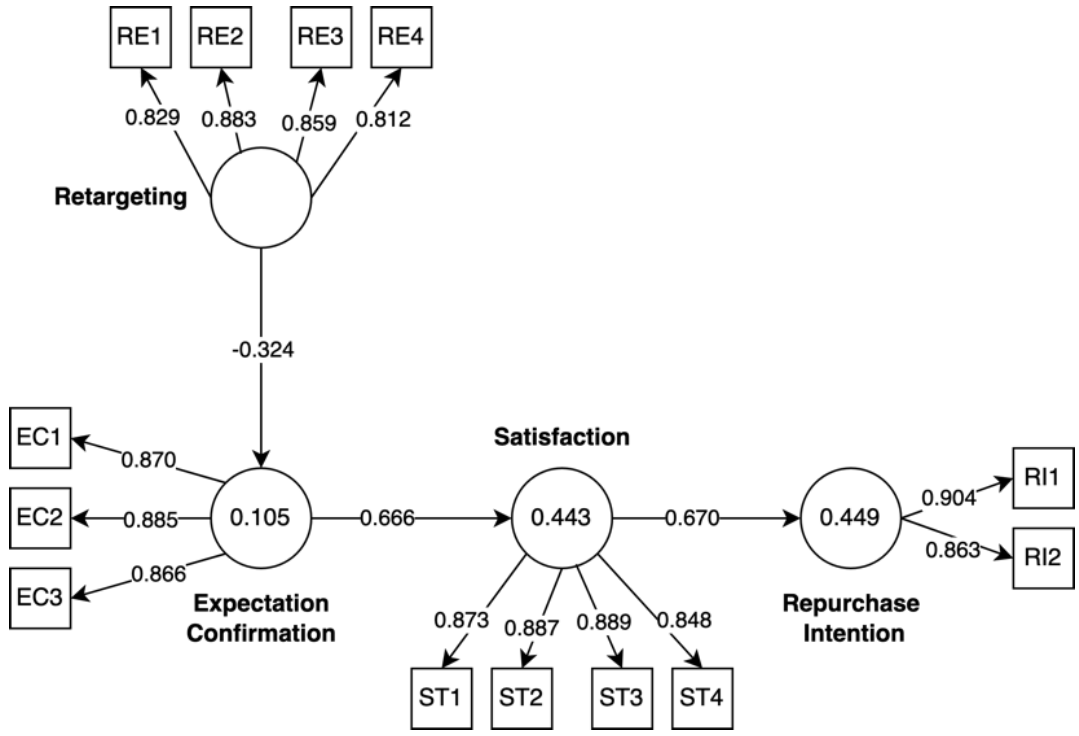


**Figure 2.2:** *Path diagram results.*

The standardized root mean squared residual (SRMR) at .054 fell below the 0.08 threshold limit (Hair et al., 2017), indicating that the model's goodness was adequate. Concerning the model's predictive power (Table 2.6), for repurchase intentions and satisfaction, R2 was equal to .449 and .443, respectively, and Q2 was equal to .343 and .336, respectively. Those values, according to Hair et al. (2019), point to moderate predictive power, as did the PLSpredict procedure (Shmueli et al., 2019) where, according to the root mean squared error (RMSE), the PLS model produced a lower prediction error than the naïve LM benchmark for at least 50% of the constructs.

**Table 2.6** *$R^2$, $Q^2$, and PLS predict procedure.*

| Construct | PLS RMSE | LM RMSE | Differences |
|---|---|---|---|
| EC1 | 1.015 | 1.021 | -0.006 |
| EC2 | 1.151 | 1.155 | -0.004 |
| EC3 | 1.189 | 1.185 | 0.004 |
| RI1 | 1.285 | 1.294 | -0.009 |
| RI2 | 1.318 | 1.329 | -0.011 |
| ST1 | 1.141 | 1.142 | -0.001 |
| ST2 | 1.127 | 1.137 | -0.01 |
| ST3 | 1.186 | 1.192 | -0.006 |
| ST4 | 1.227 | 1.222 | 0.005 |

Repurchase intentions $R^2$ = .449; $Q^2$ = .343. Satisfaction $R^2$ = .443; $Q^2$ = .336.

*Note:* EC, expectations confirmation; RI, repurchase intentions; ST, satisfaction.

Before running the MGA for the online time groups (<1 hour, 1-5 hours, and >5 hours), the measurement invariance of composite models (MICOM) procedure (Hair et al., 2017) was applied to check measurement invariance. This process comprised three consistent stages: (1) establishing configural invariance, (2) ensuring compositional invariance, and (3) confirming the equality of composite mean and variance values. According to Hair et al. (2017), steps 1 and 2 are prerequisites for running the MGA.

Configural invariance was secured by explicitly defining each latent variable (LV) – namely retargeting, expectations confirmation, satisfaction, and repurchase intentions – consistently across all three online time groups in the PLS-SEM. Compositional invariance was then established by comparing the correlations of latent scores between groups to a reference distribution of correlations generated through permutation of the groups. Acceptance of the null

hypothesis of a theoretical correlation of 1, indicating composite invariance of the construct, occurs if the observed correlation is within the upper 95% of the distribution. Subsequently, to assure complete measurement invariance, tests were conducted to compare mean values and variances of latent scores across groups against the reference distribution obtained by permutation of the groups. The results of the MICOM procedure are displayed in Table 2.7, indicating that step 2 was verified in all but one instance, while step 3 was only partially supported. Consequently, while configural and compositional invariance were assumed, full invariance was rejected.

**Table 2.7** *Step 2, and Step 3 of the MICOM procedure.*

| | | **Compositional invariance** | | **Equality of composite values** | | | |
|---|---|---|---|---|---|---|---|
| | | | | **Mean values** | | **Variance values** | |
| **Construct** | **Groups** | **Score Corr** | **5.00%** | **Mean Diff** | **2.5-97.5%** | **Variance Diff** | **2.5-97.5%** |
| Expectations | | 1 * | 0.995 | 0.325 | [-0.322-0.309]* | -0.518 | [-0.628-0.529]* |
| Repurchase intentions | <5 hr Vs 1-5 hr | 0.999* | 0.989 | 0.234 | [-0.306-0298]* | -0.112 | [-0.540-0.403]* |
| Retargeting | | 0.864* | 0.635 | -0.070 | [-0.278-0.298]* | -0.015 | [-0.589-0.437]* |
| Satisfaction | | 0.999* | 0.998 | 0.161 | [-0.313-0.300]* | -0.311 | [-0.541-0.422]* |
| Expectations | | 0.999* | 0.991 | -0.289 | [-0.347-0.339] | -0.260 | [-0.637-0.537]* |
| Repurchase intentions | <5 hr vs | 1* | 0.993 | -0.239 | [-0.356-0.341] | 0.234 | [-0.494-0.480]* |
| Retargeting | >5 hr | 0.855 | 0.984 | 0.708 | [-0.353-0.340] | 0.071 | [-0.721-0.625]* |
| Satisfaction | | 0.997* | 0.995 | -0.313 | [-0.344-0.341] | 0.079 | [-0.679-0.655]* |

| Construct | Groups | Compositional invariance | | Equality of composite values | | | |
|---|---|---|---|---|---|---|---|
| | | | | Mean values | | Variance values | |
| | | Score Corr | 5.00% | Mean Diff | 2.5-97.5% | Variance Diff | 2.5-97.5% |
| Expectations | 1-5 hr vs >5 hr | 0.999* | 0.997 | -0.565 | [-0.242-0.250] | 0.258 | [-0.434-0.504]* |
| Repurchase intentions | | 0.999* | 0.993 | -0.458 | [-0.243-0.252]* | 0.335 | [-0.364-0.387]* |
| Retargeting | | 0.997* | 0.987 | 0.746 | [-0.239-0.245] | 0.100 | [-0.377-0.452]* |
| Satisfaction | | 1* | 0.999 | -0.436 | [-0.245-0.243] | 0.396 | [-0.379-0.395]* |

Note: *Confirmed

MGA results for the three online time groups are reported in Table 2.8. The impact of retargeting ads on expectations confirmation was significantly greater for the >5 hours group than for the 1-5 hours group (p = .002). Also, the direct impact of retargeting ads on expectations confirmation for the <1 hour group was not significant, unlike the other groups. Another indirect effect was that the retargeting effect on satisfaction and repurchase intentions increased and became significant for the >5 hours group (b=-0.318 and b=-0.222, respectively) and the 1-5 hours group (b = -0.154 and b = -0.099, respectively), but not for the <1 hour group (b= -0.184 and b=-0.135, respectively). As such, hypothesis H5 was supported.

**Table 2.8** *Multigroup comparison results.*

| | Paths | <5 hr G1 | 1-5 hr G2 | >5 hr G3 | PLS-MGA test p-value G1 vs G2 | G1 vs G3 | G2 vs G3 |
|---|---|---|---|---|---|---|---|
| Direct effect | Retargeting on expectations | -0.247NS | -0.231 | -0.565 | 0.658 | 0.105 | *0.002** |
| | Expectations on satisfaction | 0.742 | 0.666 | 0.564 | 0.196 | 0.075 | 0.165 |
| | Satisfaction on repurchase intentions | 0.732 | 0.642 | 0.697 | 0.157 | 0.352 | 0.755 |
| Indirect effect | Retargeting -> satisfaction | -0.184NS | -0.154 | -0.318 | | | |
| | Retargeting -> repurchase | -0.135NS | -0.0985 | -0.222 | | | |

*Note:* Significance ***p < .001, non-significant. Italics indicate significance at p < .05

## 2.5 Discussion

Digital marketing strategies aim to influence buying behavior in a particular direction (Omar & Atteya, 2020). The literature indicates that digital marketing, including dynamic retargeting (Lambrecht & Tucker, 2013; Sahni et al., 2019; Villas-Boas & Yao, 2021), can affect pre-purchase (from need awareness to purchase decision) but also post-purchase steps (satisfaction and repurchase), given that the goal is to have the consumer purchase and repurchase a particular product or service. Our study, framed in ECT, investigated the retargeting effect in the post-purchase period for e-tourism, as tourists are especially sensitive to this effect.

Concerning the extent to which post-purchase retargeting ads influence consumer expectations confirmation, satisfaction, and repurchase intentions, our findings indicate that more competitive retargeting ads negatively affect consumer expectations confirmation and indirectly affect their satisfaction and repurchase intentions, providing support to our hypotheses H3 and H4. In support of H1 and H2, as anticipated, expectations confirmation has a positive impact on satisfaction, and the latter has a positive impact on repurchase intentions, providing evidence in favor of ECT predictions (Oliver, 1981), and supported by several studies (e.g., Bhattacherjee, 2001; Zhong et al., 2015). Whilst prior research found evidence that pre-purchase retargeting plays an important role in either increasing (Lambrecht & Tucker, 2013; Van Doorn & Hoekstra, 2013) or decreasing (Li et al., 2021) purchase intentions, our study suggests that post-purchase retargeting may have a negative effect. In particular, we analyzed the scenario in which the post-purchase retargeting ads are considered by users more competitive than their initial purchase. In this case, retargeting negatively affects consumer expectation confirmation, satisfaction, and repurchase intentions.

Regarding the extent to which the relationship between post-purchase retargeting ads, consumer expectations confirmation, and satisfaction varies according to the time spent online, our findings indicate that the time spent online by consumers counts. We found that the negative effect of retargeting increases the more time the consumer spends online. Interestingly, the indirect effect of retargeting on satisfaction and repurchase intentions is not significant for consumers who spend <1 hour online. Those results support hypothesis H5 and are corroborated by other research on the importance of internet surfing time (Zhang et al., 2017). Consumers who spend more time online tend to encounter a larger volume of retargeting ads. This increased exposure can strongly influence their decision-making process and online behavior. Additionally, these users are more

likely to seek additional information about sellers and products. This behavior further strengthens the effectiveness of retargeting ads, as discovered in research by Jiang et al. (2021).

Our findings suggest a crucial message for firms concerning their differentiation strategy: while differentiation is important, comparative advantage is even more critical. Thus, retargeting focusing on differentiation based mainly on competitive pricing may erode expectations confirmation, satisfaction, and repurchase intentions and induce the consumer to switch to another firm, i.e., the consumer's loyalty is undermined, and a process of mutual cannibalization is launched between firms. However, retargeting focused on differentiation based on product or service benefits may lead consumers to self-assign themselves to the right competitive offer. In this case, consumer satisfaction is less likely to be affected by retargeting ads, which, even if they offer better prices, may not provide the benefits sought by a particular segment of consumers. Future studies could examine the roles of digital skills and customer degree of involvement on the influence of retargeting ads. Time spent online could serve as a proxy for digital skills and might explain variable retargeting effects. At the same time, differences between consumer groups could be explored through consumer involvement in terms of time spent seeking products and services online. Finally, future research will also analyze the effect of retargeting on consumers when offers are differentiated by price compared to when offers are distinguished by the value delivered to specific consumer segments.

## 2.6 Conclusion

The purpose of our study was to understand the effect of competitive retargeting ads on consumer post-purchase behavior, especially in the context of expectations confirmation, satisfaction, and repurchase intentions, framed within the ECT. Our findings, derived using PLS-SEM, indicated a

distinct negative effect of retargeting on these parameters. Additionally, this adverse impact grew more pronounced as consumers spent greater amounts of time online.

From these results, a clear conclusion can be drawn. businesses should pivot their retargeting strategies. Rather than predominantly competing on price, the emphasis should be on highlighting the overarching value delivered to consumers. This allows consumers to more organically align with brands based on their preferences and perceived value, fostering a more authentic and loyal relationship in the digital marketplace.

# 3. Chapter 3: Decoding Retargeting Effect: The Influence of Trust and Digital Skills on Consumers' Post-purchase Behavior.

## 3.1 Introduction

The tourism industry has undergone a profound transformation in embracing digital advertising strategies to engage and entice potential tourists. Retargeting ads, a personalized form of digital marketing, have emerged as an effective tool to identify consumers of interest, as they recapture the attention of previous website visitors—a crucial aspect of tourism marketing (Labanauskaitė et al., 2020). Retargeting ads, which leverage tracking technologies, enhance brand awareness and influence future purchases.

In the e-tourism sector, retargeting strategies are pivotal in attracting attention and shaping behavior, particularly in purchasing experience and repurchase intention evaluation (Alghanayem et al., 2023). Given that individuals typically plan frequent vacations (McNeely, 2021), their evaluation of the purchase experience and of subsequent offers can significantly impact repurchase

decisions. For instance, a retargeting ad making a higher-value offer may affect perceptions of a customer's past purchase experience and discourage them from repurchasing from the same service provider, while a retargeting ad making a lower-value offer may increase customer satisfaction with the initial purchase and influence the repurchase likelihood. Retargeting strategies thus wield considerable influence over satisfaction and repurchase intention, particularly within the e-tourism sector, where availability, seasonal fluctuations, and airline prices continually impact package offerings (Goecke, 2020).

In today's e-tourism landscape, a comprehensive understanding of the factors shaping tourist behavior in digital contexts is of both academic and practical significance (Sun et al., 2016; Xu et al., 2021). The transition from traditional travel agencies to sophisticated online booking platforms has fundamentally altered the tourist's journey, from initial interest to purchase. Consequently, to optimize e-tourism services, firms need to understand digital behaviors (Jovicic, 2016). The innovations that have transformed tourism marketing make it imperative for stakeholders to grasp the subtleties of tourist interactions with online platforms (Ye et al., 2021).

The effectiveness of retargeting ads is influenced by technological, contextual, and consumer-related factors. Technological factors encompass digital tools and ad targeting methodologies (Kannan, 2017); contextual factors, such as cultural and market dynamics, underscore the importance of the broader setting of ads (Stipp, 2018), and finally, consumer-related factors, covering audience perceptions and behaviors, are central to understanding how ads are received (De Mooij, 2019).

Nevertheless, a crucial gap exists regarding how specific consumer-related dimensions, notably trust and digital skills, moderate the influence of retargeting on satisfaction and repurchase intention. Trust and digital skills are central to internet use (Lamberti et al., 2023; van Dijk, 2020)

and play a pivotal role in online decision-making processes and in impacting attitudes to ads (Zhu et al., 2019). Furthermore, trust significantly influences engagement with digital platforms, shaping the willingness to interact with and respond to online ads (McKnight & Chervany, 2001; Pavlou, 2003). Digital skills shape how consumers navigate and interact with digital content, including ads (van Deursen & van Dijk, 2010), and in affecting how consumers process and utilize online information, impact on their engagement with and perceptions of targeted marketing efforts (Hargittai, 2010; van Deursen & van Dijk, 2010). Nonetheless, despite the important role of trust and digital skills in online decision-making processes, no study has explored how they impact retargeting and, in turn, satisfaction and repurchase intention, i.e., there is little understanding of the precise extent to which trust and digital skills moderate the effect of retargeting ads on consumers.

The impact of trust and digital skills on retargeting may depend on the cultural context, which is why we compared retargeting effects in Spain and Saudi Arabia. According to the World Bank (2021), the two countries are similar in terms of education levels, digital development, technology adoption, and internet access, and since both countries have robust e-commerce and cybersecurity regulations (Hassib & Shires, 2022; Hoofnagle et al., 2019), they represent a natural experiment for this study. Nonetheless, since they differ in terms of Hofstede's cultural dimensions (Hofstede Insights, 2023), they are appropriate choices for exploring how varying cultural contexts affect the moderating roles of trust and digital skills in shaping responses to digital advertising. Comparison of these two countries also enables an evaluation of the cultural specificity of digital marketing strategies, thereby contributing to a better understanding of global marketing tactics (de Mooij, 2019; Hofstede, 2010).

To investigate the effects of retargeting ads on post-purchase behavior, we base our model on the expectation confirmation theory (ECT), which provides a robust framework for understanding the interplay between pre-purchase expectations, perceived post-purchase performance, and subsequent satisfaction leading to repurchase intention (Bhattacherjee, 2001; Oliver, 1980). By aligning ads with consumer behavior and preferences, retargeting ads can significantly influence expectations and satisfaction (Alghanayem et al., 2023). To examine how retargeting ads shape expectations, satisfaction, and repurchase intention, we incorporate trust and digital skills in our model, as critical moderators that may amplify or diminish the impact of retargeting ads.

To empirically test our theoretical model, we applied partial least squares-structural equation modeling (PLS-SEM) (Tenenhaus et al., 2005; Wold, 1985) to a dataset of Spanish and Saudi Arabian e-tourism consumers. After estimating the model's overall predictive power, we assessed how trust and digital skills moderated the relationships between expectation confirmation, satisfaction, and repurchase intention (Becker et al., 2018). Our chosen methodology and theoretical framework aim to provide comprehensive insights into how retargeting ads influence behavior, particularly in the critical post-purchase phase. We accordingly address the following research questions:

1) To what extent do trust in technology and digital skills moderate the relationship between exposure to retargeting ads and consumer post-purchase behavior?

