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The Impact of Augmented Reality-Based Platforms on Customer Behavioral Responses in Customer Travel

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A B S T R A C T

With the increasing popularity of online shopping, the need for a method that can create a different and innovative perception of a brand in customers' minds is of great importance. Augmented reality (AR) is a novel technology that can play a significant role in the field of online sales. To this end, customers of interior design products and furniture in Tehran were selected as the target population, and a quantitative approach and electronic questionnaire distribution were used to investigate the impact of AR-based platforms on customer behavioral responses in customer travel. The sample size of this study was 288 individuals determined using G*Power software. According to the findings of the article, augmented reality technology has a considerable influence on customers' decisions. When AR-based platforms are used at any point during customer travel, due to the features of this technology, customers' sense of immersion, enjoyment, and interest in the product increases, leading to increased trust in their choices, the perceived usefulness of the platform, and overall positive attitudes. Ultimately, this results in an increased intention to reuse the platform and purchase intention among customers. Therefore, it is recommended that managers of companies involved in the field of interior design products and furniture do not overlook the potential of this technology in their business development.

Keywords: *policy formulation, artificial intelligence, characteristics of artificial intelligence*

1. Introduction

Enhancing customer experience stands as a paramount objective for organizations worldwide. In an increasingly competitive marketplace, business managers are channeling substantial resources into initiatives aimed at delivering superior customer experiences. These efforts are driven by the realization that individuals no longer base their evaluations of a company solely on the products or services it offers, but rather on the totality of their interactions with the brand throughout the customer journey. The customer journey encompasses a series of touchpoints—moments of contact between the consumer and the brand—that significantly shape the overall

experience (Lundin & Kindström, 2023; Rusthollkarhu et al., 2022). Each touchpoint represents an opportunity to create value and distinguish the organization from its competitors, with the cumulative effect determining customer satisfaction, loyalty, and advocacy.

The integration of technology into the customer journey has transformed the landscape of digital marketing, with augmented reality (AR) emerging as a revolutionary tool. AR overlays computer-generated images, texts, and audio onto the real-world environment, thereby allowing users to interact with virtual elements in real time (Sengupta & Cao, 2022). First introduced by Ivan Sutherland in 1966 through the invention of the head-mounted display, AR has gradually evolved from a conceptual innovation to a widely adopted business tool. In recent years, there has been a surge in academic and commercial interest in AR's potential to enhance customer experience. For example, Arghashi and Yuksel (2022) investigated the role of interaction and inspiration in AR platforms, highlighting their importance in creating "flow" experiences that foster positive brand attitudes and customer engagement (Arghashi & Yuksel, 2022). Similarly, Smink et al. (2020) found that AR applications, compared to non-AR ones, significantly enhance users' perceptions of spatial presence and personalization (Smink et al., 2020).

Customer experience is deeply rooted in the foundational work of Abbott, who, as early as 1955, argued that customers are not simply seeking products but are instead in pursuit of satisfying experiences (Kokins et al., 2021). Modern research supports this perspective, indicating that customer experience encompasses emotional, cognitive, sensory, and physical elements, influenced by expectations and interactions at various touchpoints (Terblanche & Kidd, 2021). In the context of digital environments, customer experiences trigger emotional, cognitive, and behavioral responses. When these expectations are unmet, these responses are either muted or negative, highlighting the critical role of effective customer experience management (Flavián et al., 2019; Koronaki et al., 2023).

Defined as a customer's journey over time through various stages of interaction with a company, customer experience includes pre-purchase, purchase, and post-purchase phases (Taheri et al., 2021; Tueanrat et al., 2021). Each stage features multiple touchpoints—moments where the customer connects with the brand—each of which can influence buying behavior either directly or indirectly (Terblanche & Kidd, 2021). These touchpoints range from online advertisements to customer service interactions and product usage, and every single one offers an opportunity to innovate and enhance value. Because individuals' cognitive interpretations differ, the same touchpoint can yield entirely different experiences, making it essential for organizations to personalize and optimize each interaction (Lundin & Kindström, 2023).

