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## Makale Adı/Article Name

Investigation Of Online Purchasing Behavior According To Different Generations With Technology Acceptance Model\*\*\*

Teknoloji Kabul Modeli ile Farklı Nesillere Göre Çevrimiçi Satın Alma Davranısının İncelenmesi

#### ÖZ

Bu çalışmanın temel amacı, X, Y ve Z kuşağı tüketicileri bağlamında internetten satın alma niyetini Tüketici Teknoloji Kabul Modeli çerçevesinde karşılaştırmalı olarak incelemektir. Bu çalışma nicel bir desende çalışılmış ve Mersin ilinde kolayda örnekleme yöntemi ile belirlenen 661 tüketici üzerinde yürütülmüştür. Elde edilen veriler ile normallik ve sapma analizleri, geçerlilik ve güvenilirlik analizleri ve faktör analizleri yapılmıştır. Belirlenen hipotezleri test etmek için yapısal eşitlik modellemesi kullanılmış ve tüm analizler SPSS 24.0 ve AMOS 23.0 paket programları kullanılarak gerçekleştirilmiştir. Çalışma kapsamında ele alınan X, Y ve Z kuşaklarında yer alan bireyler, ait oldukları kuşaklara bağlı olarak farklı özellikler gösterebilmektedir. Satın alma davranışına ilişkin alışkanlıkları ve algıları farklılaşabilen kuşakların teknolojik yenilikleri benimseme konusunda da farklılaşacağı öngörüsü araştırmadan elde edilen sonuçlara göre doğrulanmıştır. Bu çalışmanın temel kısıtlarından biri kolayda örnekleme yoluyla toplanmış olmasıdır. Diğeri ise çalışmada hedef kuşak yaş gruplarına ulaşılmasıdır. Bu araştırmanın yönetsel katkısı, internet satın alma araçlarının sadece kullanım kolaylığı ve kullanışlılığa dayalı olarak tasarlanmaması ve yeniliğin kabul düzeyini daha doğru değerlendirmek için pazar araştırması sırasında duygusal boyutların hedef pazar ve hedef tüketici grupları (X, Y ve Z kuşağı) ile birlikte değerlendirilmesi gerektiğidir. Literatür analizine göre, tüketici teknoloji kabul modelinin kuşaklar arasındaki ilişkisini inceleyen bir çalışmaya rastlanmamıştır. Bu araştırmanın amacı, tüketici teknolojisi kabul modeli ile kuşaklar arasındaki ilişkiyi inceleyerek literatüre katkıda bulunmak ve tüketici davranışlarında daha genel bir kavramsal temel sağlamaktır.

Anahtar Kelimeler: Tüketici Teknoloji Kabul Modeli, Tüketici Davranışı, Algılanan Kullanışlılık, Satın Alma, İnternet Pazarlaması, Online Alısveris

#### **ABSTRACT**

The main aim of this study is to comparatively examine the intention to purchase online in the context of Generation X, Y and Z consumers within the framework of the Consumer Technology Acceptance Model. This study was studied in a quantitative pattern and was conducted for 661 consumers in Mersin province, determined by convenience sampling method. Normality and deviation analyses, validity and reliability analyses, and factor analyzes were conducted with the data obtained. Structural equation modeling was used to test the determined hypotheses, and all analyzes were carried out using SPSS 24.0 and AMOS 23.0 software packages. Individuals in the generations X, Y and Z discussed within the scope of the study may show different characteristics depending on the generations they belong to. The prediction that generations whose habits and perceptions regarding purchasing behavior may differ will differ in terms of adopting technological innovations has been confirmed according to the results obtained from the research. One of the main limitations of this study is that it was collected through convenience sampling. The other is to reach the target generation age groups in the study. The managerial contribution of this research is that internet purchasing tools should not be designed solely based on ease of use and usefulness and emotional dimensions should be evaluated together with the target market and target consumer groups (Generation X, Y and Z) during market research to more accurately assess the level of acceptance of the innovation. According to literature analysis, no study was found examining the relationship between the generations of the consumer technology acceptance model. The aim of this research is to add to the literature by examining the relationship between generations with the consumer technology acceptance model and to provide a more general conceptual basis in consumer behavior.

Keywords: Consumer Technology Acceptance Model, Consumer Behavior, Perceived Usefulness, Purchasing, Internet Marketing, Online Shopping.

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Bu çalışma "İnternet üzerinden satın alma niyetinin tüketici teknoloji kabul modeli ile araştırılması; kuşaklar arasındaki ilişkiler üzerine bir araştırma"adlı doktora tezinden türetilmiştir. Bu çalışma için Aksaray Üniversitesi İnsan Araştırmaları Etik Kurulu'nun 25.10.2021 tarih ve 07-18 sayılı kararı uyarınca Etik Kurul onayı alınmıştır.

## Introduction

It is known that the most important factor in the transition to the information society is technological developments (Lindgren, Jedbratt &Svensson, 2002). The existence of information and communication technologies lies behind the changes that humanity has witnessed, especially since the twentieth century (Barutçu, 2010). With these developments affecting the whole world, it can be said that internet technologies, computers and online communication have become a normal part of people's lives.

Increasing internet use along with the digitalization process has caused radical transformations in businesses, as in many areas. It has offered new opportunities in various business activities, especially communicating with consumers, collecting data for the relevant market, and product promotion and sales (Basu & Muylle, 2003). Nowadays, internet technologies are used extensively in business life. With the impact of technological innovations, the traditional ways of doing business have changed and there has been an increase in companies continuing their commercial activities via the internet (Özmen, 2013). Thus, the business volume in online shopping is gradually increasing as not only businesses but also consumers prefer online tools for shopping (Turban, King & Leevd, 2015).