2) To what extent do the moderating influences of trust in technology and digital skills on retargeting effects depend on the cultural context?

The paper is organized as follows: Section 2 describes the theoretical background for retargeting and examines the moderating roles of trust and digital skills, Section 3 describes the methodology, Section 4 reports the results, and Sections 5 and 6 contain the discussion and conclusion, respectively.

## 3.2 Literature Review

### 3.2.1 Retargeting in the Tourism sector

The tourism industry's reliance on new technologies underscores the critical importance of embracing and mastering these innovations to maintain a competitive edge. Research highlights the integral role that technology adoption plays in the success of tourism businesses, linking it to enhanced growth and profitability (Sinarta & Buhalis , 2018). Specifically, retargeting has been identified as a crucial strategy for success in the tourism sector (Saura et al., 2020). Retargeting is an advertising technique that targets individuals who have previously visited a website, aiming to deliver personalized advertisements that resonate with their demonstrated interests (Villas-Boas & Yao, 2021). Retargeting ads deliver personalized advertisements tailored to visitors who have expressed an interest in specific products or services. For a comprehensive overview of studies exploring the impact of retargeting in the tourism sector (See Table 3.1).

**Table 3.1** *Impact of Retargeting in Tourism Studies*

| Year | Author | Study Focus | Key Findings |
|---|---|---|---|
| 2013 | Lambrecht & Tucker | Effectiveness of dynamic retargeting in online advertising | Field experiment results indicate initial lower effectiveness compared to generic brand ads. Improved performance observed when consumer browsing suggests evolved preferences. |
| 2014 | Kantola | Factors enhancing advertising performance in retargeting campaigns | Manipulates three variables: discount offer, previous visits referral, and detailed landing page. - Metrics: customer engagement, website time, and conversion rates. - Mentioning a discount boosts performance, with industry-specific effects. - Referring to previous visits and detailed landing pages increase website time but not performance. - Excessive ads intrusiveness harms performance. |

| | | | |
|---|---|---|---|
| 2015 | Chun et al. | Role of retargeting relevance in travel destination recommendation | Evaluating the role of retargeting in destination recommendation within e-tourism. - Introducing a travel destination recommender system. - Demonstrating promising results in enhancing ad relevance. |
| 2016 | Ringvald & Rodriguez Garcia | Engaging unresponsive customers digitally | Retargeting is very effective in converting consumers who have had former touch points with the firm. |
| 2018 | Eigenbrod & Janson | Investigating digital strategies in retargeting | Retargeting negatively influences consumers' privacy concerns.<br>Retargeting positively influences consumers' booking behavior. |
| 2022 | Candra et al. | Effectiveness of retargeting marketing in online travel agents | Retargeting marketing positively influences consumer buying behavior and purchase intention.<br><br>Retargeting marketing can be even more effective when combined with extra benefits such as promotions or lower prices. |
| 2022 | Damianos et al. | Exploring how retargeting ads combined with other digital marketing tools optimize customer engagement and brand visibility in the tourism and hospitality industry. | The study finds that effective use of web analytics and big data, particularly through social media, enhances digital brand presence and customer engagement. It emphasizes the importance of retargeting ads, to increase visibility. |
| 2023 | Lopez-Sintas et al | Impact of post-purchase retargeting ads on consumer behavior | Retargeting ads affects consumer purchasing experience and post purchase behavior by altering their expectation confirmation and indirectly impacts satisfaction and future purchasing plans. - Also, it identifies differences in the effects of retargeting ads across various age groups. |
| 2023 | Alghanayem et al. | Analysis of negative post-purchase retargeting ads, and the role of advertisement exposure. | Competitive postpurchase retargeting ads have a direct negative effect on expectation confirmation. Also, findings indicate variations in this impact based on consumers' online duration, intensifying negative effects with longer advertisement exposure. |

This promotional strategy has gained significant popularity due to its ease of technology implementation, ability to reach a broad target audience in real-time, and effectiveness in identifying consumer interests and aligning them with available products or services (Lambrecht & Tucker, 2013). The effectiveness of retargeting ads has garnered significant attention from researchers, particularly regarding the significance of personalized advertising and the influence of factors such as ad frequency and timing on viewer response (Li et al., 2021; Sahni et al., 2019).

The effectiveness of retargeting has been empirically investigated, revealing a spectrum of consumer responses. For an overview of the documented positive and negative effects identified in recent studies, see Table 3.2.

**Table 3.2** *Positive and Negative Effects of Retargeting*

| Positive Effects of Retargeting | Negative Effects of Retargeting | References |
|---|---|---|
| Enhanced purchase intentions with personalized ads. | - | Aguirre et al., 2015 |
| Increased purchase intentions with high ad fit. | - | Bleier & Eisenbeiss, 2015 |
| Higher click-through rates | - | Tucker, 2014 |
| - | Over-personalization can lead to privacy concerns and decreased ad effectiveness. | Chen & Stallaert, 2014 |
| - | High personalization is perceived as intrusive, which can negatively impact purchase intentions. | Van Doorn & Hoekstra, 2013 |
| Retargeting can boost purchase intentions by aligning ads with consumers' online behavior, influencing their self-perception and actions. | - | Summers et al., 2016 |
| Retargeting can be effective when aligned with consumers' narrowed product preferences. | Misaligned retargeting ads can underperform, particularly if consumer preferences have evolved. | Lambrecht & Tucker, 2013 |
| - | Premature ads reduce the likelihood of completing a purchase. | Li et al, 2021 |

The tourists' decision-making process is inherently prolonged due to its exploratory nature, emotional engagement, and significant considerations for travel expenses (Crompton, 1996). This extended timeline, marked by stages from initial inspiration to final booking, offers numerous touchpoints for marketers to re-engage potential e-tourism consumers (Lambrecht & Tucker, 2013). Retargeting becomes pivotal in this context, reminding tourists of dynamic pricing models, time-sensitive deals, and upcoming offers (Kim et al., 2020). According to Lin and Fu (2017), ads

before the trip should highlight the potential adventure and excitement of the destination, tapping into travelers' anticipation. Following the trip, retargeting efforts should reminisce on the joy and freedom experienced, reinforce positive memories, and encourage future bookings.

Despite the progress made in understanding the impact of dynamic retargeting, most research has primarily focused on the technology itself and its features (Berke et al., 2014; Johnson et al., 2017; Li et al., 2021; Sahni et al., 2019). This fact has created a gap in our understanding of the factors related to consumers and their online experience. Therefore, further investigation is necessary to understand how dynamic retargeting influences consumer behavior and online experience.

### 3.2.2 Expectation Confirmation Theory (ECT)

The Expectation Confirmation Theory provides a framework for explaining the determinants of post-purchase satisfaction (Oliver, 1980). The model argues that satisfaction emerges from the congruence between consumers' expectations and their subsequent product experiences, resulting in a state of expectation confirmation. When consumers' experiences go with or exceed initial expectations, consumers experience satisfaction, fostering a higher likelihood of repurchase intention (Bhattacherjee, 2001). The connection between expectation confirmation and satisfaction, culminating in repurchase intention, is well-documented in consumer behavior literature (Alghanayem et al., 2023; López-Sintas et al., 2023) and e-tourism (Zhong et al., 2015). Upon establishing our base model (See figure 3.1), we introduce the concept of negative retargeting, defined as retargeting efforts that, rather than reinforcing positive post-purchase experiences, may lead to adverse outcomes such as reduced satisfaction or diminished repurchase intention. We propose that negative retargeting directly and negatively affects expectation confirmation, and indirectly affects satisfaction, and repurchase intentions. For instance,

retargeting ads offering more value relative to the initial purchase could recalibrate the consumer's reference point, impacting their satisfaction and influencing their decision to repurchase (Pinquart et al., 2021). This theory is supported by behavioral economics research, which suggests that consumers' reference points are adaptable and sensitive to new information (Kahneman, 1992; Tversky & Kahneman, 1981).

Our study examines the case of competitive retargeting ads that overshadow the initial purchase that can inadvertently reframe consumer expectations, potentially reducing satisfaction and repurchase intention. These post-purchase effects have been indicated by several researchers (Baek & Morimoto, 2012; Chen & Lin, 2019). Such scenarios highlight the important role of negative retargeting in consumer behavior and the complicated balance marketers must navigate (Li et al., 2021; Mulla & Narhe, 2023).

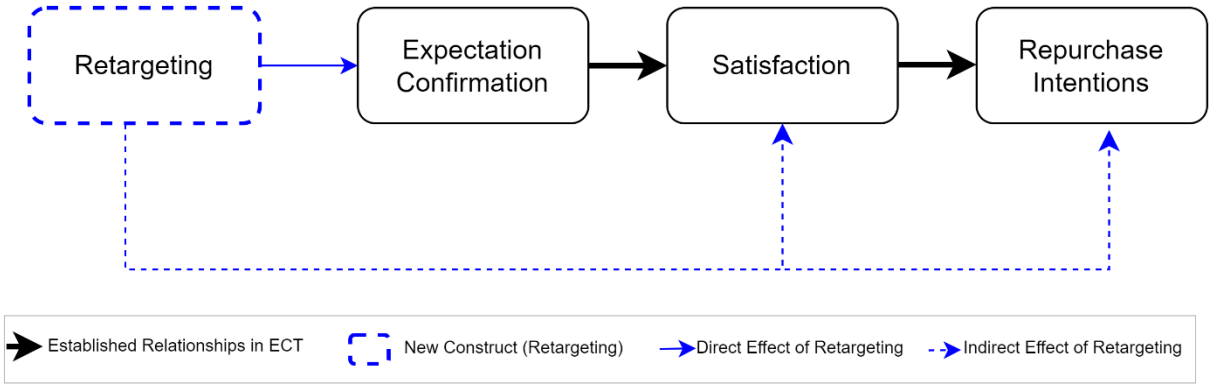


**Figure 3.1:** *Base model*

In summary, our base model presented in Figure 3.1 builds on the established ECT theory, positing that expectation confirmation leads to satisfaction and influences repurchase intention. We expand this model by incorporating retargeting—a recent theorized construct anticipated to directly influence expectation confirmation and, indirectly, satisfaction and repurchase intentions

(Alghanayem et al., 2023; López-Sintas et al., 2023). The introduction of new constructs such as retargeting aligns with prevalent research methods in the literature examining online consumer behavior (Hsu et al., 2015; Ploj Virtic et al., 2021). Studies consistently explore the effects of various online marketing strategies, including electronic word of mouth (Filieri et al., 2021), social media content (Aladwani, 2017) to understand their impact on consumer actions and perceptions.

### 3.2.3 Customer Trust and Digital Skills

Research in retargeting ads has focused on technological, consumer-related, and contextual factors. Technological advancements are crucial, including enhancing targeting accuracy through data analysis and exploring dynamic ads with tracking technologies (Semerádová & Weinlich, 2022). Consumer perspectives, mainly ad skepticism and privacy concerns, have been analyzed by Zarouali et al. (2017), who found that retargeting ads generally lead to higher purchase intentions. However, this effect is moderated by factors such as privacy concerns which can increase skepticism and reduce purchase intentions. Contextual influences such as cultural impacts and timing of Ad delivery are also significant, as studied by Yu et al. (2017) and Li et al. (2021), respectively, highlighting the complexity of factors affecting retargeting ads effectiveness. These consumer-related factors, often overlooked in favor of more technical and contextual ones, play a critical role in moderating the effectiveness of retargeting ads. This study focuses on these elements to better understand their moderating role in the ads-consumer behavior relationship. This paper focuses on two main factors: digital skills and trust in technology.

### 3.2.4 Trust in Technology

Trust is a fundamental concept in e-commerce and online marketing, as it plays a crucial role in shaping consumers' perceptions and behaviors. Pavlou (2003) defines it as the personal likelihood that consumers perceive an online transaction to unfold according to their expectations. Trust

represents consumers' confidence in an online retailer's reliability, integrity, and competence. The significance of trust becomes even more pronounced in online shopping due to the proliferation of digital fraudulent activities (Zhu et al., 2019). Unlike traditional face-to-face transactions, e-marketing transactions lack the direct physical presence of buyers and sellers, making it imperative to establish trust in virtual interactions (Annaraud & Berezina, 2020). Building and maintaining trust between e-tourist agencies and consumers is essential for the success and sustainability of online businesses (Zhu et al., 2022).

Trust acts as a gatekeeper in the decision-making process. If consumers do not trust the e-tourist agency, they will not include it in their consideration set. Consumers must trust the e-tourist agency to be included in their consideration set. For instance, Chen and Barnes (2007) found that trust influences consumers' intention to engage in online shopping, serving trust as a gatekeeper and limiting the consideration set. Similarly, Pavlou and Fygenson (2006) observed that trust significantly impacts consumers' willingness to disclose personal information when interacting with online businesses. Also, Gupta et al. (2018) found that trust significantly predicts smartphone app intention to use. Recently, Lamberti et al. (2023) have reported evidence that trust, jointly with digital skills, is a crucial aspect of Internet use. Cheng et al. (2017) research underscores the critical role of customer trust in enhancing customer satisfaction within the tourism sector, highlighting the necessity to cultivate trustful relationships to bolster customer satisfaction.

Concerning online advertising, trust has been found to moderate its effectiveness (Hershberger, 2012). Furthermore, Bleier and Eisenbeiss (2015) conducted a study investigating the moderating role of trust in certain retailers on users' perceptions of retargeting ads; click-through rates were used to measure retargeting effectiveness. Their findings suggest that users with higher levels of trust tend to perceive online ads as more valuable than those with lower trust. This

means that trust plays a crucial role in shaping tourists' attitudes towards online advertisements, which has implications for marketers aiming to target and engage consumers effectively. When consumers have higher levels of trust, they are more likely to perceive positively the ad's content as relevant and helpful, reinforcing their initial expectations about the product or service. This suggests that trust moderates the relationship between exposure to retargeting ads and consumers' expectation confirmation. Accordingly, this study hypothesizes that:

**H1**: *Trust moderates the relationship between exposure to post-purchase retargeting ads and consumers' expectation confirmation, such that the effect is stronger for consumers with higher levels of trust.*

### 3.2.5 Digital Skills

Digital skills play a crucial role in the modern digital era, encompassing the abilities, knowledge, and competencies required to effectively manage the interaction with digital technology and communication for information retrieval, evaluation, content creation, and communication (Van Deursen et al., 2014). Digital skills were essential in explaining consumer online behavior in various markets: the acceptance of mobile learning technology (Mac Callum & Jeffrey, 2014) and the intention to utilize e-government services (Nawafleh, 2018), for instance. In this study, we will refer to the definition and the construct proposed by Van Deursen et al. (2014), which is defined as the total set of abilities, knowledge, and competencies required to use digital technology and communication tools effectively for finding, evaluating, creating, and sharing information.

The literature demonstrates that digital skills are the most crucial driver of internet use. Further, previous research has acknowledged the significance of digital skills in shaping consumers' online behavior and their responses to digital advertising (Van Dijk, 2020). For instance, Van Deursen and Van Dijk (2010) found that individuals with higher levels of digital

skills were more likely to engage in online shopping activities and actively search for product information. This suggests that consumers with excellent digital skills tend to gather information and evaluate online advertisements proactively. Also, individuals' higher digital skills positively correlate with the probability of buying via social media advertisements (Alkis & Kose, 2022).

On the other hand, poor digital skills may reduce digital platforms' perceived usefulness (Liao et al., 2010). Digital skills affect consumers' ability to process online information. They have been found to moderate the relation between the provided information and consumers' perception of the effectiveness of tourism websites in the tourism context, such that e-tourism users with lower digital skills find websites with less information more effective. In contrast, e-tourism users with higher digital skills can cope with more information (Castañeda et al., 2019). Moreover, higher digital skills are related to a higher capability for information management (Bawden & Robinson, 2009). Also, users with high levels of digital skills are more critical at analyzing the sources of information online, and they are more willing to share their data when there are benefits, such as loyalty programs (Sanak-Kosmowska & Wiktor, 2020).

Considering post-purchase retargeting ads, the role of digital skills becomes particularly relevant. Consumers with higher digital skills will likely respond more nuancedly to these ads. They can critically evaluate the content of the retargeting ad and assess its relevance. As a result, the effect of retargeting on expectation confirmation will be stronger among consumers with higher digital skills. To summarize, consumers' digital skills are expected to play a moderating role, influencing their evaluation of the ad content and its impact on their expectation confirmation. Accordingly, this study hypothesized that:

**H2**: *Digital skills moderate the relationship between exposure to post-purchase retargeting ads and consumers' expectation confirmation, such that the effect is stronger for consumers*

*with higher levels of digital skills.*

Considering the effect of trust and digital skills, the complete model described in Figure 3.2.

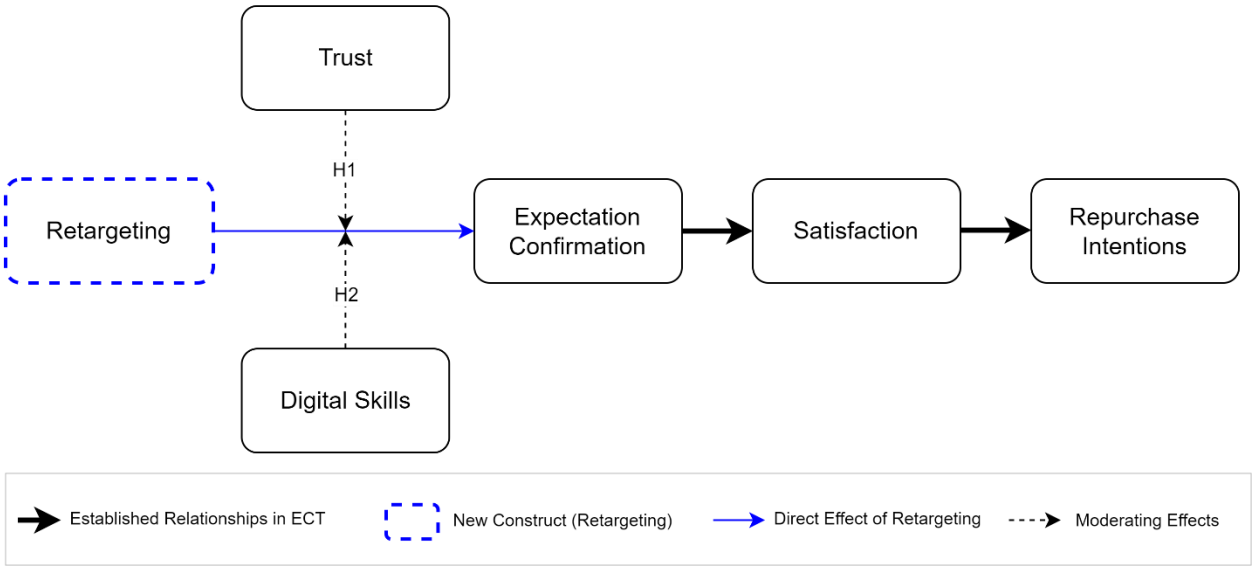


**Figure 3.2:** *Theoretical model*

### 3.2.6 Cultural/ technological background: The case of Spain and Saudi Arabia

Various social factors can influence the online behavior of consumers. These aspects include education, culture, and the socioeconomic context in which consumers live. Consumers in Spain and Saudi Arabia may behave differently even if they have equivalent digital skills. According to the World Bank (2021), Spain and Saudi Arabia share similarities in education levels, education, digital development, technology adoption, and internet access. Additionally, both countries have robust regulations for e-commerce, and cybersecurity (Hassib & Shires, 2022; Hoofnagle et al., 2019). These similarities create a natural experiment to study the moderating roles of trust and digital skills.