The concept of the customer journey has become increasingly important for businesses that strive to align their service offerings with customer expectations (Yachin, 2018). Pre-purchase interactions include need recognition and information search; purchase interactions involve actions like selecting and paying for the product; and post-purchase interactions often encompass product use, feedback, and brand loyalty activities (Koronaki et al., 2023; Rusthollkarhu et al., 2022). Managing this journey effectively entails recognizing the interconnectedness of each stage. A cohesive journey management system ensures consistency and facilitates desired outcomes such as customer retention and positive word-of-mouth (Grewal & Roggeveen, 2020).

Digital transformation has empowered customers to use a variety of technologies in their engagement with brands (Akram et al., 2022). At the same time, companies are leveraging digital platforms to enhance these interactions through new forms of engagement (Cui et al., 2022). AR is particularly promising in this regard, as it offers a fresh layer of interactivity by blending virtual and real-world elements. These AR-enriched experiences are not only engaging but also give users more autonomy and enjoyment in their interactions with digital content (Flavián et al., 2019; Poushneh & Vasquez-Parraga, 2017).

Nonetheless, customer responses to emerging technologies such as AR are not uniform. While many users appreciate the benefits of interactivity and enhanced information, others may initially feel overwhelmed. Over time, as familiarity grows, trust and enjoyment often follow, making it essential for businesses to consider user readiness in the adoption of AR technologies (Tueanrat et al., 2021). Understanding how users engage with these platforms is critical to developing effective marketing and design strategies.

This study narrows its focus to four specific features of AR-based platforms—interaction, system quality, product informativeness, and reality congruence—and examines their impact on customers' affective, cognitive, and behavioral responses. Interaction refers to the extent to which users can manipulate and engage with virtual

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content. This feature enhances immersion, enjoyment, and product liking (Faqih, 2022; Ho et al., 2022; Kowalczuk et al., 2021; Y. Wang et al., 2021; Zanger et al., 2022). Immersion describes a user's sense of being captivated, enjoyment relates to their pleasure in using the system, and product liking reflects their positive evaluation of the virtual item. Collectively, these affective responses shape how consumers emotionally engage with the platform.

System quality, defined as the platform's technical performance and ease of use, significantly influences users' trust, satisfaction, and decision-making efficiency (Ramdani et al., 2022; Tseng et al., 2021). A high-quality AR system enhances both immersion and perceived media usefulness—the latter being a measure of how well the platform helps users achieve their goals (Wu et al., 2021). If users find the system reliable and informative, they are more likely to continue using it and recommend it to others.

Product informativeness is another critical feature, especially in online retail environments where customers often lack the sensory information available in physical stores. AR helps bridge this gap by offering detailed, interactive product visualizations (Kowalczuk et al., 2021; Oyman et al., 2022). Platforms that provide rich and accurate product information enhance cognitive evaluations of usefulness and contribute to more confident decision-making.

Reality congruence—the extent to which virtual representations align with real-world expectations—further enhances users' cognitive responses. When AR presentations closely match reality, users are more likely to trust their judgments and feel confident in their purchase decisions (Guillet et al., 2020; Ramdani et al., 2022). Choice confidence arises from this cognitive alignment, reinforcing the perceived credibility and reliability of the platform.

These affective and cognitive responses collectively influence behavioral outcomes, including attitude, reuse intention, and purchase intention. A positive attitude toward AR applications, formed through immersive and enjoyable experiences, increases the likelihood of continued use (Daassi & Debbabi, 2021; Islam & Hani, 2021). Enjoyment and product liking also drive reuse intentions by making the platform experience more compelling (Lee et al., 2022; H. Y. Wang et al., 2021; Wei et al., 2022). Trust in the platform's informativeness strengthens choice confidence, which in turn supports repeat purchases and brand loyalty (Harborth & Pape, 2021; Verhagen & Bloemers, 2018; Wu et al., 2021).

Despite these advancements, there remains a gap in research exploring AR features across different cultural contexts, including Iran. The present study seeks to fill this void by examining how AR can reshape the customer journey in online interior design and furniture retail. In this sector, a common problem is the misalignment between product dimensions and available home space. AR offers a practical solution by allowing customers to visualize furniture in their actual living spaces, thus facilitating better decision-making and reducing post-purchase dissatisfaction. Moreover, it creates a novel shopping experience that can lead to increased sales and stronger brand loyalty. Unfortunately, many industries in Iran, including interior design and furniture, have yet to fully harness the potential of AR. This study aims to explore how specific features of AR-based platforms—namely interaction, system quality, product informativeness, and reality congruence—affect customer responses across the customer journey.

