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Multidimensional interdisciplinary variables influencing tourist online purchasing intention at World Heritage City (City of Yazd, Iran)

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Abstract

This study identifies the influence of interdisciplinary variables on tourist online purchasing intention, such as consumers' online purchasing experience, novelty-seeking behavior, perceived ease of use, risk taking, tourism service and destination characteristics. The study population includes international tourists who purchased Yazd sightseeing tours. Using convenience sampling, 386 visitors were chosen to complete the variable scale questionnaire. The data were analyzed using Smart-PLS and SPSS software. Results indicated that "prior experience," "ease of use," "risk taking", and "novelty-seeking behavior" have a direct and meaningful effect on "online purchasing attitude" and have an indirect effect on "tourist online purchasing intention" with the mediating role of online purchasing attitudes. Furthermore, "tourism services and destination characteristics" and online purchasing attitudes directly and significantly affect tourists' online purchasing intentions. Moving between disciplines improves the quality of industry-relevant research and makes it more practical and valuable. The identified interdisciplinary variables influencing tourists' online purchasing intentions are valuable for the destination marketing of World Heritage Cities.

Keywords Experience of purchasing online · Novelty-seeking · Perceived ease of use · Risk taking · Tourism services and destination characteristics · Tourist online purchasing intention

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Introduction

Tourism destinations compete with one another to be distinguished and strive to provide unique experiences for visitors (Najjarzadeh et al. 2022). Meanwhile, destination marketing has always been essential for developing tourism destinations (Breda et al. 2006). In recent years, the proliferation of the Internet of Things and social media has changed how companies and suppliers engage with and reach out to their customers. This rapid expansion of marketing channels offers unrivaled brand awareness-building opportunities (Godey et al. 2016). Furthermore, as information and smartphone technology have advanced, consumers' experiences of sharing information on social media have changed (Wu et al. 2017). Different factors shape intentions toward purchasing online. Novelty-seeking is an individual's essential characteristic, defined as the drive to seek out novel stimuli, and is strongly associated with human attitudes (Hirschman 1980). Like novelty-seeking, perceived ease of use is regarded as a significant individual belief that encourages consumer adoption and utilization of technologies.

On the one hand, individuals face risk when a decision, action, or behavior can result in various potential outcomes, which is essential to comprehend how internet consumers make decisions (Hasan and Rahim 2008). On the other hand, online purchasing may depend on the quality of the consumer experience, which can be obtained through prior purchases and influences subsequent purchases (Mohseni et al. 2018). In addition, products and services have a variety of characteristics that serve as crucial indicators of how they are perceived and evaluated (Jacoby et al.1971).

World heritage cities are excellent examples of tourism destinations' unique and distinguishing characteristics, playing a vital role as pull factors for visitor arrivals, contributing to the competitiveness of the destination (Mariani and Guizzardi 2020). Yazd, located in the center of Iran in West Asia, has been the last city designated a UNESCO World Heritage Site since 2017 (UNESCO 2017). This site includes the city's historic core, known for its distinctive adobe architecture and pre-Islamic settlement (3000 BC) (Rastegar et al. 2021). Therefore, proper international online destination marketing efforts are required for the city of Yazd, one of the leading tourism destinations in Iran. In this regard, destination managers and policymakers must know the influential variables that impact international tourists' intentions to purchase online.

Several studies have examined the factors influencing tourists' intentions to purchase online. For example, Facebook and social media's impact on digital consumer purchases have been the main subjects of previous research (Yang 2012). Other researchers have revealed the impact of brand and brand-forming factors (Ju and Koo 2014), user psychological characteristics (San Martín and Herrero 2012), website quality factors (Punnasuparom and Choibamroong 2020), perceived usefulness and trust (Jin et al. 2020), etc. on tourists' online purchasing intentions. However, few studies examined variables such as "risk taking," "prior experience," "perceived ease of use," "novelty-seeking," "online purchasing attitude," and "services and destination characteristics" concerning tourists'

intentions to purchase online. Therefore, considering the significance of tourism destination marketing for World Heritage Cities, this study examines the effect of the mentioned variables on tourists' intention to make online purchases. This allows destination marketers to develop appropriate strategies to sell the online products and services offered by World Heritage Cities.