Nevertheless, according to Hofstede's cultural values dimensions (Hofstede, 2010), notable disparities arise when examining consumers' cultural value dimensions of Spain and Saudi Arabia.

An analysis of these dimensions highlights differences between the two countries (Hofstede Insights, 2023). Figure 3.3 displays the national scores for six cultural value dimensions. Note that there are differences in power distance, uncertainty avoidance, long-term orientation, and indulgence. Contrasting, few differences are reported in individualism and masculinity cultural values. Consequently, we expect to find differences in the retargeting effects moderated by consumers' trust and digital skills. We hypothesize:

**H3:** *There is a difference in the moderating effects of trust and digital skills on the relationship between retargeting ads and consumer expectation confirmation between Spanish and Saudi e-tourism users.*

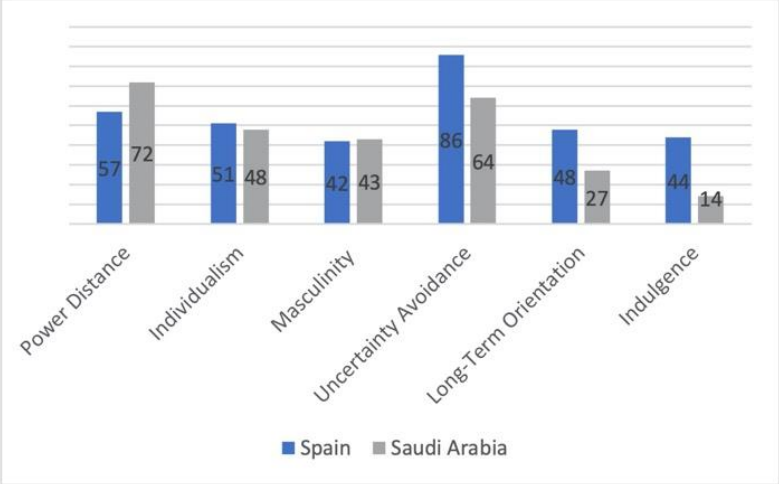


**Figure 3.3***: Cultural Dimension Scores of Spain and Saudi Arabia*

## 3.3 Methodology

### 3.3.1 Sample and measurements.

According to the existing literature on Partial Least Squares (PLS), determining the sample size depends on the complexity of the model. It is typically calculated based on the desired power of analysis (Ngah et al., 2021). In line with the suggestions made by Gefen et al. (2011), a minimum sample size of 85 was deemed sufficient when aiming for a power of 80%, assuming a medium effect size and a significance level of $p = 0.05$. These guidelines were derived from the table developed by Green (1991). Our study included 189 e-tourism users from Spain and 216 from Saudi Arabia, ensuring we met the sample size requirement. The study employed convenience quota sampling, stratified by age group and gender. Quotas were set based on the latest demographic statistics of both countries (GASTAT, 2023; INE, 2023).

A link to a form concerning the data collection process was shared on social media. Respondents who were interested in participating entered their email addresses. An automated email was then sent to them with the link to the survey. A total of 580 emails were sent out, and 405 usable samples were collected after excluding incomplete responses, resulting in a response rate of 69.83% (189 from Spain, 216 from Saudi Arabia). E-tourism consumers from Spain and Saudi Arabia were conveniently sampled to participate in this study from February to April of 2022. Gender is almost evenly distributed with men accounting for 56% in Saudi Arabia and 53% in Spain. Most of the participants held a bachelor's degree (30.1%) and fell within the age range of 25 to 44 years (45.9%) (See Figure 3.4). To ensure the relevance of our data, we pre-screened survey participants with two questions confirming their recent online tourism purchase and subsequent exposure to competitive retargeting ads, including only those who answered affirmatively to both in the study.

We administered a questionnaire to the participants to assess their expectations, satisfaction, intentions to repurchase, perception of retargeting, trust, digital skills, and cultural values. We assessed these constructs using the expectation confirmation, and satisfaction introduced by Bhattacherjee (2001). Repurchase intentions scale was adapted from (Yi & La, 2004). To measure retargeting, we adapted a scale by Alghanayem et al. (2023) which was developed using the consumer buying decision model proposed by Dubrovski (2001). The scale for trust was adapted from Pavlou (2003), while the measurement of digital skills was adopted from Van Deursen et al. (2014), and Groselj et al. (2020). We prepared the questionnaire in English and then translated it into Spanish and Arabic using the back-translation method (Brislin, 1976). The questionnaire responses were rated on a 10-point Likert scale ranging from 1 ("strongly disagree") to 10 ("strongly agree"). Table 3.3 provide the definitions, list of items, and references for each construct in this study.

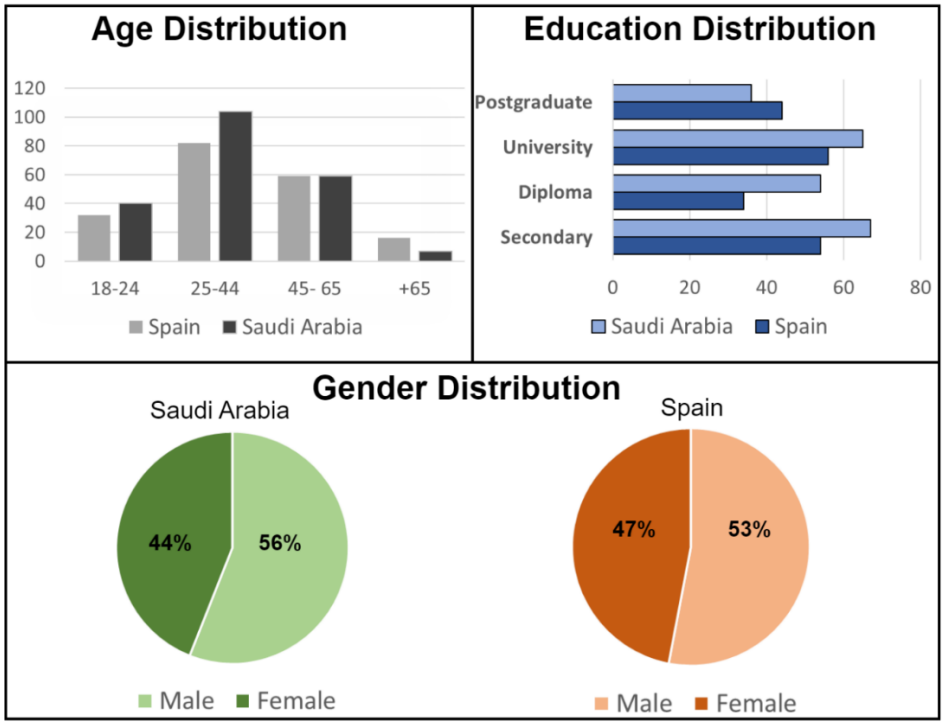


**Figure 3.4:** *Demographic Profile of Respondents*

**Table 3.3** *Construct Definitions and Measurements*

| Construct | Definition | Measurement | Source |
|---|---|---|---|
| Trust (T) | The subjective probability with which consumers believe that an online transaction with a Web retailer will occur in a manner consistent with their expectations. | T1. E-tourism web agencies are trustworthy.<br>T2. E-tourism web agencies are known to keep promises and commitments.<br>T3. I trust e-tourism web agencies to keep my best interests in mind. | Pavlou, P. (2003). |
| Digital Skills (DS) | The sum of individual abilities, knowledge, and competencies that are necessary to effectively use digital technology and communication tools to find, evaluate, create, and communicate information | DS1. I know how to open downloaded files.<br>DS2. I know how to download/save a photo I found online.<br>DS3. I know how to use shortcut keys (e.g. CTRL-C for copy, CTRL-S for save).<br>DS4. I know how to open a new tab in my browser.<br>DS5. I know how to bookmark a website.<br>DS6. I know how I get to the websites I visit.<br>DS7. I find the design of most websites easy to understand.<br>DS8. I know which information I should and shouldn't share online.<br>DS9. I know when I should and shouldn't share information online.<br>DS10. I know how to create something new from existing online images, music or videos.<br>DS11. I know how to make basic changes to the content that others have produced. | Van Deursen et al. (2014), Groselj et al. (2020) |

### 3.3.2 Statistical methods

Partial Least Squares Structural Equation Modeling (PLS-SEM) is used for model estimation (Sarstedt et al., 2016a; Vinzi et al., 2010). PLS-SEM aims to maximize the explained variances between latent variables to estimate the model expected relationships (Hair et al., 2022). It includes an outer model, defining manifest and latent variable relationships, and an inner model, detailing construct relations and path coefficients (Sarstedt et al., 2016a). Parameters are estimated using an iterative algorithm (Hair et al., 2019; Vinzi et al., 2010; Wold, 1985), and will be validated

following guidelines by Hair et al. (2022), references to the works of Vinzi et al. (2010), Hair et al. (2019), and Do Valle and Assaker (2015) are made, offering detailed technical insights.

As described by Becker et al. (2018), moderation analysis is used to assess how a moderator variable affects the relationship between an independent and a dependent variable. Moderation analysis is crucial for understanding situations where the relationship between two constructs depends on a third variable, the moderator. In structural models, moderators can vary in their measurement, either through a single item or multiple items, with multi-item scales being more effective for explaining variance, as noted by Diamantopoulos et al. (2012) and Sarstedt et al. (2016b). The key aspect of moderation analysis is evaluating the interaction term, which reflects the extent to which the effect of theoretical constructs varies with other variables. The basic model and interactions are analyzed using SmartPLS4 (Ringle et al., 2022).

## 3.4 Results

### 3.4.1 The base model: A global PLS-SEM analysis.

Before conducting moderation analysis, we estimated the global model. According to Hair et al. (2022) when PLS is used to estimate the model, two aspects must be considered 1) validation of the measurement mode (the inner model) and 2) analysis of the relationship between constructs (the outer model). Measurement model validation was performed by calculating classical measures following Hair et al. (2022). Results reported in Appendix A indicate that the measurement model was adequate.

Concerning the structural model as expected, expectation confirmation had a positive effect on satisfaction (β=.684, IC95[0.583,0.778]), and satisfaction had a positive effect on repurchase intention (β=.608, IC95[0.544,0.671]). Retargeting harmed expectation confirmation (β=-.387,

IC95[-0.497, -0.273]). Also, retargeting had significant indirect negative effects on both satisfaction (β=-.264, IC95[-0.357, -0.179]) and repurchase intention (β=-.161, IC95[-0.357, -0.103]). All coefficients were significant according to the confidence intervals, indicating support for the four hypotheses of our base model. Additionally, results reveal that SRMR is equal to .0052 indicating a good fit for the model, and R2 values are 0.467, and 0.370 for satisfaction, and repurchase intention, respectively. Those values, according to Hair et al. (2019), point to moderate predictive power, as did the PLSpredict procedure (Shmueli et al., 2019) where, according to the root mean squared error (RMSE), the PLS model produced a lower prediction error than the naïve LM benchmark for at least 50% of the constructs.

### 3.4.2 Assessing the moderating effect of trust and digital skills.

After evaluating the global model, we continued our analysis by exploring the role played by trust and digital skills on the retargeting effect. We first estimate and validate the two scales (Hair et al., 2022). Thus, since both moderators' constructs were reflective, we employed Cronbach's alpha, composite reliability (CR), and average variance extracted (AVE). Additionally, the strength and significance of the loadings were assessed using 5000 bootstrapping resamples, as recommended by Hair et al. (2019) (refer to Table 3.4 for results). The results indicated that both Cronbach's alpha and CR exceeded the minimum threshold of 0.7, while AVE surpassed the minimum threshold of 0.5 for both constructs. Furthermore, all loadings exceeded the recommended value of 0.7 and were significant based on the bootstrap intervals.

**Table 3.4** *Moderators' reliability and validity criteria*

| Constructs/items | Factor loadings | 2.50% | 97.50% | Alpha | CR | AVE |
|---|---|---|---|---|---|---|
| Trust (T) | | | | 0.921 | 0.948 | 0.858 |
| T1 | 0.901 | 0.296 | 0.985 | | | |
| T2 | 0.943 | 0.303 | 0.984 | | | |
| T3 | 0.935 | 0.365 | 0.980 | | | |
| Digital Skills (DS) | | | | 0.921 | 0.932 | 0.555 |
| DS1 | 0.745 | 0.591 | 0.793 | | | |
| DS2 | 0.760 | 0.674 | 0.812 | | | |
| DS3 | 0.752 | 0.666 | 0.801 | | | |
| DS4 | 0.749 | 0.662 | 0.800 | | | |
| DS5 | 0.744 | 0.645 | 0.798 | | | |
| DS6 | 0.737 | 0.662 | 0.790 | | | |
| DS7 | 0.785 | 0.721 | 0.831 | | | |
| DS8 | 0.716 | 0.578 | 0.769 | | | |
| DS9 | 0.741 | 0.626 | 0.792 | | | |
| DS10 | 0.749 | 0.652 | 0.801 | | | |
| DS11 | 0.713 | 0.585 | 0.769 | | | |

To conduct moderation analysis in our study, again, we followed the guidelines outlined by Hair et al. (2022), which suggests that the primary focus is the significance of the interaction term estimated for both trust and digital skills. If the interaction terms' effect on the dependent construct is significant, we conclude the moderators have a significant moderating effect on the relationship between studied constructs. The results revealed that the interaction terms of trust and digital skills were both negative and significant. Thus, both moderators strengthened the effect of retargeting on expectation confirmation, as shown in Table 3.5.

**Table 3.5** *Moderation analysis*

| Moderator | β | 2.50% | 97.50% | Significant |
|---|---|---|---|---|
| Trust*Retargeting->Expectation Confirmation | -0.415 | -0.488 | -0.207 | yes |
| Digital Skills*Retargeting->Expectation Confirmation | -0.363 | -0.433 | -0.238 | yes |

Simple slope analysis examines how the predictor-outcome relationship varies across levels of a moderator. The presented findings help to understand better the nature of the moderating effects of trust and digital skills (See Figure 3.5). The color format indicates different levels of trust and digital skills, with green lights representing high levels, red lines representing low levels, and blue lines indicating mean levels. In both cases, the negative impact of retargeting on expectation confirmation seems to be stronger consumers with higher levels of trust and digital skills. This finding suggests that the relationship between retargeting and expectation confirmation is not static; it varies depending on the levels of trust and digital skills that consumers possess. The simple slope analysis indicates that the influence of retargeting on expectation confirmation is significantly stronger for consumers with higher levels of trust and digital skills.

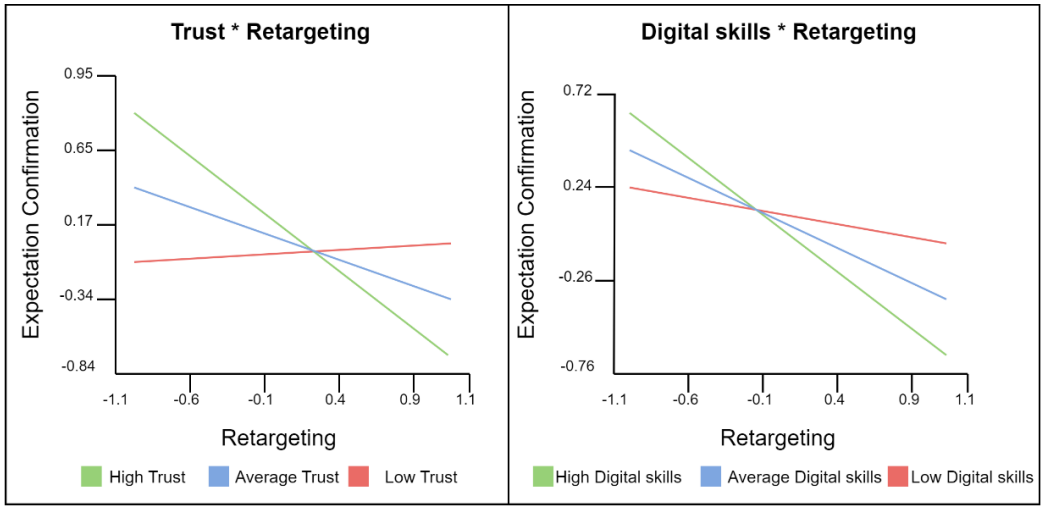


**Figure 3.5:** *Trust and digital skills simple slopes*

Cohen's f 2 effect size indicates how much moderation contributes to the explanation of the endogenous construct: the larger the effect size, the higher the effect of the moderator variable on the relationship. General guidelines for assessing f 2 suggest values of 0.02, 0.15, and 0.35, representing small, medium, and large effect sizes, respectively (Cohen, 1988). Results (See Table 3.6) show that trust (f 2 =0.317) has a large effect size, while digital skills (f 2 =0.151) have a medium effect size. Also, findings show that expectation confirmation R2 increased to 0.355 and 0.266 when trust and digital skills were included as moderators, respectively.

**Table 3.6** *Assessment of $R^2$ and $f^2$*

| Moderator | $R^2$ moderator excluded | $R^2$ moderator included | $f^2$ |
|---|---|---|---|
| Trust | 0.150 | 0.355 | 0.317 |
| Digital Skills | 0.150 | 0.266 | 0.151 |

According to our results, we can conclude that both hypotheses H1 and H2 were supported.

### 3.4.3 To what extent do the moderating effects of trust and digital skills on retargeting influence vary between Spanish and Saudi Arabian e-tourism users?

We performed separate moderating analyses for Spanish and Saudi Arabian consumers to examine the impact of cultural background. First, we estimated and validated the PLS-SEM model for both groups (Cheah et al., 2023). After establishing full measurement invariance, a multigroup analysis between Spanish and Saudi Arabian consumers was conducted to check model coefficient differences, revealing similar effects in both cultures. Finally, we repeated the validation of the two scales of trust in technology and digital skills for both collectives.