2. Methods and Materials

The present study is applied in terms of its objective and quantitative in terms of research methodology. In terms of data collection, a descriptive survey method was used, which involved the use of library research methods and field methods such as electronic questionnaires. The target population selected for the study was customers of interior design products and urban furniture in Tehran. The population size is unlimited, and the sample size was calculated to be 288 individuals using G*power software, with a 5% error level, effect size of 0.05, and test power of 90%.

The distributed questionnaire consisted of 48 questions, with questions related to the variable of attitude towards augmented reality adapted from the Daassi and Debbabi

questionnaire (Daassi & Debbabi, 2021), and other variable questions extracted from the Kowalczuk et al. questionnaire (Kowalczuk et al., 2021). After examining and confirming the reliability and validity of the questionnaire, it was distributed electronically. After preprocessing, a total of 257 collected questionnaires were used. Demographic data were analysed using SPSS software, and due to the non-normal distribution of the data, Smart PLS software was used for model testing.

3. Findings and Results

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In the demographic section, 59.7% of the respondents were females, and 40.3% were males. Of this number, 4.2% were under 20 years old, 35.4% were between 20 and 31 years old, 37.8% were between 31 and 42 years old, and 22.6% were over 42 years old. In terms of educational distribution, 1% had less than a high school diploma, 12.9% had a high school diploma, 10.4% had an associate degree, 33.3% had a bachelor's degree, 37.2% had a master's degree, and 5.2% had a doctoral degree. In terms of the number of online purchases per month, 63.2% made less than 5 purchases per month, 31.9% made 5 to 10 purchases per month, 4.5% made 10 to 15 purchases per month, and finally, 0.4% made more than 15 online purchases per month. The sample size adequacy index and sphericity test were also examined and confirmed.

In the inferential statistics section, the measurement model's homogeneity was tested, and as can be seen in Table 1, all factor loadings of the questions were greater than 0.7 and statistically significant.

Table 1

Questions with factor load (Source: (Kowalczuk et al., 2021)).

The measured variable	questions	factor load
Interaction	1- I have the possibility to receive the information of the product I want through the website or mobile application based on augmented reality.	0.848
	2- In my opinion, it is because of the interactive feature of the website or the mobile app based on augmented reality that I can make a decision about choosing a product.	0.816
	3- In my opinion, the website or mobile application based on augmented reality has the ability to respond quickly to my specific needs.	0.846
	4- I have complete control when shopping online on a website or mobile app based on augmented reality.	0.840
System quality	5- I am getting good results from my online shopping process through augmented reality-based website or mobile app.	0.808
	6- I find the functionality of the website or mobile application based on augmented reality to be fast and efficient.	0.736
	7- In my opinion, the website or mobile application based on augmented reality is error-free and accurate.	0.831
	8- I receive full service in the process of online purchase from the website or mobile application based on augmented reality.	0.824
	9- I don't have any problems or limitations when using the website or mobile application based on augmented reality.	0.853
	10- In the process of online shopping from the website or mobile application based on augmented reality, my needs are fully met.	0.814
Product Informativeness	11- In my opinion, the website or mobile application based on augmented reality displays the information that I expect.	0.839
	12- In my opinion, the augmented reality-based website or mobile app provides accurate product details.	0.826
	13- In my opinion, the website or mobile application based on augmented reality provides complete information about the product.	0.856
	14- The information provided by the website or mobile application based on augmented reality helps me make decisions.	0.799
	15- In my opinion, the website or mobile application based on augmented reality has provided information for comparing products.	0.834
Reality Congruence	16- In my opinion, the way virtual products are presented by a website or a mobile application based on augmented reality is admirable.	0.868
	17- In general, I find the presentation of virtual products on the website or mobile application based on augmented reality eye-catching and attractive.	0.859
	18- In my opinion, the design of virtual products on the website or mobile application based on augmented reality is beautiful.	0.859
	19- In my opinion, in the website or mobile application based on augmented reality, the products are presented with visual appeal.	0.832
	20- In my opinion, the website or mobile application based on augmented reality has designed the colors and shapes of the products realistically.	0.798
	21- In my opinion, a website or mobile application based on augmented reality presents virtual products in a way that makes them look like they are real.	0.770
Immersion	22- I am deeply immersed in what I am doing when using an augmented reality-based website or mobile app.	0.872