The widespread use of online shopping experience increases the tendency towards consumers who engage in this experience because the adoption of new technologies by consumers can be affected by several factors. In the relevant literature on this subject, the Unified Theory of Technology Acceptance and Use (Venkatesh et al., 2003), which examines consumers' adoption and acceptance of newly developing technologies, the Decomposed Theory of Planned Behavior (Taylor & Todd, 1995), the Technology Acceptance Model (Davis, 1989), the Theory of Diffusion of Innovations (Rogers, 1983), the Theory of Planned Behavior (Ajzen, 1985), the Theory of Reasoned Behavior (Fishbein & Ajzen, 1975) and the Consumer Technology Acceptance Model (Kulviwat et al., 2007) etc. various theories and models exist.

The focus of research on technology acceptance has been on the implementation and use of new information technologies in the workplace (Davis, 1989; Venkatesh et al., 2003). However, over the years, consumer acceptance of high-technology products and services for productive or hedonic purposes has received less research attention. The researches done by Childers et al., (2001), Shih (2004), Kulviwat et al., (2007), Lam et al., (2008), Nasco et al., (2008b), Nasco et al., (2008a), Ko et al., (2009), Oh et al., (2009) Ferreira et al., (2014) can be cited as examples.

Unlike previous research, Kulviwat et al. (2007) focused on multiple emotions that may affect consumers' adoption of new technologies. This study is a pioneering study in which emotions are fully included in the Technology Acceptance Model. Kulviwat et al. (2007) developed the Consumer Technology Acceptance Model (CAT) to justify the need for a model that encompasses the broad range of emotional responses that consumers may experience as they develop their adoption intentions. In the Consumer Technology Acceptance Model developed to replace the Technology Acceptance Model, Kulviwat et al. (2007) used Mehrabian & Russell's (1974) Pleasure, Arousal, Dominance-Emotional State Model (PAD).

The Technology Acceptance Model was developed to understand employee acceptance of new technology. This model is suitable for an organizational context where cognition is emphasized more, users have little choice in decision making and adoption is mandatory. However, it is inadequate in that users have the freedom to adopt or reject based on how they feel and think (Kulviwat, 2007).

Mehrabian and Russell's (1974) theory argues that emotional reactions to the physical and social environment can be achieved through three emotional dimensions, namely pleasure, arousal, and dominance. Researchers have argued that an emotional state can be considered as locations in the three dimensions mentioned above, and that various combinations of these can adequately represent people's emotional reactions. In short, these three dimensions (pleasure, arousal, and dominance) describe the emotions that affect a person's behavior.

Kulviwat et al. (2007) used the Technology Acceptance Model (Davis, 1989) and the Emotional State Model (Mehrabian & Russell, 1974) in the Consumer Technology Acceptance Model they developed. The developed model (CAT) took into account emotions that were neglected in other technology adoption models.

Within the scope of this study, consumers' online purchasing intentions will be examined with In addition, in the study, based on the view that individuals grouped at certain year intervals and in the same groups, as stated in the generation class theory, will have similar attitudes, behaviors and thoughts, the characteristics of Generation X, Y and Z were included as control variables in the model established to scale the online purchasing intention. In the research model, the relationship between online purchasing intentions for consumers of generation X, Y and Z was examined in the framework of the Consumer Technology Acceptance Model (CAT) developed by Kulviwat et al.

## 1. Literature Review and Hypothesis Development

The concept of technology acceptance first emerged from Davis's (1989) work based on Fishbein and Ajzen's (1975) theory of reasoned action. The aim of this model is to provide an explanation of the determinants of adoption for a wide range of technological innovations to be applied to their usage behavior (Davis, Bagozzi & Warshaw, 1989). This model proves that an individual's behavioral intention to adopt a piece of technology is determined by their attitude toward using the technology (Davis, 1989). Additionally, perceived usefulness and ease of use have been suggested as determinants of attitude.

This model was developed to understand employee acceptance of new technology, and most research using the model has focused on the cognition aspect rather than affect. This emphasis on cognition may be appropriate for an organizational context where adoption is imperative and users have little choice regarding the decision. However, it is an inadequate explanation for consumer contexts where potential users are free to adopt or reject a new technology depending on how they feel and think (Kulviwat et al., 2007). The main focus of studies on technology acceptance is on the implementation and use of new information technologies in the workplace (Venkatesh et al., 2003). However, over the years, the acceptance of high-technology products and services by consumers for productive or hedonic purposes has received less research attention (Childers et al., 2001; Shih, 2004; Kulviwat et al., 2007; Lam et al., 2008; Nasco et al., 2008b; Ko et al., 2009; Oh et al., 2009; Ferreira et al., 2014). In the study conducted by Childers et al. (2001), it was concluded that both hedonic and utilitarian motivations are effective in the process of shopping in online retail. The researchers found that in addition to utilitarian motivation, pleasure is a strong predictor of attitude towards interactive shopping. This result is consistent with the study by Dabholkar and Bagozzi (2002) using the Technology Acceptance Model, which used intrinsic motivation, entertainment, and was found to have a significant effect on technology-based selfservice acceptance. However, none of these studies have fully tested the Technology Acceptance Model. The study by Childers et al. (2001) did not include adoption intention in their research.

Bruner and Kumar (2005) included all components of the Technology Acceptance Model and an entertainment variable in their study. The researchers found that entertainment has a direct effect on attitude and this effect is more than one and a half times the effect of cognition on attitude towards using a technology product. Although the entertainment and pleasure aspects are prominent in the study, there are many different emotions that consumers can experience when they consider adopting high-tech innovations (Kulviwat et al., 2007). Mick and Fournier (1998) argued that technology can trigger both positive and negative emotions. For example, positively; consumers can be pleasantly surprised, excited and confident when considering technology adoption, while negatively; people can be angry, worried or afraid. The specific emotions a consumer may have regarding technology adoption may vary depending on the person and the situation in which the adoption takes place. It can be thought that technology readiness, perceived as an individual characteristic, will also be effective in consumers' acceptance of new technologies (Parasuraman, 2000)

In contrast to previous research, Kulviwat et al. (2007) focused on multiple emotions that may affect consumers' adoption of new technologies. This study is an important and pioneering study in which emotions are fully included in the Technology Acceptance Model. As a result of this study, a model that includes a wide range of emotional responses that consumers may experience while developing their adoption intentions has been developed (CAT). In the Consumer Technology Acceptance Model developed to replace the Technology Acceptance Model, Kulviwat et al. (2007) used Mehrabian & Russell's (1974) Pleasure, Arousal, Dominance-Emotional State Model (PAD).