To compare the two countries, we calculated the moderating coefficients with the associated confidence intervals (IC) globally and for Spain's and Saudi Arabia's groups. Then we compared the confidence intervals to verify possible significant differences between the groups.

Thus, if the intervals of confidence overlap, there is no difference between Spain and Saudi Arabia; otherwise, if the ICs do not overlap, we can conclude that a significant impact of cultural background exists and find evidence to support H3. Results are reported in figure 3.6. We first report the global IC in blue, and in red the IC of Spain, and Saudi Arabia ICs are presented in green. Our results show that the ICs overlap for both trust and digital skills. Thus, H3 was not supported.

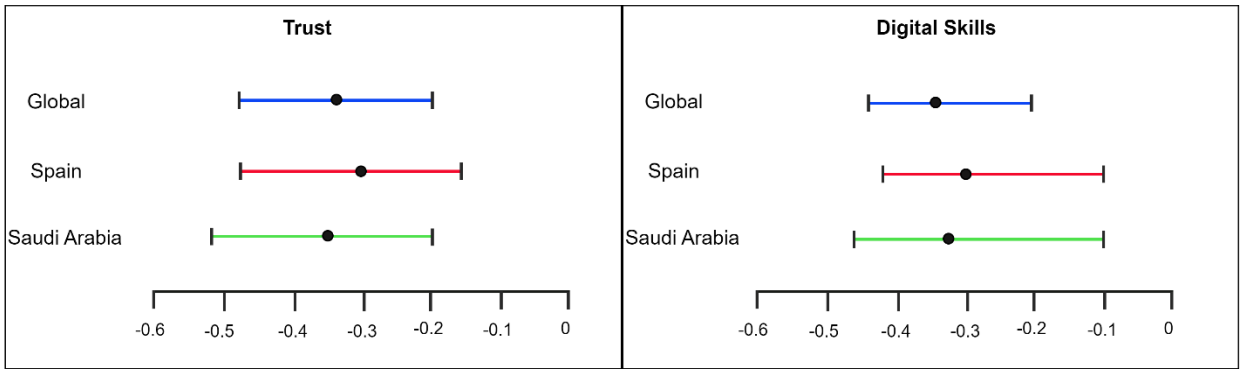


**Figure 3.6:** *Comparison of trust and digital skills moderating effects*

## 3.5 Discussion

The objective of this study was to explore the moderating influence of consumers' trust and digital skills on the impact of retargeting on consumers' post-purchase behavior. This study advances our knowledge of the moderating effects of trust and digital skills on consumers' post-purchase behavior considering the cultural background of consumers.

The examination of retargeting's impact on consumers' post-purchase behavior has been a topic of digital marketing, with limited empirical investigation to date (Johnson et al., 2017; Lambrecht & Tucker, 2013; Li et al., 2021; Sahni et al., 2019; Villas-Boas & Yao, 2021). The base model proposes that retargeting directly influences consumers' expectation confirmation, and indirectly influences satisfaction, and repurchase intention (Bhattacherjee, 2001). We extended the

model to incorporate the moderating effects of trust and digital skills considering consumers' cultural values. We hypothesized that consumers' trust and digital skills would magnify the impact of negative retargeting.

The study revealed that higher levels of consumer trust intensify the negative impact of retargeting, aligning with prior research emphasizing trust's role in shaping online behavior and receptivity to advertisements (Bleier & Eisenbeiss, 2015; Chen & Barnes, 2007; Pavlou & Fygenson, 2006; Zhu et al., 2022). Trust emerged as a double-edged sword. On the one hand, it positively influences consumers' willingness to engage with online platforms and perceive retargeting ads as relevant, credible, and tailored to their interests. On the other hand, when facing a competitive ad consumer’s negative emotions are more intense, magnifying the negative effect of retargeting on consumer satisfaction. Conversely, consumers with lower trust levels feel a less intense negative emotion, leading to a small moderating effect on retargeting influences on consumers' post-purchase behavior. Less trust in digital technologies implies less internet use and a lower exposure to such ads. This low internet use reduces the impact of retargeting efforts on post-purchase behavior.

In addition to trust, the study explored the moderating effects of digital skills on the retargeting effect. It revealed that higher levels of digital skills among consumers amplify the negative impact of retargeting. This finding aligns with research that highlights the importance of digital skills in shaping responses to digital advertising (Van Dijk, 2020) and in coping with high information related to advertising (Bawden & Robinson, 2009; Castañeda et al., 2019). Digital skills, encompassing various competencies needed to navigate digital technologies effectively, enhanced consumers' ability to engage in e-commerce more frequently, leading to a higher exposure to competitive ads. Consumers with higher digital skills seem to have increased

proficiency in evaluating the relevance and value of retargeting ads, leading to heightened engagement. Conversely, consumers with low digital skills exhibited limited responsiveness to negative retargeting, hindered by difficulties in navigating digital interfaces and interpreting online advertisements. This finding aligns with research that highlights lower levels of digital skills reduce the perceived usefulness of digital content (Liao et al., 2010)

In examining the moderating role of trust and digital skills on the effectiveness of retargeting, our research suggests that these factors amplify the negative effect of negative retargeting. However, while digital skills and trust negatively shape consumer expectation confirmation, our findings do not indicate any significant differences between the two countries studied, Spain and Saudi Arabia. This suggests that the impact of digital skills and trust on consumer expectations is similar across these culturally diverse regions, suggesting the need for further studies to evaluate the extent to which its effect is universal. Some studies point to this universality of the effect. Sun (2011) suggests that trust in technology holds a similar significance across cultures, with cultural disparities diminishing as consumers gain digital experience. Furthermore, findings indicate that digital literacy does not consistently affect technology usage, pointing to a shared baseline of digital engagement (Pagani et al., 2016). Cultural differences in trust dynamics (Lowry et al., 2010) and the identification of universal digital skills (Cahen & Borini, 2020) further support the notion that trust and digital skills are globally applicable. These insights imply that consumers' interactions with technology, specifically in the context of e-tourism, are shaped by a core set of factors that transcend cultural peculiarities.

### 3.5.1 Theoretical contributions

This study is one of the first to include trust and digital skills to explain the impact of retargeting on consumer behavior, contributing to advancing our knowledge of the effect of retargeting. Our

research proves that higher levels of trust and digital skills strengthen the negative impact of retargeting ads on the consumer shopping experience. Second, the cross-cultural analysis between Spain and Saudi Arabia introduces a new dimension to understanding the universal versus culturally specific effects of digital marketing strategies. By showing that the impacts of trust and digital skills on consumer response to retargeting ads are consistent across different cultural contexts, our research suggests a potentially universal applicability of these findings, encouraging further exploration into global digital marketing practices.

### 3.5.2 Managerial implications

This research offers critical insights for stakeholders in the tourism industry, especially those marketers leveraging online retargeting strategies. Fostering loyalty in the tourism sector necessitates a paradigm shift from a purely price-centric strategy to one driven by value. Instead of merely reducing prices to attract consumers, businesses should emphasize promoting unique travel experiences. Companies can ensure a more dedicated and loyal consumer base by curating packages that resonate deeply with specific consumer segments. This approach resonates with the notion of not merely trying to capture a larger market share but focusing on securing a niche that can be reliably catered to. However, businesses must tread carefully with their retargeting efforts. Continual bombardment with price-competitive ads, especially post-purchase, can lead to consumer dissatisfaction (Alghanayem et al., 2023). Thus, tourism businesses must deploy data analytics effectively, understanding when to target potential travelers and when to hold back to prevent overwhelming those who have already made purchases.

Additionally, the findings offer pivotal insights for practitioners in the e-tourism domain. To capitalize on these findings, it is incumbent upon managers to ascertain the trust levels and digital skills of their customer base. Analytical tools such as customer relationship management

(CRM) software and online behavior tracking can help to guess users' trust and digital engagement. Surveys and feedback mechanisms can also yield insights into consumer perceptions and skills.

With this knowledge, e-tourism firms can segment their market based on trust and digital skill metrics, enabling them to customize retargeting campaigns that resonate with each segment. For consumers with a high degree of trust in digital platforms, retargeting efforts may be more sophisticated, utilizing data-driven personalization to enhance the relevancy of offerings. Conversely, for those exhibiting lower trust, firms should prioritize clarity and security in their digital communications to nurture confidence in the online environment.

### 3.5.3 Limitations and future research

The main limitation of this study lies in the fact that it utilizes a non-representative sample, which means that the results cannot be generalized to the broader population. This limitation is particularly relevant given the convenience sample used, which makes it challenging to obtain a representative group of buyers who have been exposed to retargeting ads after purchasing a tourist package. The findings are also specific to e-tourism users in Spain and Saudi Arabia, necessitating further research to compare these findings with those from other countries and markets.

A critical area for future research would be the implementation of an experimental research design that manipulates the nature of retargeting (positive, natural, and negative) to robustly test its effects. This study should be considered a pilot study aimed at exploring the impact of retargeting and the moderating roles of trust and digital skills on consumer behavior. Such an experimental approach could provide more definitive insights into the causal relationships and enhance the applicability of retargeting strategies in marketing.

Moreover, it is important to remind future studies of the need to address potential confounding effects due to demographic variables. The current study's demographics are skewed

toward specific age groups, genders, and educational backgrounds, which could influence the findings. Future research should strive to balance these variables to enhance the representativeness and reliability of the results.

Additionally, exploring how consumers' emotional states may influence their responses to retargeting ads could yield insightful findings. Future research could examine the impact of various emotional states, such as happiness or sadness, on consumer expectations and perceptions of retargeting ads. Investigating whether these ads influence brand image and loyalty would also be beneficial for comprehensively understanding the efficacy of retargeting strategies in digital marketing.

## 3.6 Conclusion

The objective of this study was to investigate the moderating influence of trust and digital skills on the correlation between retargeting ads and consumer behavior. Grounded in expectation confirmation theory, we established connections between retargeting and expectation confirmation, satisfaction, repurchase intention, trust, and digital skills. Our findings, obtained through PLS-SEM analysis, revealed a distinct negative impact of retargeting on expectation confirmation, satisfaction, and repurchase intentions. Furthermore, we observed that this adverse effect is moderated by levels of trust and digital skills. Notably, these moderating effects remained consistent among Spanish and Saudi users—two countries with distinct cultural values—suggesting the generalizability of these findings. The findings suggest that tourism businesses should transition from price-focused strategies to value-driven approaches, emphasizing unique travel experiences tailored to specific consumer segments. Careful management of retargeting efforts, using data analytics to gauge consumer receptiveness, is crucial to prevent post-purchase dissatisfaction. Managers should assess trust levels and digital skills among their customer base

and customize retargeting campaigns, accordingly, employing personalized approaches for digitally savvy consumers and clear, secure communications for those with lower trust.

# 4. Chapter 4: Investigating How Cultural Values Shape Tourists' Behavior Towards Retargeting Ads

## 4.1 Introduction

In the digital age, the precision and personalization of marketing strategies have become pivotal in capturing consumer attention and fostering engagement. Among these strategies, retargeting has emerged as a sophisticated tool, enabling marketers to present tailored advertisements to users based on their previous online activities (Lambrecht & Tucker, 2013). Retargeting has become popular for its technological simplicity, wide-reaching capabilities, and effectiveness in matching consumer interests with relevant products or services in real time (Jiang et al., 2021). Despite its widespread adoption and potential benefits such as boosting engagement, conversion rates, and purchase intentions (Aguirre et al., 2015; Bleier & Eisenbeiss, 2015; Tucker, 2014), retargeting ads have not been without criticism, raising concerns over privacy, relevance, and the overall negative effect on consumer purchasing experience.

Negative retargeting refers to retargeting efforts that adversely impact the consumers' purchasing experience; negative effects can occur at any stage of the consumer journey, including before and after a purchase. For instance, pre-purchase negative retargeting involves poor timing (Li et al., 2021), and bombarding consumers with repetitive personalized ads, leading to intrusiveness or raising privacy concerns (Chen & Stallaert, 2014; Van Doorn & Hoekstra, 2013). On the other hand, post-purchase negative retargeting entails continuing to display ads for a product or service already purchased, which can be perceived as unnecessary and affect consumer purchasing experience if they differ in value (Alghanayem et al., 2023). This post-purchase negative effect is more significant in the e-tourism industry given that people usually organize

vacations only once or twice annually (McNeely, 2021), and the dynamics of availability, seasonal changes, and airfare prices have a constant effect on the value of travel packages (Goecke, 2020).

Our study delves into post-purchase negative retargeting through the theoretical lens of Expectation Confirmation Theory (ECT), a framework that elucidates how the alignment—or misalignment—between consumers' expectations and their actual experiences influences satisfaction and future purchase intentions (Bhattacherjee, 2001; Oliver, 1980). By leveraging ECT, our research aims to bridge the gap between retargeting practices and consumer post-purchase behavior. Despite this, we recognize that retargeting's negative effects may vary widely among individuals, influenced by diverse factors including cultural background. Yet, current retargeting research predominantly focuses on retargeting technical practices to differentiate retargeting effects, often overlooking consumer-centric and cultural variables. This oversight presents a significant gap, suggesting the importance of integrating consumer behavior and cultural insights into the retargeting discourse.

Culture significantly shapes consumer behavior (Schiffman & Kanuk, 2007) and is a key factor in determining an individual's wants and actions (Kotler, 2003). Recognizing culture's significant impact on preferences, values, and marketing communications highlights the vital role of cultural considerations in both tourism and advertising (De Mooij, 2019; Swarbrooke & Horner, 2007). When it comes to exploring this effect, traditional research methodologies often fall short, as they rely on national categorizations through frameworks such as Hofstede's cultural dimensions, aiming to simplify cultural differences into national characteristics (Hofstede, 2010). This explains the contradictory views and findings in literature (Appadurai, 1996; House et al., 2004; Ritzer, 2004; Schwartz, 1992). However, this approach may overlook the diverse spectrum of global cultures, failing to account for the subtle differences within countries and the dynamic

influences of globalization, migration, and digital communication (Cleveland & Laroche, 2007). This simplified approach might be somewhat effective for traditional marketing campaigns; however, in the e-tourism sector, where retargeting demands a deeper understanding of consumer behavior, it falls short.

Acknowledging the slow progress in developing methodological approaches in cultural research, scholars in marketing and tourism have called for a thorough investigation into cultural heterogeneity (Dimanche & Andrades, 2018; Malhotra et al., 1996). Researchers argue that a focus on individual consumer characteristics rather than broad national traits could lead to greater marketing success, as individual values offer more accurate predictors of behavior (Kongsompong, 2009; Lenartowicz & Roth, 2001; Patterson et al., 2006; Reid, 2011). This perspective aligns with Prasongsukarn's (2009) assertion that understanding cultural orientation at an individual level provides deeper insights into consumer attitudes and behaviors. Critically, the simplicity of using national categories becomes even more pronounced in the domain of retargeting ads. Such ads, by their nature, demand a strong understanding of individual preferences, which is overlooked when assuming homogeneity within a national culture (Chandra et al., 2022).

In response to this gap, our research aims to dissect the complex web of cultural influences on consumer behavior within the e-tourism sector, particularly in the context of retargeting ads. By measuring cultural values at an individual level and grouping tourists based on similarities in these values, we offer a sophisticated approach to explore cultural heterogeneity. The selection of samples from Saudi Arabia and Spain in this study is strategic, aiming to capture a wide and diverse cultural spectrum due to their differences (Hofstede insights, 2024).

The methodology for this study commences by measuring Hofstede's six cultural dimensions at the individual level, followed by the validation of these scales using (CFA)

Confirmatory Factor Analysis (Brown, 2015). Once the cultural dimensions are established, respondents are subjected to clustering analysis based on their similar variations in these Hofstede cultural dimensions (James et al., 2013). Subsequently, Multi-Group Analysis (MGA) is employed to compare the identified clusters regarding the post-purchase effects of retargeting on various aspects of tourists' behavior (Hair et al., 2019), including expectation confirmation, satisfaction, and repurchase intentions. This paper aims to bridge the existing knowledge gap by examining to what extent the systematic heterogeneity in consumers' cultural backgrounds can be reduced to a few cultural patterns (Q1) and exploring how the identified patterns differ in terms of behavior and reacting to retargeting ads (Q2). Through these analyses, we seek to provide both academic and practical implications that can guide businesses in the e-tourism sector and marketers in their quest for global engagement and conversions.

## 4.2 Literature Review

### 4.2.1 Retargeting

Retargeting is a marketing strategy aimed at individuals who have previously interacted with a website, offering them personalized ads based on their demonstrated interests in certain products or services (Lambrecht & Tucker, 2013). The adoption of retargeting ads has surged, favored for their technological simplicity, capability to engage a wide audience instantly, and efficiency in matching consumer preferences with relevant offerings. The impact of retargeting campaigns on consumer behavior has become a focal point for research, especially the effects of customized advertising and how the timing and frequency of ads affect user engagement (Li et al., 2021; Sahni et al., 2019). Studies have extensively documented varying reactions to retargeting, highlighting both its advantages and drawbacks (Aguirre et al., 2015; Bleier & Eisenbeiss, 2015; Chen & Stallaert, 2014; Summers et al., 2016; Tucker, 2014; Van Doorn & Hoekstra, 2013).

The decision-making journey for tourists is notably extended, characterized by its investigative nature, emotional involvement, and the substantial financial considerations associated with travel (Crompton, 1996). This journey, stretching from the initial inspiration to the eventual booking, presents numerous opportunities for e-tourism marketers to reconnect with potential consumers. Retargeting plays a crucial role here, serving reminders about fluctuating prices, limited time offers, and forthcoming promotions (Jiang et al., 2021). As Lin and Fu (2017) suggest, pre-trip advertisements should capture the adventure and allure of the destination to fuel travelers' excitement. Post-trip retargeting should then evoke the pleasure and liberation felt during the trip, reinforcing positive recollections and prompting future travel plans.

Research on dynamic retargeting has predominantly focused on its technological features and the pre-purchase phase, identifying two significant gaps in the literature. Firstly, there is a notable deficiency in studies addressing both consumer-centric and contextual factors, which are critical for understanding the full spectrum of retargeting's influence. Secondly, there is a distinct lack of focus on the post-purchase phase, leaving an incomplete picture of retargeting's impact on consumer behavior and online experiences after the transaction. Addressing these two separate but critical gaps is essential for a more holistic understanding of retargeting's effectiveness throughout the purchasing cycle.

### 4.2.2 Negative Retargeting & ECT

The advent of digital marketing strategies, particularly retargeting, has led to a deeper understanding of consumer engagement and behavior. Retargeting, aimed at re-engaging individuals by leveraging their previous online interactions, has been celebrated for its potential to personalize the advertising experience. Despite its merits, the strategy is not devoid of challenges, notably when it veers into the territory of negative retargeting (Alghanayem et al., 2023). This

section delves into the adverse aspects of retargeting ads, highlighting the delicate balance between personalization and consumer perception.