Literature review

Consumer experience

De Keyser et al. (2015) define the consumer experience as a multidimensional construct based on various market actors' cognitive, emotional, physical, sensory, and social responses. The consumer experience provided by innovative retailers is being altered through virtual reality applications, enabling shoppers to interact with different touchpoints in an innovative way (Diemer et al. 2015). The customer experience is also based on a consumer's level of satisfaction, trust, and commitment following a purchase (Lemon and Verhoef 2016). This can be accomplished by employing various online and offline touchpoints that provide a customized customer experience at various stages of the purchase journey (Kumar et al. 2016). Kumar et al. (2016) pointed out that touchpoints could be either customer-initiated (such as checking online reviews about a specific restaurant) or firm-initiated (such as content or promotions available online or on websites). It is suggested that:

H1: Experience has an indirect effect on tourists' online purchasing intention.

Novelty-seeking

Novelty-seeking is a curiosity drive that opposes the desire for familiarity, which is the degree of contrast between present perception and previous experience (Som and Badarneh 2011). Novelty-seeking in tourism is believed to be innate (Sthapit et al. 2021) and has been shown to play an integral role in the choice of destinations (Feng and Jang 2004). It is a broad personality trait marked by a proclivity for impulsive responses and exploratory behavior in pursuing novel and rewarding stimuli (Bidwell et al. 2015). It is strongly related to human attitudes (Hirschman 1980). This definition is based on the understanding that travelers want to try something new or unique. According to Crompton (1979) and Petrick (2002), novelty-seeking is a crucial element of a tourist's motivation to travel and influences the tourist's decision-making. Previous research has examined whether the novelty-seeking trait translates into individual differences in tourist behavior (e.g., Lee and Crompton 1992; Goodrich et al. 1995; Van Trijp et al. 1996; Correia et al. 2008). Specific novelty-seeking in tourism is a significant determinant of travel preferences (Assaker and Hallak 2013) and tourist behavior (e.g., Basala and Klenosky 2001). Therefore, the following hypothesis is suggested:

H2: Novelty-seeking behavior has a significant effect on tourist online purchasing intention.

Perceived ease of use

According to Davis (1989), perceived ease of use is the degree to which a person believes the system requires little or no mental effort. Ease of use can also be described as a consumer's perception of a product, specifically when the product or service is simple to learn and use, reducing the burden on memory and increasing satisfaction. E-commerce retailing requires, as part of its important quality characteristics, the usability of a mobile app and the clarity of its functions and navigation (Campbell-Grossman et al. 2018). Prior research has shown that the effect of perceived behavioral control on consumers' intention to use social networks for financial transactions is significantly amplified by ease of use (Hansen et al. 2018). Therefore, the following hypothesis can be proposed:

H3: Perceived ease of use indirectly affects tourists' online purchasing intention.

IoT risk taking

Knowledge of IoT risks may be gained through personal experience with breaches or malfunctions of IoT devices. As many consumers can attest, IoT devices can behave inconsistently with their expected use (Liptak 2017). Big Data's value might lead mobile app developers to gather more personal data from users than they disclose in their privacy policies, which might mislead users. Moreover, the collected data is often not adequately protected and exposes individuals to the potential risks associated with social engineering (Wijesekera et al. 2015). Personal losses sustained from realized IoT risks and knowledge of the losses sustained by others via media, education, social contacts, etc., heighten consumers' awareness of IoT risks and encourage a more critical evaluation of IoT devices. 66% of IT professionals consider the risk associated with online devices to be the primary barrier to adoption within their organizations. (Gilchrist 2017). It is suggested that:

H4: Risk has an indirect effect on tourist online purchasing intention.