Mehrabian and Russell's (1974) theory, based on environmental psychology, states that all emotional responses to the physical and social environment can be captured by three emotional dimensions: pleasure, arousal, and dominance. According to researchers, these dimensions or their combinations express people's emotional states or reactions. Pleasure is the degree to which a person experiences a pleasant response to a stimulus, and examples of positive emotions that are strongly associated with this dimension include happiness and contentment. Arousal is a combination of mental alertness and physical activity that a person feels in response to stimuli, and excitement is a basic emotion in this dimension. Dominance is the degree to which an individual feels control over a stimulus or is controlled by it. Emotions can range from courage and bravery at one end to anger and fear at the other (Kulviwat et al., 2007). The Affective State Model has been frequently used in marketing research to measure emotional responses to environmental stimuli. It has been used in retail settings as online shopping pleasure (Koufaris, 2002), consumer responses to store atmosphere (Donovan & Rossiter, 1982; Donovan, Marcoolyn, & Nesdale, 1994), emotions evoked by television commercials (Holbrook & Batra, 1987), product-consumption experiences (Donovan & Rossiter, 1982; Donovan, Marcoolyn, & Nesdale, 1982), and other marketing contexts (Halvena & Holbrook, 1986).

In the Consumer Technology Acceptance Model developed by Kulviwat et al. (2007), Technology Acceptance Model (Davis, 1989) and Emotional State Model (Mehrabian and Russell, 1974) were used. The developed model (CAT) takes into account the emotions that are neglected in other technology adoption models. This model developed by Kulviwat et al. (2007) was also used within the scope of this study. The general purpose is to examine the technology adoption levels of consumers in generations X, Y and Z comparatively. The Consumer Technology Acceptance Model was taken as a basis in the development of the research hypotheses and model.

#### 1.1. Perceived Usefulness

Perceived usefulness is defined as the degree to which people believe that technology will increase their productivity or job performance (Davis, Bagozzi, & Warshaw, 1989). For the consumer, perceived usefulness is the perception that using the technology will be useful for performing a task, that is, it is related to the functional outcome perceived as a result of using the technology. Within the scope of the Technology Acceptance Model, studies have generally shown that perceived usefulness is a strong determinant of user acceptance and usage behavior (Davis, 1989; Mathieson, 1991; Taylor & Todd, 1995). It has been concluded that perceived usefulness is the most important factor in workplaces regarding technology acceptance and is even more important than perceived ease of use (Davis, 1989; Hu et al., 1999). In addition, positive and significant relationships were found between perceived usefulness and attitudes towards the use of new technologies (Childers et al., 2001; Gentry & Calantone, 2002; Bruner & Kumar, 2005; Kulviwat et al., 2007). In addition, it has been observed that mobile internet contributes to the development of positive attitudes on using products (Bruner & Kumar, 2005; Lee, Kim & Chung, 2003). In the study conducted by Ferreira et al. (2013), it was concluded that there is a relationship between perceived usefulness and attitude towards use. As a result, it is expected that the perceived usefulness of online purchasing will positively affect the attitude towards use. Based on the above discussion, we propose the following hypothesis;

H1. Perceived usefulness will have a direct positive impact on the attitude towards the adoption of online purchasing.

#### 1.2. Perceived Ease of Use

Perceived ease of use is defined as the degree to which a person believes that using technology will be simple (Davis, Bagozzi, & Warshaw, 1989). It varies according to the person's effort and learning to use technology, and perceived ease of use is an important condition in terms of acceptance, adoption of a new situation (Lin, Shih, & Sher, 2007; Venkatesh, 1999) and use (Davis, Bagozzi, & Warshaw, 1989). Research has shown that perceived ease of use has a direct effect on attitudes towards adopting technology use, as well as an indirect effect in terms of perceived usefulness (Davis et al., 1989; Venkatesh, 1999; Oh et al., 2009). The direct effect is related to the fact that ease of use positively and significantly affects adoption even without considering the benefits provided by the technology, while the indirect effect is related to the fact that technologies that are easier to use are naturally perceived as more useful, which makes the attitude towards use positive and increases the intention to adopt (Davis et al., 1989). Studies have also found that perceived ease of use has a direct positive effect on attitude (Childers et al., 2001; Dabholkar & Bagozzi, 2002; Gentry & Calantone, 2002; Dimitriadis & Kyrezis, 2010; Oh et al., 2009; Ferreira et al., 2013). Considering the above discussions, we propose the following hypotheses:

- H2. Perceived ease of use will have a direct positive impact on perceived usefulness.
- H3. Perceived ease of use will have a direct positive impact on the attitude towards the adoption of online purchasing.

#### 1.3. Pleasure

According to marketing experts, a motivated hedonic emotion can play an important role in the consumption decision (Holbrook & Hirschman, 1982; Hartman et al., 2006). In this context, the entertainment potential of high-technology products is predicted to have a strong effect on the

adoption decision (Childers et al., 2001) and its direct effect on the attitude towards the adoption of high-technology products is supported by studies (Lee, Suh, & Whang, 2003; Bruner & Kumar, 2005; Kulviwat et al., 2007; Lee et al., 2011; Ferreira et al., 2013). In addition, pleasure has been found to have a direct and strong positive effect on the attitude towards Internet shopping (Lee, Suh, & Whang, 2003). Based on the above discussion, we propose the following hypothesis:

H4. Pleasure will have a direct positive impact on the attitude towards the adoption of online purchasing.