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	23- I get deeply involved in the augmented reality website or mobile app I use.	0.904
	24- All my attention is focused on what I am doing when using an augmented reality-based website or mobile app.	0.876
Enjoy	25- I find it enjoyable to use a website or mobile application based on augmented reality.	0.888
	26- I like to use a website or a mobile application based on augmented reality.	0.884
	27- Using a website or mobile application based on augmented reality entertains me.	0.865
Product Liking	28- In my opinion, products are better displayed on a website or mobile application based on augmented reality than on other platforms.	0.859
	29- In my opinion, the products on the website or mobile application based on augmented reality are more beautiful than on other platforms.	0.909
	30- In my opinion, the products on the website or mobile application based on augmented reality are more likeable than on other platforms.	0.901
Attitude towards augmented reality	31- I recommend everyone to buy from the website or mobile application based on augmented reality.	0.880
	32- In my opinion, it is better to use the website or mobile application based on augmented reality to buy the products I want.	0.874
	33- In general, I rate the website or mobile application based on augmented reality as good and complete.	0.865
Media Usefulness	34- I have a better ability to choose products on a website or mobile app based on augmented reality.	0.860
	35- Using a website or a mobile application based on augmented reality saves my time.	0.778
	36- In my opinion, a website or mobile application based on augmented reality improves the quality of product search.	0.837
	37- I can get product information faster on the website or mobile application based on augmented reality.	0.839
	38- In general, I find an augmented reality-based website or mobile app useful in my shopping experience.	0.822
Choice Confidence	39- I am satisfied with the selection of my desired product through the website or mobile application based on augmented reality.	0.869
	40- I am confident that the product I selected through the website or mobile app based on augmented reality is exactly what I wanted.	0.935
	41- The product I selected through the website or the augmented reality mobile app is definitely what I want.	0.911
Reuse Intention	42- I intend to use the augmented reality-based website or mobile app again	0.921
	43- I anticipate using the augmented reality website or mobile app again.	0.937
	44- I plan to use the augmented reality-based website or mobile app again in the future.	0.926
Purchase Intention	45- I buy the product I want only through the website or mobile application based on augmented reality.	0.727
	46- It seems that I will buy the product I want through a website or a mobile application based on augmented reality.	0.881
	47- There is a possibility that I will buy the desired product through a website or a mobile application based on augmented reality.	0.901
	48- It is possible for me to buy my desired product through a website or a mobile application based on augmented reality.	0.857

To measure reliability, Cronbach's alpha tests, composite reliability, shared reliability and homogenous reliability index were performed. The convergent validity of the measurement model was also checked with the extracted mean-variance test, and the results of these tests can be seen in Table 2.

Table 2

Reliability and convergent validity of the measurement model

Variable	Alpha greater than 0.7	CR greater than 0.7	Rho-a greater than 0.7	AVE greater than 0.5	CR>AVE
Interaction	0.858	0.904	0.858	0.701	Confirmed
System quality	0.869	0.920	0.897	0.659	Confirmed
Product Informativeness	0.888	0.918	0.890	0.690	Confirmed
Reality Congruence	0.910	0.931	0.912	0.692	Confirmed
Immersion	0.860	0.915	0.864	0.782	Confirmed
Enjoy	0.853	0.911	0.854	0.773	Confirmed
Product Liking	0.868	0.919	0.872	0.792	Confirmed

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Attitude towards augmented reality	0.844	0.906	0.845	0.763	Confirmed
Media Usefulness	0.885	0.916	0.888	0.685	Confirmed
Choice Confidence	0.889	0.932	0.890	0.820	Confirmed
Reuse Intention	0.919	0.949	0.920	0.861	Confirmed
Purchase Intention	0.863	0.908	0.871	0.713	Confirmed

In the test of convergent validity, there is convergent validity when the factor loading of each question for its corresponding variable is at least 0.1 higher than the factor loading of the same question for other variables. In the Fornell-Larcker test, when there is divergent validity, the squared shared reliability of each variable should be greater than the highest correlation of that variable with other variables. The multi-trait, multi-method test is also a new method for calculating divergent validity, and an appropriate threshold for this index is less than 0.9. Based on the results of these tests in Table 3 and Table 4, the present study demonstrates divergent validity. The variables are summarized as interaction (IN), system quality (QS), Product Informativeness (PI), Reality Congruence (RC), immersion (IM), enjoy (EJ), product liking (PL), attitude towards augmented reality (AT), media usefulness (MU), choice confidence (CC), reuse intention (RU), and purchase intention (PIN).