The concept of over-personalization presents a paradox in digital marketing efforts. Chen and Stallaert (2014) underscore the potential for privacy concerns to emerge, leading to decreased ad effectiveness as consumers become wary of the depth of their online footprints being utilized. Similarly, Van Doorn and Hoekstra (2013) identify the fine line between personalized engagement and perceived intrusiveness, noting that excessive personalization can adversely impact purchase intentions. This delicate balance points to a critical challenge: ensuring that retargeting ads do not cross the threshold from being engaging to being intrusive.

Furthermore, the alignment of retargeting ads with consumer preferences is paramount. Misaligned ads, which fail to reflect the current interests or needs of the consumer, can significantly underperform, diminishing the effectiveness of retargeting campaigns (Lambrecht & Tucker, 2013). This misalignment not only highlights the dynamic nature of consumer preferences but also the necessity for retargeting ads to be adaptable and responsive.

Timing, too, plays a crucial role in the efficacy of retargeting efforts. Li et al. (2021) discuss the implications of premature advertisements, which may reach consumers at a stage when they are not ready to proceed with a purchase. The premature delivery of ads can thus reduce the likelihood of conversion, emphasizing the need for strategic timing in retargeting campaigns. Another aspect concerns the effects of poor timing in the post-purchase phase, since marketers cannot always observe if the targeted potential consumers have already made the purchase (Villas-Boas & Yao, 2021), users can still receive retargeting ads for products or services they already purchased, which was found to negatively and significantly affecting tourists purchasing

experience and future purchase plans when these ads are more competitive than their original purchase (Alghanayem, et al., 2023)

These challenges—spanning over-personalization, perceived intrusiveness, misalignment with consumer preferences, and suboptimal timing—predominantly pertain to the pre-purchase phase. Along with the negative effect of experiencing retargeting ads in the post-purchase phase illustrate the complexities involved in executing effective retargeting ads that navigate the fine line between personalization and consumer discomfort.

To extend the examination of retargeting ads beyond the initial engagement, this study incorporates the Expectation Confirmation Theory (ECT) as a framework for exploring post-purchase implications. ECT posits that consumer satisfaction is derived from the alignment between pre-purchase expectations and the actual product experience (Oliver, 1977, 1980). Satisfaction, which increases the probability of future purchases, occurs when these experiences meet or exceed prior expectations (Bhattacherjee, 2001). The established linkage between expectation confirmation, satisfaction, and repurchase intentions is well-documented across consumer behavior and e-tourism studies (Zhong et al., 2015). This theoretical perspective is instrumental in understanding how retargeting, particularly when it manifests negatively, can impact consumer satisfaction and future purchase intentions.

Behavioral economics suggests that consumer benchmarks are malleable and responsive to new information, a principle that can extend to the context of retargeting (Kahneman, 1992; Tversky & Kahneman, 1981). While retargeting can enhance the perceived value of a product or service, thereby reinforcing satisfaction and repurchase intentions, negative retargeting ads might reset consumer expectation confirmation, undermining satisfaction and repurchase intentions (Baek & Morimoto, 2012; Chen & Lin, 2019).

This study delves into the effects of negative retargeting on post-purchase consumer behavior, aiming to explore its influence on expectation confirmation, satisfaction, and repurchase intentions within the ECT framework. Our analysis begins with a set of foundational hypotheses derived from the ECT and documented in Table 4.1, providing a structured overview of our theoretical starting point. Our base model, hypothesizes that satisfaction, fueled by confirmed expectations, forecasts repurchase intentions. Negative retargeting, which can impact consumer satisfaction and repurchase intentions adversely, is scrutinized for its potential to recalibrate consumer expectation confirmation negatively. In essence, our model integrates retargeting into the ECT framework, proposing that retargeting directly influences expectation confirmation and indirectly affects satisfaction and repurchase intentions.

**Table 4.1** *Base Model Hypotheses.*

| Base Model Hypothesis Description |
|---|
| B-H1: Confirmation of expectations is positively related to satisfaction. |
| B-H2: Satisfaction is positively related to repurchase intentions. |
| B-H3: Retargeting is negatively related to expectation confirmation. |
| B-H4: Retargeting will negatively and indirectly affect satisfaction and repurchase intentions. |

The integration of retargeting ads within the ECT framework allows for a detailed analysis of how negative retargeting might recalibrate consumer expectations, potentially leading to dissatisfaction and diminished repurchase intentions. By examining the post-purchase phase through the lens of ECT, the research aims to uncover the broader implications of retargeting on consumer satisfaction and repurchase intentions. This approach not only addresses the immediate effects of retargeting ads but also their long-term impact on consumer behavior and engagement.

### 4.2.3 Culture Heterogeneity in E-Tourism Retargeting Ads

Hofstede's cultural dimensions framework encompasses six dimensions that guide societal values: Power Distance, Uncertainty Avoidance, Collectivism vs. Individualism, Masculinity vs. Femininity, Long-Term Orientation, and Indulgence vs. Restraint (Hofstede, 2003; Hofstede, 2010). These dimensions provide a foundation for understanding global cultural norms and their influence on behaviors and preferences, offering crucial insights for marketing within the tourism industry, where cultural values significantly impact tourist motivations and satisfaction.

The influence of Hofstede's cultural dimensions on tourist behavior is evident in how cultural values affect motivations, preferences, and satisfaction (Huang & Crotts, 2019; Money & Crotts, 2003; Richardson & Crompton, 1988; Soldatenko & Backer, 2019). High levels of individualism, masculinity, uncertainty avoidance, and power distance have been linked to specific tourist behaviors and expectations, with power distance and uncertainty avoidance influencing spending and information search behaviors (Quintal et al., 2010; Su et al., 2018). The positive correlation between indulgence and satisfaction highlights the delicate ways in which cultural dimensions shape tourism experiences (Huang & Crotts, 2019; Koc et al., 2017).

The impact of cultural dimensions on advertising effectiveness is underscored by how cultural contexts influence ad reception and consumer decision-making (Mueller et al., 2014; Raza et al., 2020). Variations in uncertainty avoidance and power distance, for example, affect preferences for emotional messaging and reliance on information sources (Lalwani & Forcum, 2016; Money & Crotts, 2003). The role of cultural values in shaping responses to advertising strategies, including celebrity endorsements and online advertisements, points to the necessity for marketers to design culturally resonant campaigns to foster deeper customer engagement and loyalty (Valaei et al., 2016; Winterich et al., 2018), leveraging cultural insights to optimize

marketing effectiveness. Recent studies highlight how alignment with cultural norms such as uncertainty avoidance and long-term orientation enhances trust and risk perception (Pratesi et al., 2021), significantly boosting online purchase intentions in diverse cultural settings (Raza & Zaman, 2021).

Hofstede's cultural framework, renowned in fields such as marketing, psychology, and management, originally analyzed cultures at a national level but encountered limitations in explaining consumer behavior due to within-country heterogeneity and global influences (Hofstede & McCrae, 2004; Leung et al., 2005; Soares et al., 2007; Steenkamp, 2001; Søndergaard, 1994). Recognizing these limitations, researchers developed scales to measure Hofstede's dimensions at the individual level, notably the CVSCALE by Yoo et al. (2011) and a scale for indulgence by Heydari et al. (2021), addressing the need for finer granularity in cultural analysis, especially relevant for personalized marketing practices like retargeting ads (Chandra et al., 2022).

Incorporating the measurements of Hofstede's dimensions at the individual level suggested by Yoo et al. (2011) and Heydari et al. (2021) into this research involves initially selecting Hofstede's cultural dimensions, measured at the individual level, as the foundational base for exploring to what extent there is heterogeneity in the effects of negative retargeting according to consumer cultural values. This step is followed by an assessment of these dimensions among users who have encountered competitive post-purchase retargeting ads. Subsequently, an appropriate clustering method is employed to delineate distinct clusters, drawing upon the similarities in Hofstede's cultural dimensions exhibited by the users. These methodological steps are designed to address the initial question of our study:

Q1: To what extent can the systematic heterogeneity in consumers' cultural backgrounds be condensed into a few distinct cultural patterns?

Proceeding to the later stages of profiling and analysis, the research evaluates how the behavior and the effect of negative retargeting differs among clusters of cultural values. This phase aims to shed light on the second research question:

Q2: To what extent will the identified clusters demonstrate distinct responses to post-purchase retargeting?

This refined approach aims to explore the interplay between cultural heterogeneity and consumer behavior in response to digital marketing strategies within the e-tourism context (See figure 4.1).

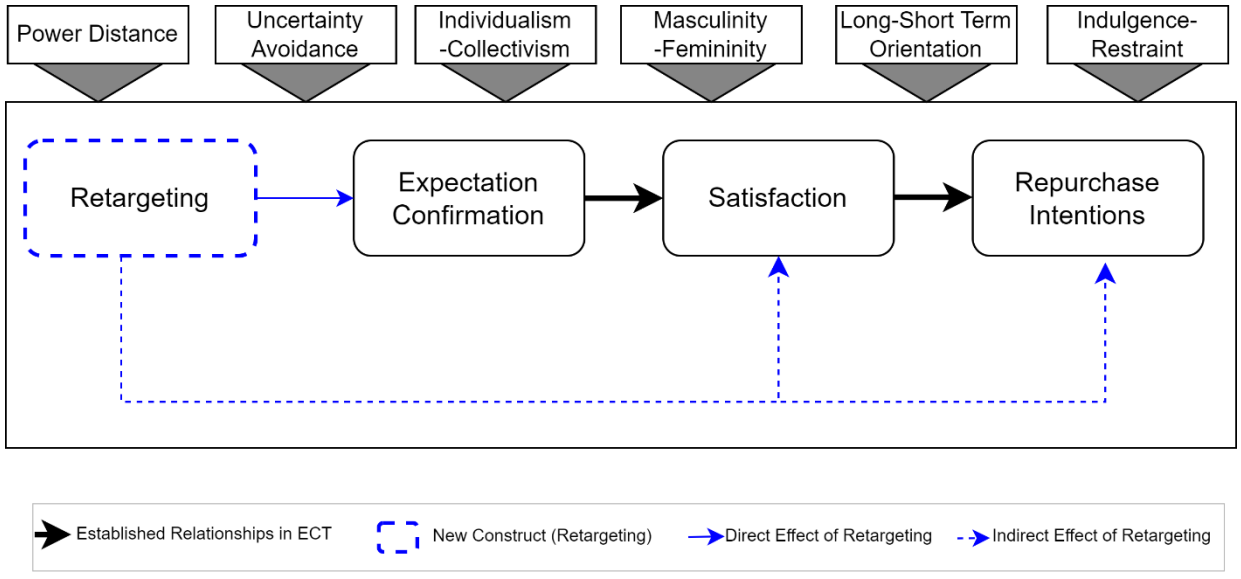


**Figure 4.1:** *Theoretical model*

## 4.3 Methodology

### 4.3.1 Sample and measurements.

The sample size for the study was determined based on suggestions by Green (1991) and Gefen et al. (2011), aiming for a power of 80% with a medium effect size and a significance level of $p = 0.05$. With 405 usable samples collected from 580 emails sent out (response rate of 69.83%), the sample size requirement was met, including 189 participants from Spain and 216 from Saudi Arabia. The study was conducted from February to April 2022, with nearly equal gender distribution (56% men in Saudi Arabia and 53% in Spain). Participants mostly held a bachelor's degree (30.1%) and were aged between 25 to 44 years (45.9%). All participants had purchased an online tourism service and subsequently encountered more competitive retargeting ads after their purchase.

Participants were screened with the question, 'Have you experienced more competitive retargeting ads for an e-tourism service—such as hotel reservations, flight bookings, holiday packages, or other related services—that you already purchased?' This aimed to identify individuals who had encountered competitive offers through retargeting ads after making a purchase, ensuring the study focused on consumers affected by such marketing strategies. Inclusion was based on affirmative responses, targeting a specific group within the e-tourism market for a focused examination of retargeting ads' effectiveness and cultural influences on consumer behavior.

The questionnaire assessed participants' expectation confirmation, satisfaction, repurchase intentions, perception of retargeting, and Hofstede six cultural dimensions. Scales used for the constructs were adapted from previous research (Bhattacherjee, 2001; Dubrovski, 2001; Heydari et al., 2021; Yi & La, 2004; Yoo et al., 2011), and the questionnaire was translated into Arabic and

Spanish using the back-translation method (Brislin, 1976). Responses were rated on a 10-point Likert scale ranging from 1 ("strongly disagree") to 10 ("strongly agree"). Table 4.2 provides the definitions, item lists, and references for each construct in the study.

**Table 4.2** *Constructs' Measurements and Sources*

| Construct | Indicators |
|---|---|
| Power Distance Source CVSSCALE (Yoo et al., 2011) | PO1. People in higher positions should make most decisions without consulting people in lower positions.<br>PO2. People in higher positions should not ask the opinions of people in lower positions too frequently.<br>PO3. People in higher positions should avoid social interaction with people in lower positions.<br>PO4. People in lower positions should not disagree with decisions by people in higher positions.<br>PO5. People in higher positions should not delegate important tasks to people in lower positions. |
| Uncertainty Avoidance Source CVSSCALE (Yoo et al., 2011) | UN1. It is important to have instructions spelled out in detail so that I always know what I'm expected to do.<br>UN2. It is important to closely follow instructions and procedures.<br>UN3. Rules and regulations are important because they inform me of what is expected of me.<br>UN4. Standardized work procedures are helpful.<br>UN5. Instructions for operations are important. |
| Collectivism Source CVSSCALE (Yoo et al., 2011) | **C**O1. Individuals should sacrifice self-interest for the group.<br>CO2. Individuals should stick with the group even through difficulties.<br>CO3. Group welfare is more important than individual rewards.<br>CO4. Group success is more important than individual success.<br>CO5. Individuals should only pursue their goals after considering the welfare of the group.<br>CO6. Group loyalty should be encouraged even if individual goals suffer. |
| Long-term Orientation Source CVSSCALE (Yoo et al., 2011) | LT1. Careful management of money<br>LT2. Going on resolutely in spite of opposition (Persistence)<br>LT3. Personal steadiness and stability<br>LT4. Long-term planning<br>LT5. Giving up today's fun for success in the future<br>LT6. Working hard for success in the future |
| Masculinity Source CVSSCALE (Yoo et al., 2011) | MA1. It is more important for men to have a professional career than it is for women.<br>MA2. Men usually solve problems with logical analysis; women usually solve problems with intuition.<br>MA3. Solving difficult problems usually requires an active, forcible approach, which is typical of men.<br>MA4. There are some jobs that a man can always do better than a woman. |

| | |
|---|---|
| Indulgence<br>Source (Heydari et al., 2021) | IND1. There should not be any limits on individuals' enjoyment.<br>IND2. Societies should value relatively free gratification of desires and feelings.<br>IND3. Desires, especially with respect to sensual pleasures, should not be suppressed.<br>IND4. The gratification of desires should not be delayed.<br>IND5. One should enjoy complete sexual freedom without restriction. IND6. Feelings and desires related to casual sex should be gratified freely. |

### 4.3.2 Data Analysis

The initial step in our data analysis involved employing Confirmatory Factor Analysis (CFA) to validate the scales of the six cultural constructs. CFA, a structural equation modeling technique, is used to assess the hypothesis that a relationship between observed variables and their underlying latent constructs exists (Brown, 2015). We used CFA to assess the fit of our hypothesized measurement model, confirming the dimensionality of these constructs.

Following the Confirmatory Factor Analysis (CFA) to validate the measurement model of our cultural constructs, we embarked on uncovering underlying patterns within our dataset through clustering analysis. We began our clustering process with Hierarchical Clustering Analysis to explore initial groupings and understand the data structure (Johnson, 1967). To determine the optimal number of clusters and refine their quality, we used the elbow method and silhouette analysis, followed by k-means clustering to finalize the cluster formation based on their consistency and quality (Lloyd, 1982; MacQueen, 1967). The rationale for choosing HCA is allows for a dendrogram's visual inspection, facilitating an intuitive understanding of the data's hierarchical structure and aiding in the determination of cluster numbers (Rokach & Maimon, 2005).

To determine the optimal number of clusters, we utilized the Elbow Method and Silhouette Analysis. The Elbow Method helped identify the point where the decrease in within-cluster sum of squares sharply changes, providing a heuristic for the optimal cluster count (Kodinariya &

Makwana, 2013). Silhouette Analysis offered a quantitative measure of how similar an object is to its own cluster compared to others, ensuring our clusters were not only distinct but cohesive (Rousseeuw, 1987)

After identifying the initial clusters through hierarchical clustering and determination of the optimal number of clusters, we applied k-means clustering to refine them. K-means iteratively adjusts objects to the nearest cluster center, minimizing within-cluster variance and enhancing cluster consistency (Lloyd, 1982; MacQueen, 1967). This method improves the quality of clusters, ensuring precise groupings are essential for our analysis. In the final analysis phase, we applied Categories description (CATDES) through the FactoMineR package in R, using the V-test to highlight significant associations between categorical variables and clusters. This step was crucial in identifying the defining variables of each cluster, enriching our understanding of the dataset's unique profiles (Lê et al., 2008).

Partial least squares structural equation modeling (PLS-SEM) was used to estimate the model for the combined data to establish a baseline model against which individual cluster models are compared. This multivariate technique allows to analyze multi-block of variables playing the role of latent constructs when it is hypothesized a system of linear relationship between the blocks. PLS-SEM estimates the causal relationship between constructs maximizing the explained variances between blocks. This method presents several advantages as it provides robust estimations when working with small sample size and it is free from distribution hypothesis (Hair et al., 2019). Finally, it is indicated when the approach of the research is explorative and predicted driven. For a review of the technique see (Esposito Vinzi et al. 2010, Hair et al., 2019, Do Valle & Assaker 2015). To test the differences between identified tourist' clusters, we used multigroup analysis (MGA), a standard way to analyze the effect of a categorical variable when using PLS-

SEM (Hair et al., 2019). Different models are estimated, one for each identified cluster, and the model coefficients are then compared using a statistical test to check for significant differences. In our case, we estimated a model for each group. Among the several available tests (see Hair et al., 2019 for a review), we used the PLS-MGA proposed by Henseler et al. (2009). Smart PLS4 (Ringle et al., 2022) was used to estimate PLS-SEM and to perform PLS-MGA.

## 4.4 Results

### 4.4.1 To what extent can the systematic heterogeneity in consumers' cultural backgrounds be condensed into a few distinct cultural patterns?