#### 1.4. Arosual

Based on the literature review, studies have shown that arousal behavior can affect attitudes in the context of marketing. For example, Donovan, Marcoolyn, and Nesdale (1994) found a positive relationship between customer emotions evoked in a store and their attitudes toward shopping in the store. In short, arousal positively affects the shopping that is done. Similarly, Lee, Suh, and Wang (2003) concluded that arousal has a positive effect on the attitude toward using an internet shopping mall. In addition, Lee et al. (2011) stated that there is a connection between arousal and a consumer's approach/avoidance behavior toward new technologies. Ferreira et al. (2013) concluded that motivated consumers develop positive attitudes in their study on the adoption of high-tech products. Based on the above discussion, we propose the following hypothesis:

H5. The arousal will have a direct positive impact on attitudes towards the adoption of online purchasing.

#### 1.5. Dominance

The feeling of being under control is an important aspect of the dominance dimension. In this context, according to the studies conducted in the literature research conducted in terms of dominance, it has been shown that control or lack of control is related to technology adoption and use (Parasuraman & Colby, 2001; Trevino & Webster, 1992). Anxiety strongly increases negative attitudes towards the use of technology (Harris, 1999; Igbaria & Parasuraman, 1989). Studies have not found a direct positive effect of the feeling of dominance on the attitude towards adoption (Kulviwat et al., 2007; Nasco et al., 2008, and Nasco, Kulviwat, et al., 2008; Ferriare et al., 2013). In addition, despite the secondary evidence, the greater the consumer's sense of dominance over technology, the better their attitudes towards adoption should be. Based on the above discussion, we propose the following hypothesis:

H6. Dominance will have a direct positive impact on the attitude towards the adoption of online purchasing.

#### 1.6. Attitude Towards Adoption

In terms of Technology Acceptance Model, action-oriented attitude refers to the evaluative judgment of technology adoption. It is considered as the result of cognition as well as emotional response to behavior (Cohen & Areni, 1991). In the literature, the effect of attitude towards adoption on behavioral intention has been found to be inconsistent. Some studies have removed the attitude component from the Technology Acceptance Model because they thought that it did not mediate the effect of perceived usefulness and perceived ease of use (Venkatesh, 1999; Venkatesh & Davis, 2000), but some studies have found that attitude has a full (Chang & Cheung, 2001) or partial mediating role (Davis, Bagozzi, & Warshaw, 1989). According to Bruner and Kumar (2005), attitude mediates the effects of perceived usefulness, ease of use and an emotion

(pleasure) on intention. According to Kulviwat et al., (2007), when constructs related to emotions are included, attitude becomes an important construct since both cognition and emotion affect attitude, and attitude towards adoption affects intention to adopt. Moreover, Ferriare et al. (2013) concluded that attitude towards adopting a high-tech product positively affects intention to adopt. Therefore, attitude plays an important role in technology acceptance by consumers. A possible reason why attitude is an important part of the model in this study is that affect is included, albeit in a limited way. Based on the above discussion, we propose the following hypothesis:

H7. Attitude towards the adoption of online purchasing will directly positively affect online purchasing intention.

## 2. Methodology

This study is a comparative examination of online purchasing intention in the context of generation X, Y and Z consumers. Adoption of new technologies by consumers can be affected by a variety of factors. In this context, many models and theories investigating consumers' technology acceptance have been developed in the relevant literature. These theories, developed for the acceptance of a new technology, focus more on the cognitive aspect of acceptance (perceived usefulness, perceived ease of use). However, in the purchasing process, which is a complex process, some points that were ignored in previous models attract attention, as seen in the results of empirical research. At this point, emotions neglected in previous models in the acceptance of new technologies are discussed within the framework of the Consumer Technology Acceptance Model (CAT), which was developed from the combination of the Technology Acceptance Model and the Emotional State Model. In addition, the relationships to be examined within the framework of the research model in the study were evaluated and examined separately in the context of Generation X, Y and Z consumers. All data analyzes were carried out using AMOS 23.0 and SPSS 24.0 software packages.

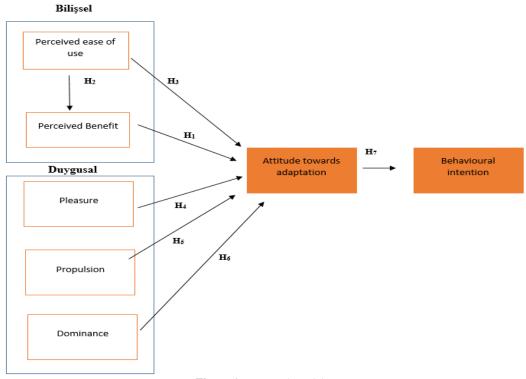


Figure 1. Proposed Model

## 2.1. Sampling and Data Collection

The data for the research was collected between 01.07.2022 and 15.04.2023 by distributing it on various social media channels via Google form. Additionally, a significant part of the data was collected through face-to-face interviews with participants. The population of the research is consumers of generations X, Y and Z who shop online in Turkey. The sample of the research consists of consumers selected from the generations X, Y and Z residing in Mersin. According to 2021 data, it consists of 1,910,056 people living in Mersin (https://www.tuik.gov.tr/ (Access), 23/06/2022). The number of participants to be reached by convenience sampling method, that is, the sample size, was determined as n = 384, with a 95% confidence level and a type-I error rate of 5% (Ural and Kılıç, 2006: 47). The answers of 661 participants who answered the questions completely were included in the analysis.