Table 3

Fornell-Larcker results in order to investigate divergent validity

	IN	QS	PI	RC	IM	EJ	PL	AT	MU	CC	RU	PIN
IN	0.837											
QS	0.671	0.812										
PI	0.714	0.679	0.831									
RC	0.719	0.634	0.715	0.832								
IM	0.700	0.629	0.672	0.638	0.884							
EJ	0.667	0.498	0.579	0.576	0.693	0.879						
PL	0.704	0.626	0.629	0.566	0.626	0.629	0.890					
AT	0.666	0.659	0.635	0.576	0.692	0.640	0.728	0.873				
MU	0.675	0.639	0.678	0.700	0.616	0.631	0.643	0.633	0.828			
CC	0.700	0.672	0.677	0.644	0.709	0.622	0.665	0.727	0.672	0.905		
RU	0.626	0.624	0.594	0.619	0.638	0.659	0.640	0.719	0.757	0.713	0.928	
PIN	0.616	0.592	0.604	0.605	0.629	0.616	0.677	0.642	0.662	0.704	0.739	0844

Table 4

Multi-trait-multi-method results to examine divergent validity

	CC	IN	PI	PL	IM	RU	PIN	EJ	MU	AT	RC	QS
CC												
IN	0.802											
PI	0.764	0.819										
PL	0.757	0.814	0.714									
IM	0.809	0.813	0.769	0.723								
RU	0.788	0.703	0.656	0.717	0.717							
PIN	0.803	0.717	0.688	0.780	0.729	0.829						
EJ	0.714	0.778	0.664	0.728	0.806	0.743	0.717					
MU	0.753	0.775	0.760	0.730	0.702	0.833	0.752	0.722				

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AT	0.838	0.780	0.732	0.850	0.810	0.816	0.753	0.753	0.725		
RU	0.715	0.813	0.795	0.635	0.719	0.675	0.681	0.652	0.780	0.655	
QS	0.752	0.764	0.762	0.709	0.713	0.684	0.669	0.565	0.708	0.756	0.701

In the end, the quality of the measurement model was evaluated with three values of 0.02, 0.15, and 0.35, indicating weak, moderate, and strong predictive power, respectively, and it was assessed as very strong for all variables .In the structural model section, we examined the significance tests and the strength of the hypotheses. The results of the hypothesis tests can be observed in Table 5 and Figure 1. In the next stage, the determination coefficient for the endogenous variables was evaluated. The value of this coefficient can be assessed as weak, moderate, and strong with three values of 0.19, 0.33, and 0.67, respectively. The results of this test are also visible in Table 6.

Table 5

Research hypotheses test

Row	assumptions	Path coefficient	T-Value	P-Value	Result
1	Interaction affects immersion.	0.506	7.490	.	confirmation
2	Interaction affects enjoyment.	0.356	4.940	.	confirmation
3	Interaction affects product liking	0.704	18.421	.	confirmation
4	The quality of the system affects the immersion.	0.290	4.646	.	confirmation
5	The quality of the system affects the media usefulness.	0.229	3.744	.	confirmation
6	Product informativeness affects the media usefulness.	0.258	3.007	0.003	confirmation
7	Reality congruence effect on the media usefulness.	0.370	4.161	.	confirmation
8	Reality congruence effect on choice confidence.	0.261	3.760	.	confirmation
9	Immersion affects the attitude towards augmented reality.	0.692	16.815	.	confirmation
10	Immersion affects enjoyment.	0.443	7.062	.	confirmation
11	Enjoyment influences reuse intention.	0.167	2.331	0.020	confirmation
12	product liking affects choice confidence.	0.344	4.614	.	confirmation
13	Attitude towards augmented reality has an effect on reuse intention.	0.334	4.912	.	confirmation
14	Media usefulness affects the intention to reuse.	0.440	5.579	.	confirmation
15	Media usefulness affects the choice confidence.	0.268	3.761	.	confirmation
16	Choice confidence affects purchase intention.	0.704	15.624	.	confirmation