#### *4.4.1.1 Confirmatory Factor Analysis*

The Confirmatory Factor Analysis (CFA) was employed to validate the scales of each of the six cultural constructs independently. For each construct, the CFA model demonstrated adequate fit indices, suggesting that the observed variables effectively represented their respective underlying latent constructs. Specifically, the fit indices for each construct were satisfactory in terms of factor loadings, SRMR, Comparative Fit Index (CFI), Tucker-Lewis Index (TLI), Root Mean Square Error of Approximation (RMSEA). According to Brown (2015), acceptable thresholds for these indices are as follows: CFI and TLI values should be 0.95 or higher to indicate a good fit; RMSEA values should be 0.06 or lower, with values up to 0.08 considered acceptable; and SRMR values should be less than 0.08. These benchmarks are met as reported in Table 4.3, confirming the adequacy of the model fits in line with established methodological standards.

**Table 4.3** *Confirmatory Factor Analysis*

| Constructs/items | Factor loadings | 2.50% | 97.50% | ChiSqr/df | RMSEA | TLI | CFI | SRMR |
|---|---|---|---|---|---|---|---|---|
| **Power Distance (PD)** | | | | 1.503 | 0.035 | 0.995 | 0.997 | 0.014 |
| PD1 | 0.758 | 0.701 | 0.805 | | | | | |
| PD2 | 0.771 | 0.718 | 0.816 | | | | | |
| PD3 | 0.807 | 0.762 | 0.842 | | | | | |
| PD4 | 0.763 | 0.711 | 0.808 | | | | | |

| Constructs/items | Factor loadings | 2.50% | 97.50% | ChiSqr/df | RMSEA | TLI | CFI | SRMR |
|---|---|---|---|---|---|---|---|---|
| PD5 | 0.750 | 0.686 | 0.800 | | | | | |
| **Collectivism (COL)** | | | | 1.842 | 0.046 | 0.988 | 0.993 | 0.019 |
| COL1 | 0.718 | 0.618 | 0.798 | | | | | |
| COL2 | 0.752 | 0.684 | 0.810 | | | | | |
| COL3 | 0.741 | 0.658 | 0.805 | | | | | |
| COL4 | 0.733 | 0.638 | 0.805 | | | | | |
| COL5 | 0.780 | 0.725 | 0.835 | | | | | |
| COL6 | 0.736 | 0.660 | 0.798 | | | | | |
| **Masculinity (MAS)** | | | | 1.992 | 0.049 | 0.992 | 0.997 | 0.012 |
| MAS1 | 0.752 | 0.678 | 0.812 | | | | | |
| MAS2 | 0.787 | 0.742 | 0.834 | | | | | |
| MAS3 | 0.796 | 0.747 | 0.844 | | | | | |
| MAS4 | 0.790 | 0.739 | 0.835 | | | | | |
| **Uncertainty Avoidance (UA)** | | | | 1.954 | 0.049 | 0.994 | 0.997 | 0.010 |
| UA1 | 0.858 | 0.810 | 0.894 | | | | | |
| UA2 | 0.886 | 0.849 | 0.916 | | | | | |
| UA3 | 0.867 | 0.823 | 0.899 | | | | | |
| UA4 | 0.872 | 0.832 | 0.901 | | | | | |
| UA5 | 0.840 | 0.787 | 0.877 | | | | | |
| **Long-term Orientation (LTO)** | | | | 1.959 | 0.010 | 0.988 | 0.993 | 0.019 |
| LTO1 | 0.786 | 0.724 | 0.843 | | | | | |
| LTO 2 | 0.746 | 0.665 | 0.807 | | | | | |
| LTO 3 | 0.708 | 0.601 | 0.793 | | | | | |
| LTO 4 | 0.747 | 0.673 | 0.81 | | | | | |
| LTO 5 | 0.775 | 0.717 | 0.828 | | | | | |
| LTO6 | 0.758 | 0.675 | 0.823 | | | | | |
| **Indulgence (IND)** | | | | 1.309 | 0.028 | 0.996 | 0.998 | 0.016 |
| IND1 | 0.765 | 0.686 | 0.823 | | | | | |
| IND 2 | 0.738 | 0.652 | 0.799 | | | | | |
| IND 3 | 0.746 | 0.666 | 0.814 | | | | | |
| IND 4 | 0.764 | 0.689 | 0.821 | | | | | |
| IND 5 | 0.766 | 0.7 | 0.822 | | | | | |
| IND 6 | 0.753 | 0.673 | 0.815 | | | | | |

*4.4.1.2 Clustering Analysis*

Hierarchical Clustering Analysis, applied to the factor scores of the cultural constructs, suggested 3 distinct clusters (See Figure 4.4). These clusters showed distinct patterns, indicating varying cultural dimensions within our dataset. The Elbow Method and Silhouette Analysis consistently suggested a 3-cluster solution as the most suitable choice (See Figure 4.2, and Figure 4.3). This consensus between the two methods strengthens our confidence in the selected clustering structure. The 3-cluster solution strikes a balance between explained variance and model complexity, and Silhouette Analysis confirms a high degree of separation between clusters, indicating a well-defined clustering structure. Subsequently, k-means clustering was used to refine these clusters, enhancing their quality and consistency. This two-step clustering process ensured robust cluster formation, which was crucial for the subsequent analysis.

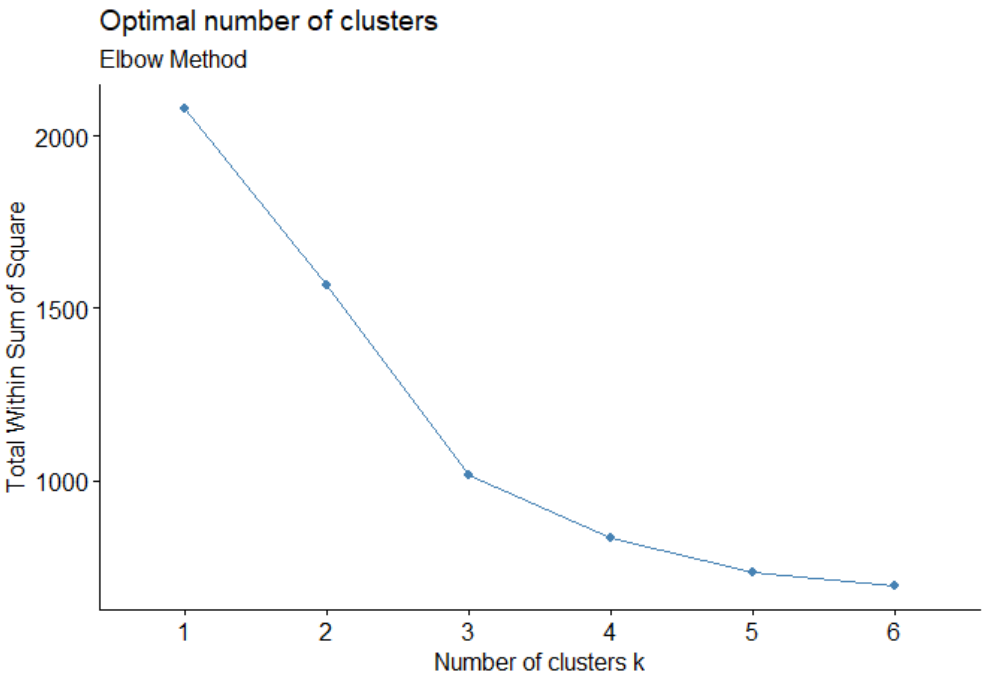


**Figure 4.2:** *Elbow Method for Optimal Cluster Determination*

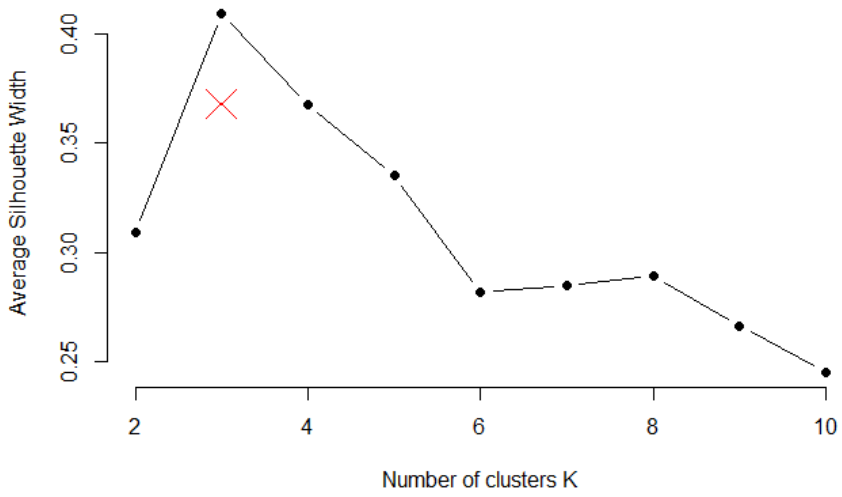


**Figure 4.3:** *Silhouette Scores*

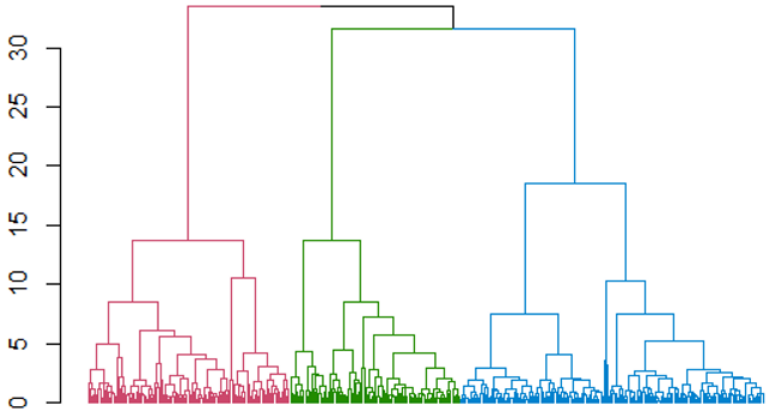


**Figure 4.4:** *Hierarchical clustering dendrogram*

After employing K-means clustering, we applied Categories description (CATDES) to further characterize each cluster. The results indicate that, except for masculinity/femininity, all cultural variables significantly discriminate among clusters. The V-test scores shed light on how

the means of each variable within a cluster differ from the mean of the entire sample (See Figure 4.5). Specifically:

- **Cluster 1** stands out for having the highest levels of Power Distance and the lowest levels of Long-term Orientation and Uncertainty Avoidance. (**Hierarchical Traditionalists**)
- **Cluster 2** is distinctive for exhibiting the highest Long-term Orientation and Collectivism scores, along with the lowest Indulgence score. (**Future-Focused Conservatives**)
- **Cluster 3** is characterized by its high Uncertainty Avoidance score and the lowest levels of Collectivism and Power Distance. (**Pragmatic Individualists**)

These clustering analysis results effectively address the first research question.

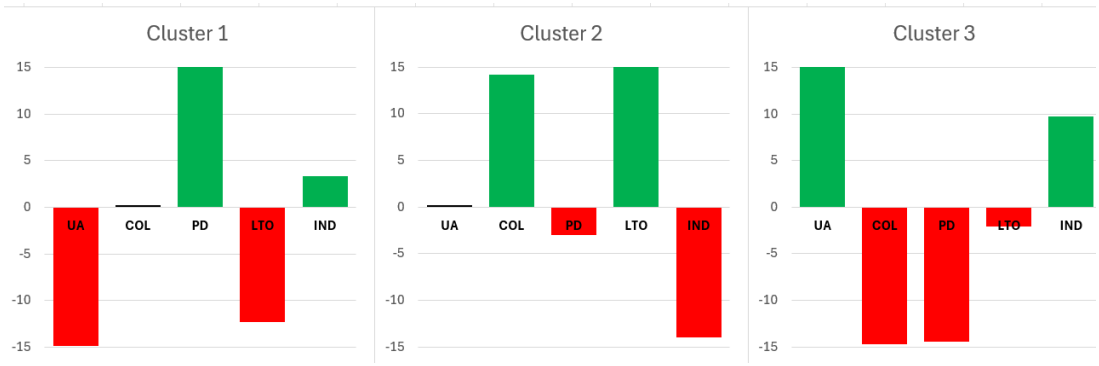


**Figure 4.5:** *Comparative Analysis of V-Test Scores Across Clusters*

### 4.4.2 To what extent will the identified clusters demonstrate distinct responses to post-purchase retargeting?

#### *4.4.2.1 Global Model Estimation*

PLS-SEM was utilized to create a baseline model for the global model of aggregated sample, providing a reference for comparing models of individual clusters. The measurement model validation followed Hair et al. (2022) guidelines and confirmed the reliability and validity of the constructs. Cronbach's alpha and CR values exceeded 0.7, indicating good internal consistency.

AVE values were above 0.5, showing satisfactory convergent validity. Factor loadings were significant, and HTMT values were below 0.85, supporting discriminant validity (Franke & Sarstedt, 2019). Common method bias was ruled out, as VIF values were below 3.3 (Kock, 2015). Overall, the results (See appendix A) validate the measurement model and ensure the constructs' reliability and validity.

Concerning the structural model, expectation confirmation had a positive effect on satisfaction (b=.684, IC95[0.583,0.778]), and satisfaction had a positive effect on repurchase intentions (b=.608, IC95[0.544,0.671]). Furthermore, retargeting had a negative effect on expectation confirmation (b=-.387, IC95[-0.497, -0.273]). Also, retargeting had significant indirect effects on both satisfaction (b=-.264, IC95[-0.357, -0.179]) and repurchase intentions (b=-.161, IC95[-0.357, -0.103]). All coefficients were significant, supporting the four hypotheses of our base model. Additionally, results reveal that SRMR is equal to .0052 indicating a good fit of the model, and R2 values are 0.467, 0.370 for satisfaction, and repurchase intentions, respectively.

*4.4.2.2 Multigroup Analysis*

We repeated the validation of the measurement model of three clusters separately . Before running the MGA for the three groups, the measurement invariance of composite models (MICOM) procedure (Hair et al., 2019) was applied to check measurement invariance. This procedure involved three steps: (1) configural invariance, (2) compositional invariance, and (3) equality of the composite means and variance values. According to Hair et al. (2019), steps 1 and 2 are prerequisites for running the MGA.

Configural invariance was established by specifying each LV – retargeting, expectation confirmation, satisfaction, and repurchase intentions - in the PLS-SEM equally for both groups, while compositional invariance was confirmed by comparing latent score correlations between

groups with the reference distribution of correlations obtained by permutation of the groups. If the observed correlation falls in the upper 95% of the distribution, the null hypothesis of a theoretical correlation of 1 is accepted and composite invariance of the construct is established. Finally, again comparing values with the reference distribution obtained by permutation of the groups, equal mean values and variances for latent scores across groups were evaluated to ensure full measurement invariance. Table 4.4 shows MICOM procedure results, with step 2 verified in all cases, and step 3 only partially supported. Hence, configural and compositional invariance was assumed, and full invariance was rejected.

**Table 4.4** *MICOM procedure (steps 2 and 3)*

| | | **Compositional invariance** | | **Equality of composite values** | | | |
|---|---|---|---|---|---|---|---|
| | | | | **Mean values** | | **Variance values** | |
| **Construct** | **Clusters** | **Score Corr** | **5.00 %** | **Mean Diff** | **2.5-97.5%** | **Variance Diff** | **2.5-97.5%** |
| Expectations Confirmation | 1 vs 2 | 1 * | 0.999 | 0.226 | [-0.253-0.239]* | 0.192 | [-0.417-0.422]* |
| Repurchase intentions | | 0.999 | 0.999 | -0.028 | [-0.233-0.250]* | 0.178 | [-0.395-0.475]* |
| Retargeting | | 0.999 | 0.996 | -0.464 | [-0.251-0.251] | 0.403 | [-0.271-0.287] |
| Satisfaction | | 1 * | 0.999 | 0.327 | [-0.257-0.243] | 0.467 | [-0.419-0.448] |
| Expectations Confirmation | 1 vs 3 | 1* | 0.999 | 0.407 | [-0.225-0.228] | 0.408 | [-0.415-0.484]* |
| Repurchase intentions | | 1* | 0.998 | 0.135 | [-0.218-0.222]* | 0.353 | [-0.445-0.440]* |
| Retargeting | | 1* | 0.999 | -0.681 | [-0.241-0.236] | 0.571 | [-0.270-0.289] |
| Satisfaction | | 1* | 0.999 | 0.522 | [-0.244-0.244] | 0.774 | [-0.679-0.655] |
| Expectations Confirmation | 2 vs 3 | 1* | 1* | 0.193 | [-0.261-0.261]* | 0.224 | [-0.657-0.632]* |
| Repurchase intentions | | 0.999 | 0.993 | 0.175 | [-0.286-0.257]* | 0.181 | [-0.532-0.553]* |
| Retargeting | | 1* | 0.999 | -0.266 | [-0.284-0.254] | 0.169 | [-0.578-0.530]* |
| Satisfaction | | 1* | 0.999 | 0.230 | [-0.245-0.243]* | 0.305 | [-0.786-0.746]* |

Note: *Confirmed

In the Multi-Group Analysis (MGA) using Partial Least Squares (PLS), significant findings were observed in the direct and indirect effects across different groups (See Table 4.5). Notably, there was a significant difference between *Future-Focused Conservatives* group and *Pragmatic Individualists* group in the direct effect of retargeting on expectation confirmation,

with *Pragmatic Individualists* group showing a more negative impact (p=0.021). Although not statistically significant, a difference was also observed between *Hierarchical Traditionalists* and *Pragmatic Individualists* in this regard. Furthermore, the indirect effects of retargeting on satisfaction and repurchase intentions in *Future-Focused Conservatives* group were non-significant, contrasting with the stronger effects in the other clusters. Additionally, in the *Future-Focused Conservatives* group, the effects of expectation confirmation on satisfaction, and subsequently satisfaction on repurchase intentions, were higher compared to the other groups, despite not being statistically significant. Thus, the MGA analysis provides an answer to the second question of the research.

**Table 4.5** *Multigroup comparison results*

| | Paths | Cluster 1 | Cluster 2 | Cluster 3 | PLS-MGA test 1 vs 2 | 1 vs 3 | 2 vs 3 |
|---|---|---|---|---|---|---|---|
| | | | | | p-value | | |
| Direct effect | Retargeting on expectations | -0.330 | -0.193 | -0.590 | 0.372 | 0.052 | *0.021** |
| | Expectations on satisfaction | 0.627 | 0.752 | 0.716 | 0.309 | 0.466 | 0.798 |
| | Satisfaction on repurchase intentions | 0.599 | 0.710 | 0.583 | 0.122 | 0.818 | 0.203 |
| Indirect effect | Retargeting -> satisfaction | -0.207 | -0.146NS | -0.423 | | | |
| | Retargeting -> repurchase | -0.124 | -0.103NS | -0.247 | | | |

*Note:* Significance ***p < .001, non-significant. Italics indicate significance at p < .05

To summarize, the results section effectively condenses consumers' cultural backgrounds into three distinct clusters: Hierarchical Traditionalists, Future-Focused Conservatives, and Pragmatic Individualists, through Confirmatory Factor Analysis and Clustering Analysis. It also examines these clusters' responses to post-purchase retargeting using Partial Least Squares Structural Equation Modeling (PLS-SEM) and Multigroup Analysis which further highlighted

notable differences in retargeting responses among the clusters, particularly between Pragmatic Individualists and Future-Focused Conservatives. This comprehensive analysis sets the stage for the following discussion section, where these findings' implications for theoretical contributions and practical applications will be explored in depth.