#### 2.2. Measures

The survey form was created with 46 questions in total. Perceived Usefulness Scale and Perceived Ease of Use scales included in the survey (Davis, 1986), Satisfaction-Emotional Arousal-Dominance (PAD) Scale (Mehrabian & Russell, 1974), Attitude Towards Adaptation Scale (Bagozzi, Baumgartner, & Yi, 1992) and Behavioral The intention scale (MacKenzie, Lutz, & Belch, 1986) was created by benefiting from previous studies. The statements regarding all these scales in the survey were directed to the participants using a 5-point Likert type scaling. A pilot study was conducted on 34 people, including academicians and other participants. The statements were tested for clarity and the survey was finalized with the feedback received from the participants.

## 3. Findings

#### 3.1. Descriptive statistics

The general demographic characteristics of the participants are shown in Table 1 as frequencies and percentages.

Categories			Categories					
Gender (n=661)	Frequency	Percentages (%)	Marital Status (n=661)	Frequency	Percentages (%)			
Man	307	46,4	Married	274	41,5			
Woman	354	53,6	Single	387	58,5			
Age group	Frequency	Percentages	<b>Monthly Income</b>	Frequency	Percentages			
(n=661)		(%)	(n=661)		(%)			
X generation (1965-1979)	223	33,8	1300 TL and below	205	31,1			
Y generation (1980-1999)	221	33,4	Between 1301- 2000 TL	49	7,4			
Z generation (2000 ve Sonrası)	217	32,8	Between 2001- 3000 TL	25	3,8			
,			Between 3001- 4000 TL	38	5,7			
			Between 4001-5000 TL arası	49	7,4			
Education (n=661)	Frequency	Percentages (%)	5001 TL and above	295	44,6			
Primary School	4	0,6	Job (n=661)	Frequency	Percentages			

Table 1. Distribution of Demographic Characteristics of Participants (n=661)

(%)

Middle School	9	1,4	Public Employee	203	30,8
High School	176	26,5	Paid Employee	104	15,7
Associate Degree	56	8,5	Self-Employed	93	14,1
Licence	321	48,6	Retired	65	9,8
Master	44	6,7	Housewife	32	4,8
Doctorate	51	7,7	Student	164	24,8

In terms of gender, 53.6% of the sample consists of female participants. The distribution of participants across generations was balanced. At the level of education, it was observed that the most participants were at undergraduate level with 48.6%, and the least participants were at primary school level with 0.6%.

## 3.2. Confirmatory Factor Analysis

During the validity analysis process, confirmatory factor analysis, which is under construct validity, was applied. Confirmatory factor analysis is a test that tests the compatibility of the scale to create the latent (implicit) variables and structure of the theoretically considered structure based on a previously created model (Hair, Black, Babin, & Anderson, 2010: 693) and tests how well the established model works. It is a different type of structural equation modeling analysis (Yılmaz & Celik, 2009: 53). Among the variables, perceived usefulness PU1 – PU10, perceived ease of use PEU1 – PEU9, pleasure P1 – P6, arousal A1 – A6, dominance D1 – D6, attitude towards adaptation ATA1 - ATA4 and behavioral intention BI1 - It is expressed as BI4. As a result of Confirmatory Factor Analysis, Chi-Square=3.86 (2929.61/758) and RMSEA statistic was found to be 0.066. The t-test statistics showing the significance of the relationship between latent and observed variables, the error margins of the observed variables, and the standardized loading values showing the strength of the relationships were examined. As can be seen in Table 2, all t-statistics were found to be statistically significant at the 0.01 significance level. Standardized load values varied between 0.64 and 0.95. The highest margin of error for the variables in the model was calculated as 0.53 so it was seen that there was no variable (item) that needed to be removed from the model. When all the examinations about the obtained model were made, it was seen that the structure obtained in the model was the most suitable structure. For this reason, the confirmatory factor analysis was terminated and it was decided that the resulting structure was the final structure.

Table 2. Descriptive Statistics for the Confirmatory Factor Analysis Measurement Model

Dimensions and items	Std.	Margin	$\mathbb{R}^2$	t-	AVE	CR
	Load	of		value		
	Var.	Error				
1. Perceived Usefulness (PU)					0,60	0,99
1. Shopping online improves the quality of my	0,72	0,49	0,51	20,99		
shopping experience.						
2. Shopping online gives me control over my shopping	0,70	0,51	0,49	20,35		
transactions.						
3. Shopping online allows me to shop quickly.	0,78	0,38	0,62	23,83		
4. Using the internet for shopping; provides critical	0,76	0,42	0,58	22,78		
benefits to the nature of shopping.						
5. Using the internet for shopping; increases	0,81	0,34	0,66	25,14		
efficiency.						
6. Using the internet for shopping; It improves my	0,78	0,40	0,60	23,44		
shopping efficiency.						
7. Using the internet for shopping; It makes my	0,85	0,28	0,72	26,80		
shopping easier.						