Attitude toward buying online

Attitude consensus is a central concept in multiple rigid-body systems, intended to bring all rigid-body agents to the same attitude (Zhang et al. 2018). Online group buying (OGB) has gained significant popularity globally (Edelman et al. 2011). By sharing information, resources, and/or knowledge embedded within social networks, consumers promote the same interests and trust and engage in online purchasing to receive attractive incentives and price discounts (Pappas 2016). Studies on online purchasing behavior are deemed necessary as it is attributable to the growth of e-commerce, which bridges customer relations and marketing strategy (Close and

Kukar- Kinney 2010). Aspects of perceived risks (Hong and Cha 2013), novelty-seeking behavior (Assaker et al. 2011), perceived ease of use (Hansen et al. 2018), and experience of online purchasing (De Keyser et al. 2015), can influence e-commerce since these variables correlate with the long-term sustainability of e-retailers. It is essential to investigate the determinants of consumers' attitudes toward an online purchase, particularly regarding risks, novelty-seeking behavior, perceived ease of use, and buying experience. Therefore, the following hypothesis can be proposed:

> **H5**: Attitude toward online purchasing directly affects tourists' online purchasing intention.

Tourism destination characteristics

Two approaches are closely linked to the conceptualization of destination products, stepping away from the conceptual background of basic marketing theories: complementary and substitute products (Kotler et al. 2017). The first category recognizes that each destination offers unique products that can potentially complement one another to attract tourists with diverse vacation interests or motivations. The substitute category contains products with comparable attributes. Visitors can substitute one destination for another in their choice sets. Regardless of their inherent differences, destinations with either product category can participate in cross-border cooperative marketing programs. Research on repeat visits has also revealed a correlation between the safety and stability of a destination and tourists' intentions to return (Alegre and Cladera 2006). Understanding tourists' destination choices is essential to developing efficient tourism policies and strategies. In the literature, it is widely acknowledged that choosing a tourist destination is a complex process that is influenced by many factors, such as motivation (Battour et al. 2017), visit experience (Masiero and Qiu 2018), and, most importantly, destination image (Zhang et al. 2018). It is suggested that:

> **H6:** Tourism destination characteristic directly affects tourist online purchasing intention.

Tourism service characteristics

There are inherent challenges in defining and classifying services, including tourism. This is partly due to the difficulties in identifying, measuring, and evaluating intangible aspects of services. Intangible characteristics include the attitude and knowledge of sales representatives, customer service representatives, the timeliness of communication, and response to service failures (Hirata 2019). Marketing has evolved due to the traditional dichotomy between services and products. Many manufacturers emphasize the added service they provide in support of their products; conversely, service providers are attempting to provide more tangible aspects of their products. Second, the advancement of information and communication technologies has the potential to "… alleviate the applicability of most

of the IHIP (intangibility, heterogeneity, inseparability, and perishability) service characteristics" (Moeller 2009). It is suggested that:

H7: Tourism service characteristics directly affect tourist online purchasing intention.

Tourist online purchasing intention

Online purchasing intention refers to an individual's propensity to purchase a product or service through the Internet and is frequently used to determine customers' actual purchasing behavior (Kamalul Ariffin et al. 2018). Besides, purchasing behavior affects consumers' efforts and is essential to predict it (Kim 2018). Nowadays, online influencers, whether personal or service, and destination characteristics have a new role in marketing. The perceived attractiveness of influencers influences purchasing intentions. As a result, tourism destinations can use online communication channels for promotional activities to present the features of a destination and its products and services, create and strengthen the brand image, and inspire the idea of a superior experience in the minds of travelers, influencing them to choose the destination (Makian 2022). Businesses' marketing strategies have changed in the era of social media, from promoting customers to make purchases in-store to encouraging a more interesting and beneficial relationship. This is significant since it is a common and influential source of information for tourists seeking destination-specific information (Khan and Abir 2022). Therefore, tourism marketers need to pay more attention to social networking sites and online platforms to capitalize on opportunities to influence consumers' purchasing intentions. The conceptual model for this research, based on the proposed hypotheses, is presented in Fig. 1.