Table 6

The value of the coefficient of determination

Variable	R^2
Choice Confidence	0.572
Product liking	0.494
Immersion	0.533
Reuse intention	0.680

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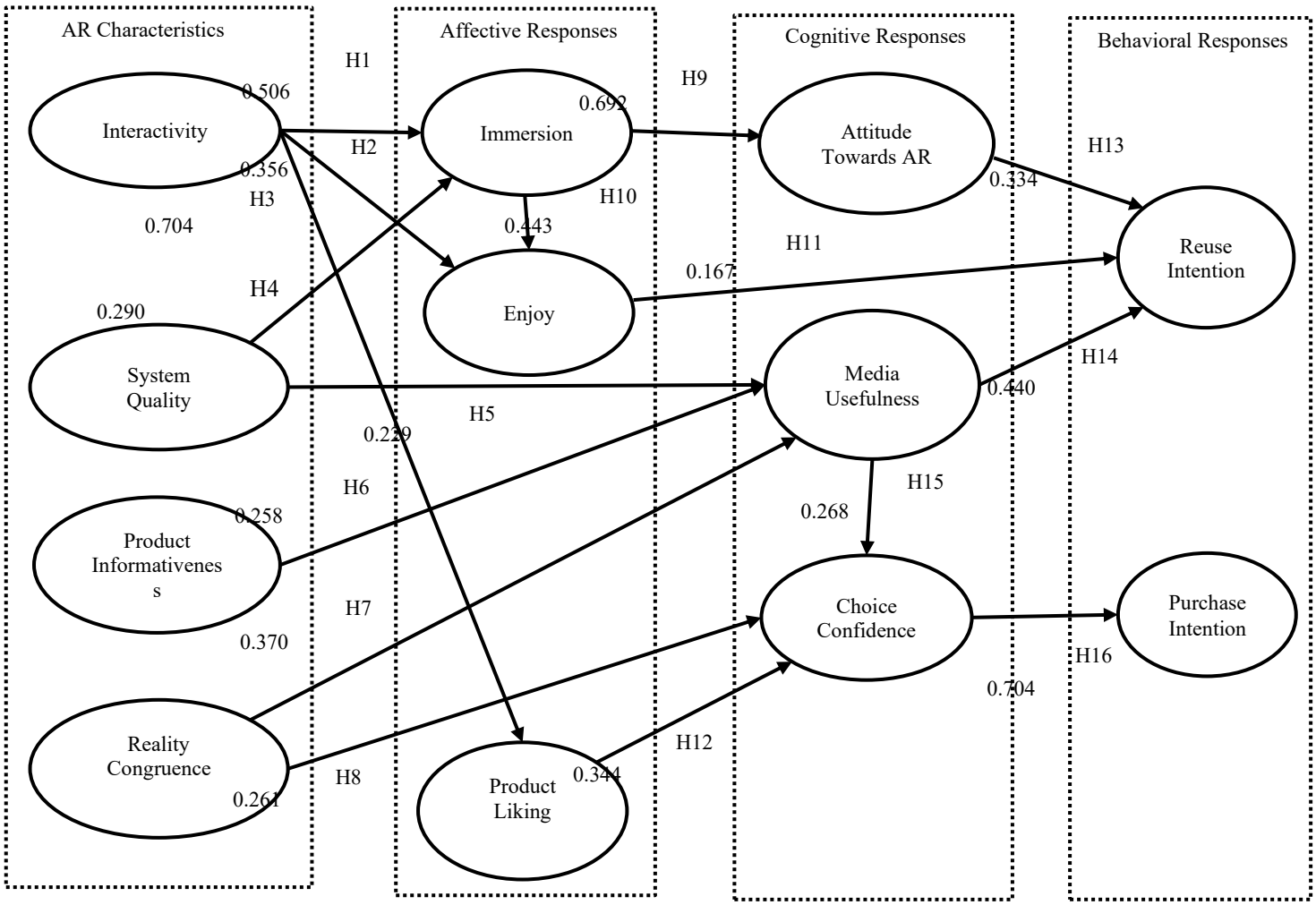
Purchase intention	0.493
Enjoy	0.541
Media usefulness	0.575
Attitude towards augmented reality	0.477

Figure 1

Hypothesis test results



The quality of the structural model was also examined using the goodness-of-fit index, which applies only to the endogenous variables of the model. The value of this index is evaluated as weak, moderate, and strong with values of 0.02, 0.15, and 0.35, respectively. In this study, the quality of the structural model is strong for all endogenous variables. Finally, the result of the goodness-of-fit test for assessing the overall model fit in this study was evaluated as strong with a value of 0.637. The result of the standardized root means square residual test in this study, with a value of 0.050, is also acceptable.