8. In general, I find it useful to shop online.	0,85	0,28	0,72	26,95		
2.Perceived Ease of Use (PEU)	0,05	0,20	0,72	20,73	0,63	0,93
1. Shopping online is convenient.	0,88	0,22	0,78	28,68	0,03	0,73
2. Learning to shop online is easy.	0,81	0,34	0,66	25,13		
3. Shopping online; It is interactive and	0,77	0,41	0,59	23,19		
understandable.	0,77	0,11	0,55	23,17		
4. It is easy to use the internet for everything I want to	0,73	0,47	0,53	21,34		
do regarding shopping.	,,,,	", ",	,,,,,			
5. Shopping online; Provides flexibility.	0,78	0,39	0,61	23,63		
6. I easily remember the online shopping process.	0,81	0,35	0,65	24,83		
7. Interacting while shopping online doesn't require	0,72	0,49	0,51	20,94		
much mental effort.						
8. In general, I find it easy to shop online.	0,86	0,26	0,74	27,61		
3.Pleasure					0,57	0,87
1. Angry / Delightful	0,70	0,51	0,49	19,95		
2.Unsatisfied / Satisfactory	0,81	0,35	0,65	24,39		
3.Sad/Delighted	0,82	0,32	0,68	25,17		
4.Helpless/Hopeful	0,72	0,48	0,52	20,72		
5.Bored/Relaxed	0,73	0,46	0,54	21,20		
4.Arosual					0,79	0,87
1.Relaxed/Live	0,76	0,43	0,57	22,19		
2. Calm / Excited	0,69	0,53	0,47	19,41		
3.Miskin / Coşkun	0,79	0,37	0,63	23,86		
4.Tense/Calm	0,64	0,59	0,41	17,83		
5.Sleepy / Vigorous	0,72	0,48	0,52	20,86		
6. Irrelevant / Interested	0,75	0,44	0,56	20,84		
5.Dominance					0,52	0,87
1.Dependent / Independent	0,66	0,57	0,43	18,22		
2.Auditized / Judged	0,78	0,39	0,61	22,92		
3. Submissive / Dominant	0,71	0,50	0,50	20,10		
4.Affected / Influential	0,73	0,47	0,53	20,79		
5.Directed/Free	0,71	0,50	0,50	20,15		
6.Unimportant / Important	0,73	0,46	0,54	21,12		0.01
6.Attitude Towards Adaptation (ATA)	0.00	0.21	0.70	20.50	0,73	0,91
1.Bad/Good	0,89	0,21	0,79	28,69		
2.Negative/Positive	0,89	0,22	0,78	28,50		
3.Disadvantaged / Advantageous	0,79	0,37	0,63	23,96		
4.Unpleasant / Provides pleasure	0,84	0,29	0,71	26,17	0.02	0.05
7.Behavioral Intention (BI)	0.00	0.22	0.70	20.05	0,83	0,95
1. I will continue to shop online in the future	0,88	0,22	0,78	28,85		
2. I speak positively about online shopping to my	0,93	0,13	0,87	31,68		
friends and relatives						
3. I would recommend online shopping to anyone	0,95	0,10	0,90	32,56		
asking for advice	0.55	0.0-	0 = -		1	
4. I encourage my friends and relatives to shop online	0,88	0,22	0,78	28,77		

Within the scope of this study, convergent and discriminant validity analyzes of the proposed measurement model were carried out. To determine convergent validity, the AVE value of each factor was calculated. According to Table 3, it was found that the factor values were greater than 0.50 and significant, and the CR values were greater than the AVE values. As a result, it can be said that the model has convergent and discriminant validity.

Correlations	Correlations									
Correlations	<u> </u>	Ort	AY	PEU	Р	Α	D	ATA	BI	Ave
Perceived Usefulness (PU)	Pearson Correlatio n	3,377 6	0,774	,741*	,226*	,198*	,118*	,285*	,633*	0,60
Perceived Ease of Use (PEU)	Pearson Correlatio n	3,531 6	,741* *	0,793	,199*	,145*	,097*	,265*	,633*	0,63 0
Pleasure (P)	Pearson Correlatio n	3,808 5	,226*	,199*	0,754	,753* *	,657* *	,693* *	,379*	0,57 0
Arousal (A)	Pearson Correlatio n	3,712 6	,198*	,145*	,753* *	0,888	,719*	,626* *	,312*	0,79 0
Dominatio n (D)	Pearson Correlatio n	3,756 7	,118*	,097*	,657*	,719* *	0,721	,572*	,244*	0,52 0
Attitude Towards Adaptation (ATA)	Pearson Correlatio n	4,028 0	,285*	,265*	,693* *	,626* *	,572* *	0,854	,438*	0,73
Behavioral Intention (BI)	Pearson Correlatio n	3,736 0	,633*	,633*	,379*	,312*	,244*	,438*	0,911	0,83 0
	**. Correlation is significant at the 0.01 level (2-tailed).									
<b></b>	n is significan									
Bold and Ital	Bold and Italic statistics were created by taking the square roots of Ave values.									

Table 3. Discriminant and Convergent analysis findings

## 4. Hypothesis Testing

# **4.1.** Testing Direct Relationship Hypotheses with Structural Equation Modeling of X, Y and Z Generations

Structural Equation Modeling Analysis was used to test the hypotheses in the study. The hypotheses tested are as follows;

- H1. It is suggested that perceived usefulness will have a direct positive impact on attitudes towards the adoption of online purchasing.
- H2. It is suggested that perceived ease of use will have a direct positive impact on perceived usefulness.
- H3. It is suggested that perceived ease of use will have a direct positive impact on attitudes towards the adoption of online purchasing.
- H4. It is suggested that pleasure will have a direct positive impact on attitudes towards the adoption of online purchasing.
- H5. It is suggested that the arousal will have a direct positive impact on attitudes towards the adoption of online purchasing.
- H6. It is suggested that dominance will have a direct positive impact on attitudes towards the adoption of online purchasing.
- H7. It is suggested that the attitude towards the adoption of online purchasing will directly positively affect online purchasing intention.

Within the scope of structural equation model analysis, first the suitability of the measurement model was tested and then path analysis was carried out. Before distinguishing by generation, the variables included in the entire measurement model and the relationships between variables are shown in table 5.3 below. Accordingly, the emotional variables "Pleasure" and "Dominance" have a positive and statistically significant effect on "Attitude Towards Adaptation". On the other hand, it seems that the variables "PEU", "PU" and "Arousal" do not statistically affect "Attitude Towards Adaptation". In addition, a positive and statistically significant effect of attitude towards adaptation is observed on behavioral intention.

As a result of Confirmatory Factor Analysis, a structural equation model is established based on path analysis. The model includes standardized regression coefficients and significance t statistics and significance p values. Additionally, standard error values of the coefficients and explanatory coefficient (R2) values are included.