## 4.5 Discussion

This study investigated the cultural heterogeneity of e-tourism users and its impact on responses to negative retargeting. The primary objective is to explore cultural heterogeneity by identifying distinct clusters of users based on variations in Hofstede's cultural values measured at the individual level. Then by examining how cultural differences influence users' reactions to negative retargeting, and patterns in the relations among negative retargeting, expectation confirmation, satisfaction, and repurchase intentions, the study aims to provide valuable insights for e-tourism businesses seeking to tailor their marketing strategies effectively. Understanding the interplay between cultural values and consumer behavior in the context of retargeting can inform the development of more sophisticated and culturally sensitive marketing approaches in the e-tourism industry.

Our findings revealed that this effect was negative and significant across the combined sample of tourists aligning with previous research in retargeting literature about its role in shaping consumer behavior (Alghanayem et al., 2023; Baek & Morimoto, 2012; Lambrecht & Tucker, 2013; Li et al., 2021). Importantly, when exploring the cultural heterogeneity, we were able to identify three distinct groups of e-tourism users by clustering them based on similar variations of Hofstede cultural dimensions, effectively addressing the first research question.

The study employed Hofstede's cultural dimensions framework to identify cultural clusters among e-tourism users. Through cluster analysis, three distinct clusters were identified, characterized by variations in cultural values such as individualism-collectivism, power distance, and uncertainty avoidance. Each cluster exhibited unique cultural preferences and tendencies, providing valuable insights into the diverse cultural landscape of e-tourism consumers. By categorizing users into distinct clusters based on their cultural values, the study lays the foundation for a stronger understanding of how cultural heterogeneity influences responses to negative retargeting in the e-tourism context.

Furthermore, after examining cultural heterogeneity we delved into exploring to what extent the effect of negative retargeting differs among identified clusters. When comparing the three identified groups of e-tourism users in our base mode, we found significant differences in their reaction to negative retargeting, as well as valuable insight into other relations between expectation confirmation, satisfaction, and repurchase intentions, providing an answer to the second question of the research.

Our study's findings exhibit interesting alignments and contrasts with the existing literature giving the fact we employed a new perspective to cultural values. Previous studies have indicated that high power distance amplifies advertising's impact (Gao et al., 2018; Winterich et al., 2018). However, our research reveals that this effect varies at the individual level within specific tourist groups, potentially due to the lack of celebrity endorsements in retargeting ads. In examining other cultural dimensions—uncertainty avoidance, collectivism, and indulgence—our findings align with established research, highlighting their significant role in shaping tourist behavior and responses to advertising (Huang & Crotts, 2019; Koc et al., 2017; Lalwani & Forcum, 2016; Yilmaz, 2017). Regarding the relationship between long-term orientation and the effectiveness of

retargeting ads. We found that higher levels of long-term orientation are associated with a reduced impact of these ads, a connection not previously explored. In a specific finding for cluster 2, long-term orientation positively correlates with expectation confirmation, satisfaction, and repurchase intentions, supporting existing literature on the influence of long-term orientation in tourism (Huang & Crotts, 2019; Valaei et al., 2016). Lastly, we observed that masculinity did not significantly differentiate the identified groups. This might be attributed to the minimal variance in masculinity between our sample populations from Spain and Saudi Arabia, suggesting a lack of sufficient variability for it to be a distinguishing factor.

### 4.5.1 Theoretical Contribution

This study contributes to the existing literature by extending our understanding of the interplay between retargeting ads and cultural dimensions. It underscores the importance of considering cultural factors when examining the effectiveness of advertising strategies in diverse markets. Additionally, the cluster analysis provides insights into the heterogeneity of user responses based on cultural dimensions, offering a novel perspective on the cultural heterogeneity of digital advertising audiences in e-tourism context. In summary, our study contributes to both practical and theoretical domains by shedding light on the complex interplay between retargeting, cultural factors, and user behavior, paving the way for further research in this area.

### 4.5.2 Managerial Implications

Our findings underscore significant practical implications for digital marketers and advertisers in the e-tourism sector, highlighting the delicate balance required to drive engagement while respecting consumer boundaries. The observed negative effect of post-purchase retargeting on consumer behavior points to the need for a strategic reevaluation of retargeting campaigns. Marketers are encouraged to shift their focus from volume-based advertising to value-driven

engagement, emphasizing the quality and relevance of content over sheer frequency. This approach necessitates identifying the precise stage of the consumer journey, enabling marketers to tailor their communications more effectively and provide value that aligns with the consumer's current needs and expectations.

Such a paradigm shifts towards value-driven engagement, underscored by an acute awareness of the consumer journey stage, promises to elevate the effectiveness of marketing efforts significantly. As the digital landscape becomes increasingly saturated, the ability to deliver personalized, culturally resonant content becomes paramount. This approach not only respects consumer boundaries and preferences but also fosters repurchase intentions by prioritizing customer satisfaction throughout the various stages of the consumer journey. By adopting this refined strategy, marketers can ensure that their efforts contribute to a positive brand perception and a more engaging consumer experience, ultimately leading to sustained business growth in the dynamic sector of e-tourism.

Moreover, the identification of distinct user clusters within our analysis points to the limitations of a 'one-size-fits-all' approach in digital advertising. Recognizing cultural heterogeneity provides digital marketers and businesses in the e-tourism sector with significant benefits, prompting a departure from generic advertising towards more personalized, culturally sensitive retargeting ads. This entails segmenting the audience not just by demographic data, but by cultural characteristics, crafting messages that speak directly to each group’s unique values and preferences. This shift allows for the creation of marketing campaigns that are not only highly relevant and engaging to diverse consumer groups but also foster a deeper understanding and respect for their cultural differences. Such awareness can lead to improved customer satisfaction, enhanced brand loyalty, and increased conversion rates, as consumers are more likely to respond

positively to content that resonates with their cultural backgrounds. Ultimately, leveraging cultural diversity in marketing strategies not only strengthens the consumer-brand relationship but also positions e-tourism businesses for sustainable growth and competitive advantage in a global marketplace.

To adeptly navigate the complexities of identifying consumer cultural clusters or values, marketers are increasingly turning towards a fusion of data analytics, AI insights, and cultural trend monitoring. By harnessing the power of social listening tools alongside the analysis of consumer behaviors across digital touchpoints, from social media to e-commerce platforms, marketers can extract valuable insights into cultural preferences. This data, enriched with geo-location and linguistic analysis, unveils the cultural markers indicative of specific clusters. AI algorithms further refine this approach by evaluating the tone and context of online engagements, progressively honing the accuracy of cultural segmentation through machine learning. Strategic partnerships with data-rich platforms offer an additional layer of depth, providing access to a broad spectrum of consumer cultural insights. This sophisticated amalgamation of technology and analytics not only empowers marketers to dynamically pinpoint and resonate with diverse cultural values but also anticipates future shifts in consumer preferences and behaviors. As a result, marketing strategies become not just reactive but proactive, positioning brands as forward-thinking and culturally attuned in the eyes of their audience. Such tailored approaches mark a significant leap in the personalization of digital marketing, ensuring campaigns are not just seen but felt.

Building on the findings from this study, there are several avenues through which e-tourism marketers can enhance the effectiveness of their retargeting ads by integrating a deeper understanding of cultural differences into their practices. One pivotal approach is the development of culturally customized content. Tailoring marketing materials to reflect the distinct values and

preferences identified in the cultural clusters, such as emphasizing sustainability and long-term travel benefits for "Future-Focused Conservatives", can significantly increase the relevance and impact of these campaigns. This strategy not only caters to the specific interests of each group but also fosters a sense of personal connection and understanding between the brand and its audience. Similarly, developing post-purchase engagement strategies that reflect the cultural values of each group can enhance consumer satisfaction and loyalty, especially among those with high levels of uncertainty avoidance and individualism.

### 4.5.3 Limitations and Future Research

The main limitation of this study is that a non-probability sampling approach was used, which means that the results cannot be generalized to the larger population. The findings are also specific to e-tourism users in Saudi Arabia and Spain, so further research in other countries and markets is needed to validate our findings and offer new insights. Future research could examine the impact of other consumer-centric variables and their role in shaping consumers' reaction to retargeting ads.

## 4.6 Conclusion

Our research offers novel insights into the complex dynamics of post-purchase retargeting ads and their interaction with cultural heterogeneity within the e-tourism industry. By employing Hofstede's cultural dimensions at an individual level, we identified three distinct cultural clusters (Hierarchical Traditionalists, Future-Focused Conservatives, and Pragmatic Individualists) and demonstrated their varied responses to retargeting ads. The study underscores the importance of cultural considerations in the effectiveness of retargeting ads, showing that cultural alignment can significantly influence consumer satisfaction and repurchase intentions. These findings not only contribute to the theoretical understanding of digital marketing and consumer behavior across

cultures but also provide practical guidance for marketers aiming to enhance the efficacy of retargeting campaigns in the e-tourism sector. Future research should expand this inquiry to other cultural contexts and industries, exploring the broader applicability of these insights in global marketing strategies.

# 5. Chapter 5: Main Discussion and Conclusions

## 5.1 Summary of Findings

This thesis extensively investigates the negative effects of retargeting ads in the e-tourism sector, emphasizing the critical role of consumer-centric variables including trust in technology, digital skills, and cultural values in shaping consumer reactions. The findings across the three chapters underscore the complex interplay between digital marketing practices and consumer behavior, offering novel insights into the challenges and opportunities retargeting strategies present.

The second chapter of the thesis delves into the negative repercussions of post-purchase retargeting ads in digital marketing, particularly within the e-tourism sector. It uncovers that competitive retargeting ads negatively influence consumer expectation confirmation, subsequently reducing satisfaction and repurchase intentions, providing support for speculation in the literature (Lambrecht & Tucker, 2013; Sahni et al., 2019; Villas-Boas & Yao, 2021). Moreover, the adverse effects of retargeting are magnified with greater online exposure, as consumers spending more time online face increased retargeting, further diminishing their satisfaction and altering their perceptions of value. Interestingly, this negative indirect effect on satisfaction and repurchase intentions is not significant among consumers who spend less than one hour online, suggesting that the duration of online exposure significantly influences the impact of retargeting ads. These findings are in line with previous research in the importance of exposure to advertising (Jiang et

al.,2021; Zhang et al., 2017). These insights reveal a critical flaw in retargeting strategies aimed at boosting engagement and sales; while effective in driving initial purchases, they can unintentionally undermine the purchasing experience, satisfaction, and future purchasing plans.

The third chapter of the thesis illuminates how consumer trust and digital skills modulate the negative impact of retargeting ads in digital marketing, particularly within e-tourism. The trust serves as a double-edged sword: it initially enhances receptivity towards retargeting ads, making them seem more credible and tailored (Bleier & Eisenbeiss, 2015; Chen & Barnes, 2007; Pavlou & Fygenson, 2006; Zhu et al., 2022). However, higher trust also intensifies negative emotions when consumers encounter competitive ads, thus magnifying dissatisfaction. Consumers with lower trust exhibit lesser negative reactions, hence experiencing a less pronounced effect of retargeting on post-purchase behavior due to their generally lower internet usage and less frequent encounters with competitive ads. Additionally, it highlights that greater digital skills exacerbate the negative effects of retargeting. Consumers with advanced digital skills are more adept at navigating online platforms, increasing their exposure to competitive ads, and enhancing their critical evaluation of such ads (Bawden & Robinson, 2009; Castañeda et al., 2019). This increased engagement leads to more pronounced negative impacts when ads do not meet their expectations.

In contrast, consumers with limited digital skills show a reduced response to retargeting due to difficulties in navigating and interpreting digital content (Liao et al., 2010). Despite these findings, the research did not identify significant differences in the effects of trust and digital skills on consumer expectations between Spain and Saudi Arabia, suggesting that the influence of these factors may be universal across different cultural contexts. This points to the possibility that fundamental aspects of digital interaction, such as trust and digital skills, transcend cultural

variations, thus necessitating further exploration into their global applicability in shaping consumer behavior in digital environments.

The fourth chapter of the thesis explored the cultural heterogeneity among e-tourism users and assessed how this diversity influences reactions to negative retargeting. By applying Hofstede's cultural dimensions at the individual level, the research identified distinct clusters of users based on their cultural values, such as individualism-collectivism, power distance, and uncertainty avoidance. Three unique cultural groups were pinpointed through cluster analysis, each exhibiting specific cultural tendencies and preferences. The analysis then focused on how these cultural differences impact user responses to negative retargeting, as well as their effects on expectation confirmation, satisfaction, and repurchase intentions. Significant variations were found in the responses to negative retargeting among these clusters, contributing valuable insights into how e-tourism businesses might tailor their marketing strategies more effectively. The findings align with and expand upon existing literature by demonstrating the complex influence of cultural dimensions like long-term orientation, which showed a reduced impact of negative retargeting, and the less explored correlations of these cultural traits with consumer behaviors in e-tourism. The study’s insights into cultural heterogeneity provide a deeper understanding of how diverse cultural backgrounds affect consumer responses to retargeting in e-tourism, suggesting the need for culturally sensitive marketing approaches.

In summary, the collective findings of this thesis underline the critical need for marketers to consider the post-purchase implications of retargeting strategies and the cultural aspects of their target audience. By highlighting the potential negative effects of retargeting on consumer satisfaction and the importance of cultural values in shaping consumer behavior, this research

provides valuable insights for developing more effective and ethical digital marketing strategies in the e-tourism sector.

## 5.2 Theoretical Implications

The theoretical contributions of this thesis encompass several innovative aspects of digital marketing within the e-tourism sector. They emphasize the complex interplay of consumer behavior, cultural contexts, and digital interaction. The unifying theme is the exploration of retargeting strategies' impacts on consumer perceptions and behaviors post-purchase.

Chapter 2 enhances the theoretical framework by applying expectation confirmation theory (ECT) to the digital marketing context, specifically within the post-purchase phase in the Saudi Arabian tourism market. This exploration broadens the conventional application of ECT by incorporating the influence of retargeting ads, a component typically overlooked in prior studies. It offers a crucial understanding of how post-purchase retargeting can alter consumer satisfaction, expectation confirmation, and repurchase intentions, thereby providing a more holistic view of the consumer journey.

Chapter 3 delves into the interdependencies between trust, digital skills, and the effectiveness of retargeting ads, adding a layer of complexity by considering the cross-cultural robustness of these interactions. This analysis stands out by demonstrating that the impacts of digital skills and trust are consistent across diverse cultural backgrounds, challenging the assumption that these effects are culturally specific. This contributes significantly to the theoretical literature by confirming the generalizability of these moderating effects in different cultural contexts.

Chapter 4 provides a novel theoretical contribution by integrating cultural dimensions with retargeting strategies, utilizing cluster analysis to reveal the heterogeneity of consumer responses.

This approach extends the current understanding of digital advertising and highlights the significant role of cultural factors in shaping the effectiveness of marketing strategies. This chapter shifts the academic conversation by suggesting that digital marketing effectiveness can be segmented and optimized according to distinct cultural groups within the e-tourism industry.

Collectively, the thesis addresses gaps in digital marketing literature, particularly in the context of e-tourism. It offers insights into the complex dynamics of consumer behavior influenced by digital marketing tactics post-purchase, underpinned by cultural and individual differences. The findings suggest practical implications for marketers to devise more effective and culturally sensitive digital strategies. Furthermore, the research sets a foundation for future inquiries into the layered impacts of digital marketing across different stages of the consumer buying process and across varied cultural landscapes, promoting a more responsible and targeted approach to consumer engagement in digital environments.

## 5.3 Practical Implications

This research provides a comprehensive framework for e-tourism marketers, urging a shift from traditional, price-centric strategies to a more value-driven approach in their retargeting efforts. The extensive analysis reveals the importance of understanding the consumer journey in its entirety—from initial interest through to the post-purchase phase—and tailoring marketing communications to enhance the customer experience and encourage satisfaction and repurchasing intentions at each stage.

To enhance practical application, it is essential to discuss potential barriers that could hinder the effective implementation of these strategies. For instance, marketers might face challenges like data privacy concerns, technological limitations in tracking and personalizing ads, or resistance from consumers wary of overly invasive advertising techniques. Overcoming these

barriers requires robust data protection policies, investing in advanced technological solutions, and building consumer trust through transparent communication and ethical marketing practices.

Marketers are advised to adopt a more strategic use of retargeting, customizing their efforts to offer unique services, tailored content, and personalized travel tips. Such customization should not only focus on the immediate goal of converting interest into sales but should also strive to add unique value that fosters long-term customer relationships. By dynamically adjusting these strategies based on specific consumer interactions and journey stages, businesses can effectively elevate their customer engagement and retention levels.

Implementing sophisticated data management and customer relationship management (CRM) systems is critical in mitigating the risk of post-purchase ads fatigue. These systems can be instrumental in identifying recent purchasers and excluding them from repetitive advertising, which can otherwise undermine the customer experience and satisfaction. This targeted approach helps in protecting the integrity of the customer journey, ensuring that each interaction with the brand adds value and sustains a positive perception.

Additionally, recognizing the significance of cultural sensitivity in digital marketing emerges as a key insight. By delving deep into the cultural backgrounds and values of their audience, e-tourism businesses can develop more resonant and engaging campaigns. This segmentation isn't merely demographic but is enriched by cultural insights, allowing for communications that not only capture attention but also resonate on a deeper, more personal level. The deployment of social listening tools, geo-location analysis, and AI-driven insights enables marketers to dynamically engage with diverse cultural clusters, making marketing efforts both relevant and proactive.

Understanding levels of trust and digital skills across different consumer segments also plays a crucial role in tailoring digital interactions. For consumers with high trust in digital platforms, sophisticated, data-driven personalization can significantly enhance the relevance of offerings. In contrast, for those with lower trust, it becomes crucial to prioritize clarity and security in communications to nurture confidence and comfort in the online environment.

The emphasis on shifting from volume-based to value-driven engagement highlights the need to prioritize the quality and relevance of content over the frequency of advertisements. This strategic shift requires marketers to identify precise stages of the consumer journey to tailor communications effectively, providing value that aligns with the consumer's current needs and expectations. Such a refined approach not only respects consumer boundaries and preferences but also fosters repurchase intentions, contributing to a positive brand perception.