4. Discussion and Conclusion

The purpose of this study was to investigate how features of augmented reality (AR)-based platforms influence affective, cognitive, and behavioral responses throughout the customer journey. The research model proposed and tested sixteen hypotheses, all of which were supported by the empirical results. These findings shed light on the significant role that AR characteristics—namely interaction, system quality, product informativeness, and reality congruence—play in shaping

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the customer experience in the context of online shopping for interior design and furniture.

The findings demonstrated that interaction significantly affects immersion, enjoyment, and product liking. These results align with previous literature emphasizing the interactive nature of AR platforms in enhancing customer affective responses. According to Ho (2022), user interactivity with virtual objects strengthens mental imagery and intensifies immersion in the shopping process (Ho et al., 2022). Similarly, Wang et al. (2021) concluded that when users can manipulate and personalize their experience, their engagement increases markedly (Y. Wang et al., 2021). The current study reinforces these claims by showing that interaction not only boosts user immersion ($\beta = 0.506$, $p < 0.001$) but also enjoyment ($\beta = 0.356$, $p < 0.001$) and product liking ($\beta = 0.704$, $p < 0.001$). These outcomes suggest that facilitating interactive features in AR apps can effectively create enjoyable, emotionally rich experiences, which are vital for consumer decision-making and retention.

Moreover, system quality was shown to significantly influence immersion and media usefulness, corroborating prior studies that highlight system performance as a critical determinant of user trust and satisfaction (Tseng et al., 2021). The study found a strong effect of system quality on immersion ($\beta = 0.290$, $p < 0.001$), consistent with Kowalczuk et al. (2021), who noted that seamless and efficient systems enhance users' psychological involvement with digital interfaces (Kowalczuk et al., 2021). In parallel, the positive effect on media usefulness ($\beta = 0.229$, $p < 0.001$) supports Ramdani et al.'s (2022) finding that users perceive high-performing systems as more beneficial and trustworthy in helping them reach their goals (Ramdani et al., 2022).

The study also verified that product informativeness significantly contributes to media usefulness, with a moderate path coefficient ($\beta = 0.258$, $p = 0.003$). In alignment with Oyman (2022), who identified informativeness as a critical driver of AR's value proposition in mobile retail environments (Oyman et al., 2022), the current results affirm that AR tools rich in product detail help customers better understand, compare, and evaluate items. This is particularly relevant in the furniture sector, where visual and dimensional accuracy is crucial.

Reality congruence emerged as a critical feature that influences both media usefulness ($\beta = 0.370$, $p < 0.001$) and choice confidence ($\beta = 0.261$, $p < 0.001$). These results are consistent with Ramdani et al. (2022), who argue that realistic visual representation improves functional perception and decision-making (Ramdani et al., 2022). Additionally, this supports the findings of Guillet (2020), who noted that congruent virtual experiences reduce ambiguity and increase consumer trust (Guillet et al., 2020). As such, realism in AR design should be a top priority for developers aiming to enhance perceived authenticity and customer confidence.

In the realm of cognitive-affective linkages, immersion was found to significantly affect both attitude towards AR ($\beta = 0.692$, $p < 0.001$) and enjoyment ($\beta = 0.443$, $p < 0.001$). These findings reinforce the theoretical claims of Daassi and Debbabi (2021), who posited that deep involvement with digital environments enhances attitude and subsequent engagement (Daassi & Debbabi, 2021). The pleasure derived from immersive experiences also validates the assumptions of Faqih (2022) and Zanger et al. (2022), who emphasized enjoyment as a catalyst for consumer technology adoption (Faqih, 2022; Zanger et al., 2022).