Fig. 1 Research conceptual model
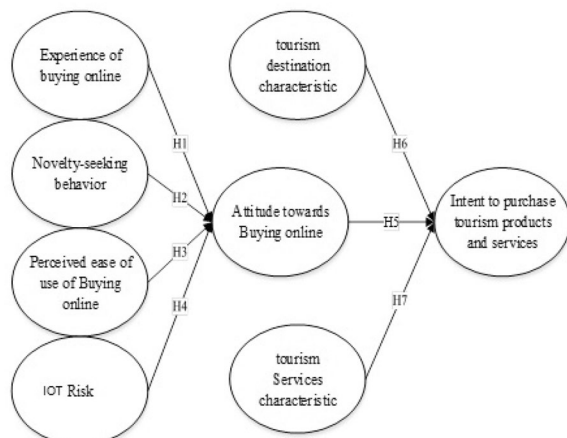
Research method

Statistical community and sampling method

The study's statistical population includes all international tourists who purchased the Yazd tour package. According to Cochran's formula (Krejcie and Morgan 1970), at a confidence level of 95%, the minimum sample is equal to 384 based on an unlimited population. In this regard, using the convenience sampling method, 386 tourists were chosen. The study's data were collected between September 2019 and February 2020, before the coronavirus outbreak in Iran. Questionnaires in English were distributed to international tourists visiting Yazd tourist sites, such as the historical context, Daulat Abad Garden, Jame Mosque, Atshakdeh, and Zoroastrian crypt.

Measurement tools

A standard questionnaire based on five Likert scales was used to collect data. In addition, to ensure the validity of measurement scales, Cronbach's alpha value was calculated, as shown in Table 1. The accepted value of Cronbach's alpha is 0.7 indicating acceptable reliability for the measurement scales. SPSS and Smart-PLS software were used to assess the validity and reliability of the research measurement model. The composite reliability criterion (CR) was introduced by Werts et al. (1974). The optimal value of this criterion is greater than or equal to 0.7. According to Table 1, the CR value for each structure is higher than 0.7, indicating appropriate internal stability for the measurement model. Convergent validity, on the other hand, is the first validity studied to confirm the validity of measurement models. It means that the set of references explains the main structure. Fornell and Larker (1981) suggest using the average variance extracted (AVE) as a measure of convergent validity. AVE values greater than 0.5 indicate that the measurement model is valid (Hair et al. 2011). Structured equation modeling (SEM) was used for data analysis. The normality of the variables was investigated by the Kolmogorov–Smirnov test (K–S). Since some variables were non-normal, the PLS method was applied for SEM.

Furthermore, the variance of the inflation (VIF) index was used to detect the presence of alignment in this study. The variance inflation factor evaluates the severity of multiple lines in a normal regression analysis. This index indicates how much the change in the estimated coefficients for alignment has increased. To examine the discriminant validity, the degree of relationship between a structure and its characteristics compared to the relationship of that structure with other structures is shown by the Fornell–Larcker matrix. To calculate this matrix, the square root of the AVE of the latent variables in the present study, which are located in the original diameter of the matrix, must be greater than the correlation value of those located in the lower and left cells of the original diameter (Fornell and Larcker 1981).

Table 1 Constructs and measuring items

Items	λ	Ave	Composite reliability	Cronbach alpha	VIF
Experience in online purchasing (EOP)	–	0.725 Park and Kang (2003)	0.808	0.799	–
The website is known for its quality	0/718				1.708
I have prior experience purchasing online	0/804				1.689
I have good experience purchasing online	0/916				1.658
I am comfortable purchasing online	0/758				1.638
I recommend my good experience of purchasing online	0/704				1.450
I am satisfied with purchasing online	0/709				1.337
Novelty-seeking behavior (NSB)	–	0.785 Assaker ans Hallak (2013)	0.878	0.805	–
I am satisfied with discovering new things	0/848				2.469
I am pleased to visit new places	0/850				1.815
I am always looking forward to new things and places	0/793				1.698
I like to experience new things	0/774				1.777
I am seeking to meet new people	0/821				1.809
Perceived ease of use of purchasing online (PEUPO)	–	0/658 Ramayah and Ignatius (2005)	0.724	0.708	–
I always choose the simple way of buying	0/731				2.130
Buying online is not complex for me	0/838				1.789
I am interested in simple and practical buying from software and websites	0/722				2.112
I value the ease of use of applications and websites	0/785				1.985
I often choose online buying because of its simplicity	0/744				2.231
I am always looking for a simple solution to my problem	0/775				1.965
Risk (R)	–	0.605 Kamalul Ariffin et al. (2018)	0.789	0.745	–
When I buy online, I have the impression that someone is misusing my personal information	0/819				2.032
Online purchasing takes a long time to choose and receive	0/756				2.456