The values of the results are presented in Table 5.3. Firstly, it was examined whether all relationships between independent and dependent variables were statistically significant based on t values. Based on the findings in Table 4, it is seen that the relationships between all tested variables except hypothesis 5, hypothesis 3 and hypothesis 1 are statistically significant at the 0.05 significance level. t-statistics regarding the significance of the coefficients were found to be problem-free. Accordingly, the model's goodness of fit results and fit indices can be examined. Since there were no problems with the t-statistic values, the goodness of fit of the path analysis model was examined. When Table 4 is examined, it is seen that the path analysis results and the relationships between the variables are significant. In addition, it was observed that the model had a significant level of fit and, in the details of the relationships, a significant relationship structure between the variables. Descriptive statistics for the hypothesis test findings can be examined in detail in this table.

Table 4. YEM Path Analysis Descriptive Statistics and Hypothesis Results for All Age Generations

Hypothesis	Relation			t value	р	Hypothesis test	R <sup>2</sup>
H <sub>2</sub>	PEU → PU	0,93	0,17	14,94	p<0,05	Accept	0,87
H <sub>1</sub>	PU → ATA	0,07	0,06	0,70	p>0,05	Refuse	
H <sub>3</sub>	PEU → ATA	0,09	0,17	0,90	p>0,05	Refuse	
H <sub>4</sub>	P - ATA	0,65	0,16	6,77	p<0,05	Accept	0,64
<b>H</b> <sub>5</sub>	A → ATA	-0,02	0,18	-0,15	p>0,05	Refuse	
H <sub>6</sub>	D ATA	0,15	0,12	2,07	p<0,05	Accept	
H <sub>7</sub>	ATA BI	0,49	0,030	11,14	p<0,05	Accept	0,24

**Goodness of fit:** Chi-square/df= 3194.79/766=4,1707 RMSEA:0,069 ,GFI:0,81 , CFI:0,97, NFI:0,96 , NNFI:0,97, RFI:0,96 , RMR:0,17 , SRMR:0,047 , AGFI: 0,79

PU=Perceived usefulness, PEU=Perceived Ease of Use, P=Pleasure, A=Arousal, D=Dominance, ATA=Attitude Towards Adaptation, BI= Behavioral Intention

## 4.2. Testing the Direct Relationship Hypotheses of Generation X with YEM (n=223)

When the measurement model is divided according to generations, the variables included in the structural equation model analysis for Generation X and the relationships between variables are shown in table 5 below. Accordingly, it is seen that the emotional variables "Pleasure" and "Arousal" and the cognitive variables "PEU" have a statistically positive and strong significant

effect on "Attitude Towards Adaptation".On the other hand, there appears to be a statistically insignificant relationship between the variables "AY" and "Dominance" and "Attitude Towards Adaptation". In addition, a positive and statistically significant effect of attitude towards adaptation is observed on behavioral intention.

Table 5. YEM Path Analysis of Generation X Descriptive Statistics and Hypothesis Results

Hypothe sis	Relation	Std. Coefficie nt	Std. Error	t value	р	Hypothesis test	$\mathbb{R}^2$
<b>H</b> <sub>2</sub>	PEU → PU	0,93	0,30	8,29	p<0,0 5	Accept	0,86
<b>H</b> <sub>1</sub>	$PU \longrightarrow ATA$	-0,24	0,14	-1,43	p>0,0 5	Refuse	
<b>H</b> <sub>3</sub>	PEU ATA	0,34	0,38	1,96	p<0,0 5	Accept	
H <sub>4</sub>	P ATA	1,00	0,48	4,64	p<0,0 5	Accept	0,80
<b>H</b> 5	$\stackrel{A}{\longrightarrow}$ ATA	-0,37	0,41	-2,01	p<0,0 5	Accept	
<b>H</b> <sub>6</sub>	$\stackrel{\text{D}}{\longrightarrow}$ ATA	0,18	0,25	1,60	p>0,0 5	Refuse	
<b>H</b> <sub>7</sub>	ATA 🗪 BI	0,63	0,055	6,68	p<0,0 5	Accept	0,40

**Goodness of fit:** Chi-square/df= 2532.99/727=3,48 RMSEA:0,106 ,GFI:0,64 , CFI:0,94, NFI:0,92 , NNFI:0,94, RFI:0,91 , RMR:0,15 , SRMR:0,10 , AGFI: 0,59

PU=Perceived Usefulness, PEU=Perceived Ease of Use, P=Pleasure, A=Arousal, D=Dominance, ATA=Attitude Towards Adaptation, BI= Behavioral Intention

As can be seen in Table 5, the resulting goodness of fit statistics show that the path analysis model as a whole is acceptable and has a goodness of fit above it. Descriptive statistics for the hypothesis test findings can be examined in detail in this table.

## 4.3. Testing the Direct Relationship Hypotheses of Generation Y with YEM (n=221)

When the measurement model is divided by generation, the variables and the relationships between variables included in the structural equation model analysis for Generation Y are shown in Table 5.5 below. Accordingly, the emotional variables "Pleasure" and "Dominance" and the cognitive variables "PU" and "PEU" have a positive and statistically significant effect on "Attitude Towards Adaptation". On the other hand, there appears to be a statistically insignificant relationship between the "Arousal" variable and "Attitude Towards Adaptation". In addition, a positive and statistically significant effect of attitude towards adaptation is observed on behavioral intention.