Additionally, product liking positively influenced choice confidence ($\beta = 0.344$, $p < 0.001$), echoing the findings of Verhagen and Bloemers (2018), who identified liking as a precursor to belief formation and trust in consumer choice (Verhagen & Bloemers, 2018). In turn, attitude towards AR ($\beta = 0.334$, $p < 0.001$), enjoyment ($\beta = 0.167$, $p = 0.020$), and media usefulness ($\beta = 0.440$, $p < 0.001$) all significantly impacted reuse intention. These paths are substantiated by Wu et al. (2021) and Harborth and Pape (2021), who established that positive attitudes and perceived usefulness promote continued application use and loyalty (Harborth & Pape, 2021; Wu et al., 2021).

Furthermore, media usefulness also significantly affected choice confidence ($\beta = 0.268$, $p < 0.001$), reinforcing its dual role as both a cognitive enhancer and a behavioral motivator. Lastly, choice confidence had the most substantial direct effect on purchase intention ($\beta = 0.704$, $p < 0.001$), underscoring its central role in final decision-making. This validates Kowalczuk et al. (2021), who identified confidence as a key outcome of well-designed AR features (Kowalczuk et al., 2021).

Collectively, these findings offer robust empirical support for the proposed theoretical framework, confirming the cascading influence of AR platform characteristics on users' affective states, cognitive evaluations, and ultimately, their behavioral intentions. The strong R^2 values across key endogenous variables (e.g., reuse intention =

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0.680, immersion = 0.533, media usefulness = 0.575) demonstrate the explanatory power of the model.

Despite the strengths of this research, several limitations should be acknowledged. First, the study was geographically limited to Tehran, Iran, which may restrict the generalizability of the findings to other cultural or economic contexts. Consumer responses to AR technologies can be influenced by regional digital literacy, cultural openness to technology, and trust in online retail systems. Second, the study relied solely on self-reported data collected via online questionnaires, which may be prone to common method bias and social desirability effects. Third, the study focused specifically on the furniture and interior design sector, meaning the results may not be directly applicable to other product categories with differing levels of customer involvement or tactile importance, such as food or fashion. Fourth, the cross-sectional nature of the study does not allow for analysis of changes in user behavior over time, such as long-term effects of AR use on loyalty or actual purchasing behavior. Finally, the study examined only four features of AR-based platforms, whereas other potentially influential characteristics—such as sensory feedback, gamification, and social interactivity—were not included.

Future research could broaden the scope by replicating this study across diverse geographic regions and industries to test the cross-cultural validity and sector-specific adaptability of the model. Longitudinal studies are recommended to track behavioral outcomes over time, providing insight into sustained engagement and actual purchase patterns. Moreover, experimental or quasi-experimental designs could enhance causal inference by manipulating AR features and measuring their direct effects on customer responses. Incorporating qualitative methods, such as in-depth interviews or eye-tracking analyses, would offer deeper insights into users' experiential narratives and unconscious behaviors during AR interaction. Additionally, future models should consider the role of moderating variables such as age, gender, prior experience with AR, or device type, as these factors may shape user perceptions and behaviors. Finally, examining emerging AR features, including augmented audio, gesture-based navigation, or integration with social commerce platforms, would offer a more comprehensive understanding of the technology's evolving role in customer experience design.

To capitalize on the value of AR technology in customer journey management, companies in the interior design and furniture sector should prioritize the development of interactive AR features that allow users to visualize, modify, and personalize products in real time. Ensuring high system quality—fast load times, responsive design, and error-free operation—is essential to foster immersion and trust. Developers should focus on enhancing reality congruence by designing hyper-realistic product renderings and incorporating accurate spatial mapping to match customers' physical environments. Additionally, AR applications should deliver detailed, accessible product information to support informed decision-making and reduce post-purchase dissonance. Marketing teams should emphasize the enjoyable and immersive aspects of AR use in promotional content to increase adoption. Finally, organizations should incorporate AR into multiple touchpoints across the customer journey, from pre-purchase exploration to post-purchase engagement, to create a seamless and memorable brand experience.

Authors' Contributions

Authors equally contribute to this study.

Declaration

In order to correct and improve the academic writing of our paper, we have used the language model ChatGPT.

Transparency Statement

Data are available for research purposes upon reasonable request to the corresponding author.

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Declaration of Interest

The authors report no conflict of interest.

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Ethics Considerations

The study protocol adhered to the principles outlined in the Helsinki Declaration, which provides guidelines for ethical research involving human participants.

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