To practically deploy these insights, integrating advanced marketing technologies such as CRM software and online behavior tracking tools is essential. These tools, along with customer feedback mechanisms, yield rich insights into consumer behavior and preferences, facilitating a continuous refinement of marketing strategies. Regular updates and feedback loops are vital for staying competitive in the e-tourism market, ensuring that marketing efforts resonate with consumers and foster a deep, lasting connection.

Overall, by adopting these comprehensive strategies, e-tourism businesses can significantly improve their marketing effectiveness. This approach ensures that campaigns are not only seen but felt by consumers, thereby improving marketing outcomes and creating engaging, culturally aware, and consumer-centric experiences that drive both immediate sales and long-term loyalty. Such strategies position e-tourism companies for sustained growth and a robust competitive advantage in the global marketplace.

The long-term implications of this thesis suggest a trajectory towards more integrated and consumer-responsive digital marketing practices in the e-tourism industry. As digital technologies evolve, the potential for more sophisticated and ethically aligned retargeting strategies becomes apparent. Looking forward, the industry might witness the rise of AI-driven personalization engines that predict consumer preferences with high accuracy while ensuring privacy and ethical compliance. This shift could redefine consumer expectations, pushing marketers to balance personalization with privacy in increasingly innovative ways. Additionally, as global consumer markets become more diverse, the ability to seamlessly integrate cultural aspects into marketing strategies will likely become a critical success factor for e-tourism businesses worldwide. This projection not only underlines the importance of your current findings but also sets the stage for future research and development within the industry, encouraging ongoing innovation and adaptation in digital marketing practices.

## 5.4 Limitations

This research, while providing comprehensive insights into the effects of retargeting ads on post-purchase behavior in the e-tourism sector, faces a primary limitation in its methodology, particularly the use of non-probability sampling. Such a sampling strategy, while practical for online surveys and targeting specific consumer groups with digital behaviors, may not fully ensure the representativeness of the sample, which could influence the generalizability of the findings across the broader population. This methodological choice, driven by the study's focus on consumers who have experienced retargeting ads post-e-tourism purchase, might limit the ability to extrapolate results to all e-tourism consumers or to other sectors.

Further limitations stem from the geographical focus on consumers from specific countries, such as Saudi Arabia and Spain, which, despite providing valuable cultural insights, may not represent

the diversity of global consumer responses to digital marketing practices. The reliance on Hofstede's cultural dimensions, while offering a structured framework for analyzing cultural influences, may not capture the full complexity of evolving cultural identities in the digital age. The study's scope, narrowly centered on retargeting ads, overlooks the potential impact and comparative effectiveness of emerging technologies like AI in shaping personalized advertising strategies. Additionally, the cross-sectional design of the research offers a snapshot of consumer reactions but lacks the longitudinal perspective needed to understand how these behaviors and attitudes might shift over time. Lastly, the focus on retargeting omits an analysis of other digital marketing strategies that could provide a more comprehensive understanding of effective engagement tactics in the e-tourism industry.

## 5.5 Future Research Directions

The convergence of Virtual Reality (VR) and Artificial Intelligence (AI) presents a groundbreaking opportunity for enhancing digital retargeting strategies in the e-tourism sector. Exploring how VR can be used to create immersive retargeting experiences that are dynamically adapted by AI according to real-time consumer interactions and behaviors is an exciting prospect. AI algorithms could analyze data collected from VR experiences to personalize the virtual environment, making promotional content more engaging and contextually relevant. This could include developing prototypes of VR travel experiences that incorporate AI-driven advertisements, testing their effectiveness in a controlled study to measure engagement levels, emotional responses, and subsequent consumer behavior.

In addition to technological innovations, there are other consumer variables that may significantly influence the effectiveness of digital retargeting strategies. Research could explore variables such as environmental consciousness, social influence, and personal values. For example,

assessing how a consumer's environmental awareness affects their response to retargeted ads for eco-friendly travel options could provide new insights. Similarly, understanding the impact of social influence, such as peer opinions or social media trends, could provide insights into how marketers might leverage social proof in retargeting campaigns. Experimental designs could be used to test these variables, offering a deeper understanding of how they interact with marketing messages and influence decision-making processes.

The findings presented in this thesis provide a foundation for further exploration into the intersection of consumer behavior, digital marketing effectiveness, and cultural diversity. Future research should consider investigating the application of emerging technologies such as Artificial Intelligence (AI) and Virtual Reality (VR) within retargeting campaigns. Evaluating their practical implementation and ethical considerations will be crucial. Additionally, broadening the geographic scope of the study to encompass a more diverse array of populations will help to ascertain whether the observed effects are consistent across different cultural and digital contexts. Longitudinal research is also recommended to observe the temporal shifts in consumer perceptions towards retargeting strategies, which would offer a more dynamic understanding of the relationships between consumers and marketers.

Addressing these research gaps can significantly enhance our understanding and develop more effective strategies for engaging consumers, ultimately improving satisfaction within the domain of digital marketing.

## 5.6 Concluding Thoughts

This thesis explored retargeting ads within the e-tourism sector, focusing on the post-purchase consumer behavior and the intricate role of cultural values. Through a series of methodologically rigorous studies, it has uncovered the double-edged nature of retargeting strategies, illustrating

both their potential to enhance initial consumer engagement and the risks they pose in diminishing consumer satisfaction post-purchase. The research has not only extended theoretical frameworks such as the Expectation Confirmation Theory (ECT) into the digital marketing context but also shed light on the significant impact of cultural values on consumer reactions to digital marketing strategies.

The journey through this research has revealed a complex landscape where digital marketing strategies, specifically retargeting, intersect with the diverse tapestry of consumer culture. By delving into the responses of consumers to post-purchase retargeting, influenced by their cultural backgrounds, this thesis contributes a critical perspective to the discourse on digital marketing and consumer behavior. It challenges the one-size-fits-all approach in retargeting practices, advocating for a more culturally sensitive strategy that acknowledges the diversity of consumer bases.

For practitioners in the e-tourism industry, this research offers actionable insights into optimizing retargeting strategies to navigate the complexities of consumer expectations and cultural sensitivities. It underscores the importance of leveraging cultural insights and employing consumer data responsibly to craft retargeting campaigns that resonate with consumers on a deeper level, fostering trust and long-term loyalty.

While the findings from this research enrich our understanding, they also highlight the need for continued exploration into the evolving dynamics of digital marketing, consumer behavior, and cultural influences. The limitations identified serve as a roadmap for future research, pointing to opportunities for expanding our knowledge and refining marketing strategies in the digital age.

In conclusion, this thesis stands as a testament to the critical need for integrating cultural sensitivity into digital marketing practices, particularly retargeting strategies within the e-tourism sector. It emphasizes that the true measure of success in digital marketing lies not just in the ability to drive initial purchases but in creating marketing strategies that respect cultural differences, enhance consumer satisfaction, and build lasting relationships with consumers. As the digital landscape continues to evolve, so must our approaches to understanding and engaging with the global consumer. Through continued research and thoughtful application of its findings, we can aspire to create more inclusive, effective, and culturally attuned digital marketing strategies that celebrate the diversity of the global marketplace.

This thesis contributes to digital marketing and consumer research, offering a foundation upon which future studies can build. It invites scholars and practitioners alike to consider their work's broader implications, question existing paradigms, and continually seek ways to enrich the consumer experience in our increasingly digital world.

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# 7. Appendix A

**Table A1** *Reliability and Validity Criteria.*

| Constructs/items | Factor loadings | 2.50% | 97.50% | Alpha | CR | AVE |
|---|---|---|---|---|---|---|
| Expectations (EC) | | | | 0.906 | 0.941 | 0.842 |
| EC1 | 0.904 | 0.870 | 0.931 | | | |
| EC2 | 0.907 | 0.873 | 0.934 | | | |
| EC3 | 0.941 | 0.924 | 0.956 | | | |
| Satisfaction (ST) | | | | 0.929 | 0.932 | 0.825 |
| ST1 | 0.898 | 0.861 | 0.926 | | | |
| ST2 | 0.901 | 0.864 | 0.930 | | | |
| ST3 | 0.904 | 0.863 | 0.935 | | | |
| ST4 | 0.930 | 0.903 | 0.950 | | | |
| Repurchase intentions (RI) | | | | 0.854 | 0.855 | 0.872 |
| RI1 | 0.931 | 0.903 | 0.951 | | | |
| RI2 | 0.937 | 0.921 | 0.951 | | | |
| Retargeting (RE) | | | | 0.948 | 0.952 | 0.866 |
| RE1 | 0.918 | 0.895 | 0.936 | | | |
| RE2 | 0.928 | 0.908 | 0.942 | | | |
| RE3 | 0.933 | 0.915 | 0.946 | | | |
| RE4 | 0.944 | 0.930 | 0.956 | | | |

**Table A2** *Heterotrait-monotrait Ratios*

| | Value |
|---|---|
| Retargeting -> expectations | 0.415 |
| Repurchase intentions -> expectations | 0.630 |
| Repurchase intentions -> retargeting | 0.125 |
| Satisfaction -> expectations | 0.743 |
| Satisfaction -> repurchase intentions | 0.679 |
| Satisfaction -> retargeting | 0.297 |

**Table A3** *Assessment of Common Method Bias.*

| | Expectations | Repurchase intentions | Retargeting | Satisfaction |
|---|---|---|---|---|
| VIF | 2.074 | 1.696 | 1.177 | 2.190 |

**Table A4** *$R^2$ and PLS predict procedure.*

| Construct | PLS RMSE | LM RMSE | Differences |
|---|---|---|---|
| EC1 | 2.239 | 2.255 | -0.016 |
| EC2 | 2.147 | 2.142 | 0.005 |
| EC3 | 2.090 | 2.094 | -0.004 |
| RI1 | 1.648 | 1.659 | -0.011 |
| RI2 | 1.649 | 1.649 | 0 |
| ST1 | 2.069 | 2.080 | -0.011 |
| ST2 | 2.036 | 2.044 | -0.008 |
| ST3 | 2.109 | 2.108 | 0.001 |
| ST4 | 2.092 | 2.094 | -0.002 |

Repurchase intentions R2 = .370 , Satisfaction R2 = .467

*Note:* EC, expectations confirmation; RI, repurchase intentions; ST, satisfaction.

**Table A5** *MICOM procedure (steps 2 and 3)*

| | | Compositional invariance | | Equality of composite values | | | |
|---|---|---|---|---|---|---|---|
| | | | | Mean values | | Variance values | |
| **Construct** | **Country** | **Score Corr** | **5.00 %** | **Mean Diff** | **2.5-97.5%** | **Variance Diff** | **2.5-97.5%** |
| Expectations Confirmation | Spain vs Saudi Arabia | 1 * | 1 * | 0.043 | [-0.189-0.192]* | -0.077 | [-0.382-0.376]* |
| Repurchase intentions | | 1 * | 0.999 | -0.054 | [-0.194-0.593]* | 0.207 | [-0.376-0.377]* |
| Retargeting | | 1 * | 0.996 | -0.044 | [-0.193-0.194] * | -0.037 | [-0.267-0.259]* |
| Satisfaction | | 1 * | 1 * | -0.002 | [-0.190-0.196] * | -0.096 | [-0.387-0.370]* |

Note: *Confirmed

**Table A6** *Multigroup comparison results (Spain vs Saudi Arbia)*

| | | | | PLS-MGA test |
|---|---|---|---|---|
| | | **Spain** | **Saudi Arabia** | **Spain vs Saudi Arabia** |
| | **Paths** | | | **p-value** |
| Direct effect | Retargeting on expectations | -0.336 | -0.430 | 0.438 |
| | Expectations on satisfaction | 0.693 | 0.680 | 0.903 |
| | Satisfaction on repurchase intentions | 0.599 | 0.622 | 0.726 |
| Indirect effect | Retargeting -> satisfaction | -0.233 | -0.293 | |
| | Retargeting -> repurchase intentions | -0.139 | -0.182 | |

**Table A7** *Moderators' reliability and validity criteria (Spain & Saudi Arabia)*

| Group | Constructs/items | Factor loadings | 2.50% | 97.50% | Alpha | CR | AVE |
|---|---|---|---|---|---|---|---|
| | Trust (T) | | | | 0.892 | 0.933 | 0.822 |
| | T1 | 0.937 | 0.239 | 0.985 | | | |
| | T2 | 0.925 | 0.270 | 0.979 | | | |
| | T3 | 0.877 | 0.304 | 0.982 | | | |
| | Digital Skills (DS) | | | | 0.925 | 0.928 | 0.539 |
| | DS1 | 0.723 | 0.616 | 0.782 | | | |
| | DS2 | 0.753 | 0.617 | 0.818 | | | |
| Spain | DS3 | 0.753 | 0.649 | 0.815 | | | |
| | DS4 | 0.754 | 0.677 | 0.815 | | | |
| | DS5 | 0.726 | 0.603 | 0.797 | | | |
| | DS6 | 0.727 | 0.621 | 0.790 | | | |
| | DS7 | 0.777 | 0.677 | 0.835 | | | |
| | DS8 | 0.713 | 0.564 | 0.786 | | | |
| | DS9 | 0.721 | 0.591 | 0.789 | | | |
| | DS10 | 0.723 | 0.610 | 0.796 | | | |
| | DS11 | 0.703 | 0.575 | 0.774 | | | |
| | Trust (T) | | | | 0.919 | 0.920 | 0.861 |
| | T1 | 0.886 | 0.213 | 0.990 | | | |
| | T2 | 0.948 | 0.339 | 0.984 | | | |
| | T3 | 0.950 | 0.311 | 0.984 | | | |
| | Digital Skills (DS) | | | | 0.930 | 0.938 | 0.580 |
| | DS1 | 0.890 | 0.191 | 0.928 | | | |
| | DS2 | 0.787 | 0.165 | 0.862 | | | |
| Saudi Arabia | DS3 | 0.744 | 0.156 | 0.813 | | | |
| | DS4 | 0.710 | 0.059 | 0.809 | | | |
| | DS5 | 0.758 | 0.123 | 0.831 | | | |
| | DS6 | 0.758 | 0.132 | 0.827 | | | |
| | DS7 | 0.792 | 0.191 | 0.841 | | | |
| | DS8 | 0.704 | 0.058 | 0.796 | | | |
| | DS9 | 0.745 | 0.088 | 0.829 | | | |
| | DS10 | 0.761 | 0.129 | 0.831 | | | |
| | DS11 | 0.708 | 0.063 | 0.805 | | | |
| | DS11 | 0.890 | 0.191 | 0.928 | | | |

**Table A8** *Reliability and Validity Criteria for the Cluster 1.*

| Constructs/items | Factor loadings | 2.50% | 97.50% | Alpha | CR | AVE |
|---|---|---|---|---|---|---|
| Expectations (EC) | | | | 0.902 | 0.907 | 0.836 |
| EC1 | 0.879 | 0.815 | 0.925 | | | |
| EC2 | 0.926 | 0.894 | 0.951 | | | |
| EC3 | 0.938 | 0.908 | 0.959 | | | |
| Satisfaction (ST) | | | | 0.932 | 0.938 | 0.831 |
| ST1 | 0.906 | 0.863 | 0.939 | | | |
| ST2 | 0.92 | 0.875 | 0.95 | | | |
| ST3 | 0.888 | 0.82 | 0.938 | | | |
| ST4 | 0.933 | 0.901 | 0.956 | | | |
| Repurchase intentions (RI) | | | | 0.842 | 0.849 | 0.863 |
| RI1 | 0.921 | 0.872 | 0.952 | | | |
| RI2 | 0.937 | 0.911 | 0.956 | | | |
| Retargeting (RE) | | | | 0.947 | 0.953 | 0.862 |
| RE1 | 0.909 | 0.871 | 0.939 | | | |
| RE2 | 0.925 | 0.889 | 0.948 | | | |
| RE3 | 0.936 | 0.906 | 0.955 | | | |
| RE4 | 0.943 | 0.921 | 0.961 | | | |

**Table A9** *Reliability and Validity Criteria for the Cluster 2.*

| Constructs/items | Factor loadings | 2.50% | 97.50% | Alpha | CR | AVE |
|---|---|---|---|---|---|---|
| Expectations (EC) | | | | 0.902 | 0.907 | 0.837 |
| EC1 | 0.934 | 0.888 | 0.967 | | | |
| EC2 | 0.867 | 0.747 | 0.938 | | | |
| EC3 | 0.942 | 0.917 | 0.965 | | | |
| Satisfaction (ST) | | | | 0.935 | 0.938 | 0.838 |
| ST1 | 0.896 | 0.801 | 0.948 | | | |
| ST2 | 0.906 | 0.824 | 0.952 | | | |
| ST3 | 0.919 | 0.833 | 0.96 | | | |
| ST4 | 0.939 | 0.899 | 0.965 | | | |
| Repurchase intentions (RI) | | | | 0.874 | 0.883 | 0.888 |
| RI1 | 0.949 | 0.924 | 0.97 | | | |
| RI2 | 0.935 | 0.89 | 0.963 | | | |
| Retargeting (RE) | | | | 0.935 | 0.953 | 0.835 |
| RE1 | 0.9 | 0.543 | 0.963 | | | |
| RE2 | 0.903 | 0.516 | 0.964 | | | |
| RE3 | 0.912 | 0.522 | 0.954 | | | |
| RE4 | 0.94 | 0.626 | 0.965 | | | |

**Table A10** *Reliability and Validity Criteria for the Cluster 3.*

| Constructs/items | Factor loadings | 2.50% | 97.50% | Alpha | CR | AVE |
|---|---|---|---|---|---|---|
| Expectations (EC) | | | | 0.908 | 0.910 | 0.845 |
| EC1 | 0.922 | 0.864 | 0.963 | | | |
| EC2 | 0.89 | 0.776 | 0.951 | | | |
| EC3 | 0.945 | 0.902 | 0.967 | | | |
| Satisfaction (ST) | | | | 0.894 | 0.897 | 0.760 |
| ST1 | 0.849 | 0.654 | 0.935 | | | |
| ST2 | 0.828 | 0.677 | 0.919 | | | |
| ST3 | 0.911 | 0.823 | 0.951 | | | |
| ST4 | 0.896 | 0.769 | 0.959 | | | |
| Repurchase intentions (RI) | | | | 0.859 | 0.868 | 0.876 |
| RI1 | 0.928 | 0.807 | 0.965 | | | |
| RI2 | 0.944 | 0.915 | 0.967 | | | |
| Retargeting (RE) | | | | 0.943 | 0.946 | 0.855 |
| RE1 | 0.929 | 0.875 | 0.955 | | | |
| RE2 | 0.926 | 0.87 | 0.955 | | | |
| RE3 | 0.913 | 0.858 | 0.943 | | | |
| RE4 | 0.929 | 0.881 | 0.955 | | | |