Table 1 (continued)

Items	λ	Ave	Composite reliability	Cronbach alpha	VIF
The goods or services you buy and receive might differ in buying online	0.729				2.021
It might be a fake or exaggerated advertisement for buying online	0.738				2.758
It is possible that all product/service information is not mentioned in online purchasing	0.789				2.125
Attitude toward Buying online (ATBO)	–	0.715 Kamalul Ariffin et al. (2018)	0.890	0.817	–
I think buying online is the better way of purchasing	0.763				1.387
I think by buying online, I save time	0.768				2.021
I think by buying online, I will save money	0.785				1.487
I think by buying online, I can have more options to choose from	0.785				1.787
I think by buying online, I can compare my options	0.793				1.562
I think by buying online, I can be informed about the availability of my needs	0.788				1.458
Tourism destination characteristic (TDC)	–	0.635 Beerli and Martín (2004)	0.733	0.704	–
Destination characteristics are important for me in choosing my destination	0.806				1.328
I chose my destination where I could have the information about it	0.723				1.555
I chose my destination, which has the same climate as my home town	0.811				1.485
I chose my destination, which has the same language for communication	0.799				1.228
I choose my destination, which has the same tradition and culture as my home	0.745				1.377
I choose an affordable and cheap destination	0.767				1.598
Tourism Services characteristic (TSC)	–	0.596 Beerli and Martín (2004)	0.759	0.769	–
It's important to me who (which brand) provides service for me	0.839				1.411
I choose services that are more tangible and affordable	0.827				1.632
I choose services that others recommend to me	0.766				1.304
I choose services that present well enough information about it	0.758				1.498
I choose services that are appropriate to my time and scheme	0.746				1.325

Table 1 (continued)

Items	λ	Ave	Composite reliability	Cronbach alpha	VIF
I choose services which I know their operator	0.733				1.390
Intention to purchase tourism products and services (IPTPS)	–	0.628	0.810	0.790	–
Most of the time, I buy tourism services and products online	0.825	Nunkoo and Ramkissoon (2013)			2.120
Often I recommend a good website to others for buying their tourism needs	0.731				2.365
If I need tourism services, I go to the previous websites I purchased from	0.774				2.222
In the future, I will buy all my tourism services and products online	0.846				1.417
Website and application is my first option for buying tourism needs	0.731				1.811
I review websites and apps for my probable future tourism needs	0.722				1.425

Data analysis

Statistical Package for the Social Sciences (SPSS V22) and Linear Structural Relations (Smart-PLS) software were used for data analysis. Structural hypothesized relationships between the test path analysis model and the fit index of the final model were reported. To assess the indices and validity of the model, Cronbach's alpha and composite reliability were used. In Table 2, the results of reliability and convergent validity are presented.

Finding

Participants' demographic information

Women represented 27.5% of respondents, followed by men representing 72.5%. With 210 individuals (54.4%), the age group of 40–31 years had the most participants. The group of 60–51 years old (5.4%) has the lowest total frequency. The majority of participants in this study, 169 (43.8%), held a bachelor's degree, while 14 held post-graduate degrees (3.6%) (see Table 3).

Relationship between research variables

The indices obtained in the PLS software show the fitness quality. In this regard, these indices are numbers between one and zero. A value closer to one and greater than 0.5 indicates a good and complete fit. The general criterion for the least-squares method is considered; this criterion is called Goodness of Fit (GOF). Results are presented in Table 4.

In this study, the relative index is higher than the absolute index. The results show that the goodness index value depends more on the internal than the outer model. As

Table 2 Discriminant validity

Research variables	1	2	3	4	5	6	7	8
1. Experience in online purchasing	0.851							
2. Novelty-seeking behavior	0.687	0.886						
3. Perceived ease of use of purchasing online	0.568	0.768	0.811					
4. Risk	0.429	0.590	0.677	0.777				
5. Attitude toward purchasing online	0.389	0.405	0.569	0.594	0.845			
6. Tourism destination characteristics	0.570	0.308	0.455	0.438	0.724	0.796		
7. Tourism services characteristics	0.516	0.416	0.412	0.330	0.602	0.627	0.772	
8. Intent to purchase online tourism products and services	0.428	0.364	0.388	0.248	0.544	0.433	0.537	0.792

Table 3 Descriptive statistics

Demographical variables		F. percent	Frequency
Gender	Women	27/5	106
	Men	72/5	280
Education level	Diploma	9/1	35
	Associate degree	3/6	14
	Bachelor	43/8	169
	Master	38/1	147
	Ph.D	5/4	21
Age	21–30	32/9	127
	31–40	54/4	210
	41–50	7/3	28
	51–60	5/4	21
Marital status	Single	34/5	133
	Married	65/5	253
Occupation	Student	3/6	14
	Public employee	21/8	84
	Private employee	29/3	113
	Freelancer	45/3	175

Table 4 Fitness Indices of Model

Type of indices	Model indices quantity
Absolute index	0/678
Relative index	0/694
Outer model index	0/722
Internal model index	0/824

shown in Table 4, the internal model index is 0/824. Hence, it can be concluded that the study model is appropriate.

The path coefficients in Fig. 2 represent the intensity of the relationship. The numbers in the endogenous variable circles represent the amount of R^2 that demonstrates the influence of independent variables on a dependent variable. Moreover, numbers on the arrows of latent variables indicate the factor loads. The first test evaluated path coefficients and factor loads at a meaningful level of 0.95. Variable factor loads greater than 0.7 are acceptable. This indicates that the correlation coefficient of the apparent variables in the estimation of the latent variable is related to their ability and thus indicates that the validity of the model structure is accepted.

The number determined by the arrows in Fig. 3 represents the *T* value. We tested the hypothesis at a reliability level of 95% and a large, equal absolute value of 1.96, indicating a significant relationship between the variables.
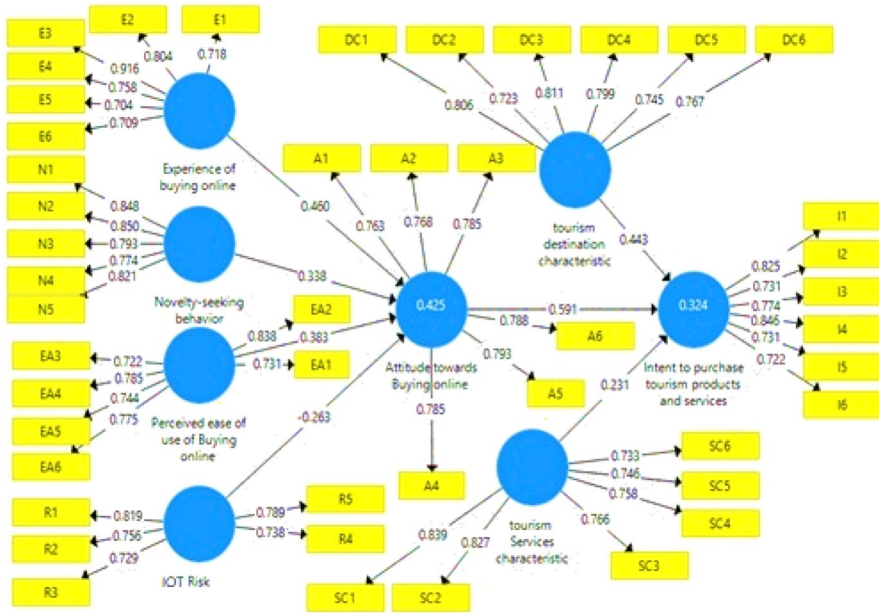
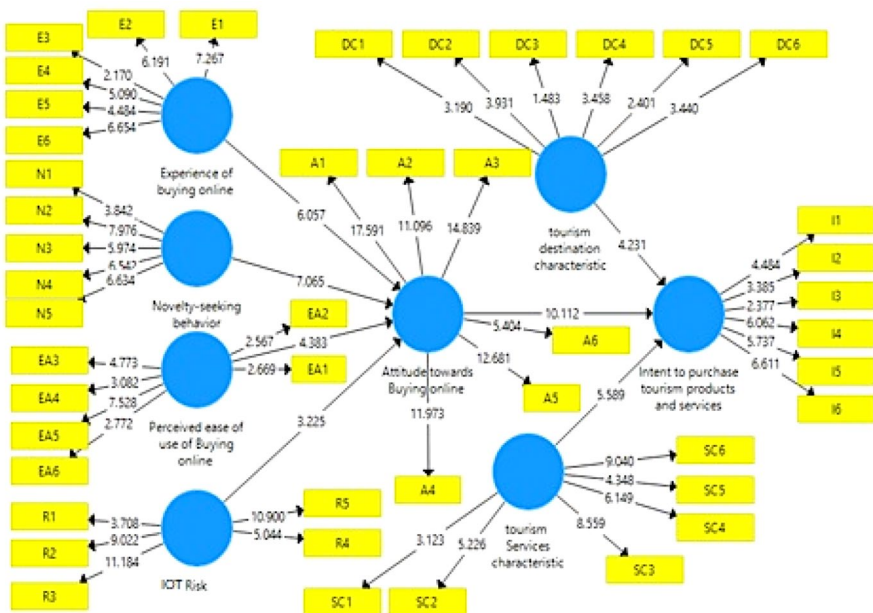**Fig. 2** Path coefficients and factor loads of the research model

Fig. 3 Structural model and significance value

Table 5 Results of the blindfolding test

Research variables	1-SSE/SSO
Attitude toward buying online	0/2849
Intent to purchase tourism products and services	0/3567

Table 6 Hypothesized path according to the Beta coefficient

Hypothesized paths			β	
Attitude toward Buying online	➲	Intent to purchase tourism products and services	0.591	**Strongest**
Experience of buying online	➲	Attitude toward Buying online	0.460	
tourism destination characteristic	➲	Intent to purchase tourism products and services	0.443	
Perceived ease of use of Buying online	➲	Attitude toward Buying online	0.383	
Novelty-seeking behavior	➲	Attitude toward Buying online	0.338	
Risk	➲	Attitude toward Buying online	-0.263	
tourism Services characteristic	➲	Intent to purchase tourism products and services	0.231	**Weakest**

In the next step, the blindfolding test was implemented based on the amount of Q^2, and the validity of the structural parameters of the path model was investigated. Q^2 indicates the predictive relevance of the path model for this specific construct. The Q^2 values are shown in Table 5, indicating that they are greater than zero. This shows that the general policy analysis structure and model variables have significant validity. In addition, the value for the two endogenous variables is more than 0.15, meaning that the independent variables are reliable predictors of dependent variables (Henseler et al. 2009) and a good fit for the research's structural model.

In PLSR, the "beta" values are the regression coefficients that can be multiplied by your X data to give you your predicted Y data. This can indicate how strongly each x variable contributes to each latent variable. Table 6 is adjusted according to the beta value.

The study's approval criteria are based on the T statistic, which must be greater than 1.96. The results of the analysis of the hypotheses are presented in Table 7.

Table 7 Statistical results of the structural model

Hypothesized paths			B	T value	Results
Experience in online purchasing	→	Attitude toward online purchasing	0.460	6.057	✓ Supported
Novelty-seeking behavior	→	Attitude toward online purchasing	0.338	7.065	✓ Supported
Perceived ease of use of online purchasing	→	Attitude toward online purchasing	0.383	4.383	✓ Supported
IoT risk taking	→	Attitude toward online purchasing	−0.263	3.225	✓ Supported
Attitude toward online purchasing	→	The intent for online purchasing of tourism products and services	0.591	10.112	✓ Supported
Tourism destination characteristics	→	The intent for online purchasing of tourism products and services	0.443	4.231	✓ Supported
Tourism service characteristics	→	The intent for online purchasing of tourism products and services	0.231	5.589	✓ Supported

Discussion

This study investigated the effect of interdisciplinary variables, such as purchasing experience, novelty-seeking behavior, perceived ease of use, IoT risk taking, and tourism service and destination characteristics, on the online purchasing intentions of tourists. According to the research findings, prior experience has a direct and significant effect on online purchasing attitudes and an indirect effect on tourist online purchase intention with a T value of 6.057, the same as Kumar et al. (2016) research findings. Novelty-seeking behavior with a T value of 7.065 was shown to have a direct and meaningful effect on online purchasing attitude and an indirect effect on tourist online purchasing intentions, which is similar to Lee and Crompton 1992; Goodrich et al. 1995; Van Trijp et al.1996 findings. Also, perceived ease of use directly influences online buying attitudes and indirectly affects tourist purchase intention, with a T value of 4.383. This finding is similar to Hansen et al. (2018) research findings. With a T value of 3.225, IoT risk directly influences attitudes toward attitudes. Gilchrist (2017) found that IoT risk indirectly affects tourists' online purchase intentions and is considered the primary barrier to consumers' adoption of online retail. Tourism service and destination characteristics, with a T value of 5.589 and 4.231, respectively, indicate a strong and direct influence on tourists' online purchasing intentions. Finally, the online purchasing attitude has the strongest and most direct effect on tourist buying intention, with a T value of 10.112. Although having an online purchasing attitude has the greatest influence on tourist online purchase intentions, tourism services and destination characteristics also play an important role in tourist behavior and online purchase intentions. All findings supported all hypotheses, as well as previous research in various disciplines concerning these variables.

Conclusion and study's implications

The findings of this study provide a comprehensive and multidisciplinary perspective on tourists' online purchasing intention, as well as the variables that significantly influence tourists' behavior in the tourism and hospitality industries. When managing or marketing a tourism destination or product/service, decision-makers and policymakers must consider multiple aspects. Modern marketing efforts contribute to a destination's competitive identity to gain market share (Nematpour et al. 2022). Meanwhile, in this changing and evolving era, having a product- or service-oriented marketing approach or simply relying on consumer behavior cannot achieve desired results and success in tourism destination marketing. As a result, marketing executives require a bilateral or multilateral approach that considers service or destination characteristics, consumer behavior and marketing tools. This makes the findings of this study applicable to destinations with World Heritage City designations, such as Yazd.

According to the significant relationship between novelty-seeking behavior and tourist intention (Kim and Kim 2015), marketers must determine the target market of international tourists wishing to explore Yazd's novel and hidden attractions. In this sense, a destination that provides new products and services can provide a novel experience due to its specific geographical characteristics, different cultural background, special shopping opportunities, different language, new foods, and distinctive leisure activities (Weaver et al. 2009). On the other hand, tourists are less likely to buy online if IoT risks are high. So, it is suggested that destination marketing managers provide a precise and secure gate for online purchasing (e.g., an official destination website), preparing multiple and simple ways for tourists to learn about and select their tourism products and services. This is because the usefulness of online information and perceived ease of use positively influence tourists' behavioral intentions (Marasco et al. 2018).

In addition, regarding the beneficial influence of prior experience on tourist online purchasing intention, tourism service providers and destination managers can shape and represent visitors' positive experiences by asking them to write about them on websites and social media platforms. This may be the most effective way to create a valuable experience for potential visitors. In this regard, the role of user-generated content is significant for the City of Yazd because online content is a primary source of information about various geographical features, such as cities, towns, and local attractions, and has a significant influence on tourists' expectations regarding their destination of choice (Ana et al. 2013). Additionally, destination managers must provide high-quality, cost-effective, and valuable services, focusing on developing Yazd-specific services and describing them clearly on online platforms to attract potential tourists. These studies and findings greatly benefit future destination marketing and planning because they allow future purchase intentions to be predicted. This facilitates tourism destinations' marketing efforts, including product and service providers, by determining the factors influencing tourists' intentions to purchase online.

Limitations and future research

There are some limitations to the study's model. Firstly, the online purchasing intention of tourists is influenced by numerous factors. Only six variables were considered in this study, while other potential influences were ignored. Therefore, researchers are encouraged to consider additional factors in future studies. In addition, research has been conducted regarding Yazd's incoming tourists. The results cannot be generalized to other cities in other regions or countries; therefore, future research can examine this study's model in other cities with a world heritage designation.

Author contributions MRAZ: data analysis, writing and original draft preparation; SM: software, validation, reviewing and editing; MN: conceptualization, methodology, writing, reviewing and editing.

Data availability Data generated and analyzed during the study are available upon reasonable request from the corresponding author.

Code availability Not applicable.

Declarations

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