Table 6. Path Analysis of Generation Y with YEM Descriptive Statistics and Hypothesis Results

Hypothe sis	Relation	Std. Coefficie nt	Std. Error	t value	р	Hypothesis test	$\mathbf{R}^2$
H <sub>2</sub>	PEU  PU	0,93	0,28	9,15	p<0,0 5	Accept	0,87
H <sub>1</sub>	PU →ATA	0,55	0,14	3,02	p<0,0 5	Accept	0.77
H <sub>3</sub>	PEU ATA	-0,40	0,38	-2,20	p<0,0 5	Accept	0,77

H4	P ATA	0,72	0,42	3,57	p<0,0	Accept	
H <sub>5</sub>	A ATA	-0,17	0,36	-0,98	p>0,0	Refuse	-
H <sub>6</sub>	$^{\mathrm{D}} \longrightarrow^{\mathrm{ATA}}$	0,32	0,22	3,03	p<0,0 5	Accept	
H <sub>7</sub>	ATA 🗪 BI	0,41	0,042	5,12	p<0,0	Accept	0,17

**Uyum iyilikleri:** Ki-kare/df= 2243,03/766=2,93 RMSEA:0,094 ,GFI:0,67 , CFI:0,95, NFI:0,92 , NNFI:0,94, RFI:0,92 , RMR:0,17 , SRMR:0,14 , AGFI: 0,63

PU=Perceived Usefulness, PEU=Perceived Ease of Use, P=Pleasure, A=Arousal, D=Dominance, ATA=Attitude Towards Adaptation, BI= Behavioral Intention

As can be seen in Table 6, according to the path analysis with a high goodness of fit level of the model, the relationships between the variables are significant and the model as a whole has an acceptable level of fit. Descriptive statistics for the hypothesis test findings can be examined in detail in this table.

## 4.4. Testing the Direct Relationship Hypotheses of Z Generation with YEM (n=217)

When the measurement model is divided by generation, the variables and the relationships between variables included in the structural equation model analysis for Z Generation are shown in Table 7 below. Accordingly, the "Pleasure" variable, one of the emotional variables, has a positive and statistically significant effect on "Attitude Towards Adaptation". On the other hand, there appears to be a statistically insignificant relationship between the variables "PEU", "PU", "Arousal" and "Dominance" and "Attitude Towards Adaptation". In addition, a positive and statistically significant effect of attitude towards adaptation is observed on behavioral intention.

Table 7. Path Analysis with Z Generation YEM Descriptive Statistics and Hypothesis Results

Hypothesis	Relation	Std. Coeffic ient	Std. Error	t value	р	Hypothesis test	$\mathbb{R}^2$
$H_2$	PEU <b>→</b> AY	0,94	0,39	7,31	p<0,0 5	Accept	0,89
H <sub>1</sub>	PU ATA	0,13	0,13	0,61	p>0,0 5	Refuse	
H <sub>3</sub>	PEU ATA	0,02	0,39	0,073	p>0,0 5	Refuse	
H <sub>4</sub>	P ATA	0,44	0,28	2,84	p<0,0 5	Accept	0,70
H <sub>5</sub>	A → ATA	0,33	0,31	1,93	p>0,0 5	Refuse	
H <sub>6</sub>	D ATA	0,07	0,18	0,68	p>0,0 5	Refuse	
H <sub>7</sub>	ATA BI	0,41	0,046	5,28	p<0,0 5	Accept	0,17

**Uyum iyilikleri:** Ki-kare/df= 2243,03/766=2,93 RMSEA:0,094 ,GFI:0,67 , CFI:0,95, NFI:0,92 , NNFI:0,94, RFI:0,92 , RMR:0,17 , SRMR:0,14 , AGFI: 0,63

PU=Perceived Usefulness, PEU=Perceived Ease of Use, P=Pleasure, A=Arousal, D=Dominance, ATA=Attitude Towards Adaptation, BI= Behavioral Intention

As can be seen in Table 7, according to the path analysis with a high goodness of fit level of the model, the relationships between the variables are significant and the model as a whole has an

acceptable level of fit. Descriptive statistics for the hypothesis test findings can be examined in detail in this table.

## **Discussion and Conclusion**

The results of this study provided strong evidence supporting a unified theory of Consumer Acceptance of Technology (CAT) in which emotion is integrated with cognition. According to result, strong empirical support was found for four of the study's seven research hypotheses for all participants. Similarly, the research results are parallel to the results of the studies by Kulwivat et al. (2007), Nasco et al. (2008), Zarouali, (2018) and Ferreira et al. (2014).

The results of this study replicate several basic findings of Technology Acceptance Model studies in the literature. The results support many of the individual causal paths proposed by the Technology Acceptance Model. The positive effect of perceived ease of use on perceived usefulness revealed in this study is consistent with the results of Technology Acceptance Model studies in the literature (Davis, 1989; Childers et al., 2001; Kulwivat et al., 2007; Nasco et al., 2008b). This result supports the H2 hypothesis in the study. These results confirm that, from the consumer's perspective, judgments about the usefulness of technology are affected by the individual's sense of ease of use and comfort with the technology. Although Zarouali et al. (2018) found that perceived ease of use did not have a direct and positive effect on attitude, similar to this study, a direct and positive effect was obtained in the studies conducted by Kulwivat et al. (2007), Nasco et al. (2008), and Ferreira (2014). Although this result fails to support hypothesis H3, it is not entirely unexpected. Much of the previous Technology Acceptance Model research has shown that perceived usefulness is a greater predictor of attitude than perceived ease of use (Hu et al., 1999; Davis, 1989; Childers et al., 2001; Nasco et al., 2008b; Zarouali et al., 2018). However, in this study, the opposite result was that the effect of perceived usefulness on attitude towards adaptation was found to be insignificant (β=.07; p>.05). In line with these results, H1 hypothesis was rejected. As suggested within the Technology Acceptance Model, attitudes are an important predictor of behavior. As in previous studies, the effect of attitude towards adaptation on behavioral intention was found to be significant. In line with these results, H7 hypothesis was accepted.

As expected, the study results showed that the Emotional State Model was a significant predictor of attitude towards adopting the paradigm. The results showed that pleasure and dominance were important predictors of attitude. This supports that being satisfied and excited about a new high-tech device positively affects the consumer's attitude towards adoption. On the other hand, it was concluded that provocation was not significantly related to attitude. In this case, while hypotheses H4 and H6 were supported, hypothesis H5 was rejected. Considering the results of previous research, Kulviwat et al., (2007) stated that pleasure and arousal were strong predictors of attitude, while dominance was not significantly related to attitude. This result is consistent with Nasco et al. (2008b) and Ferreira (2014). Zarouali et al. (2018) found in their study that the variables of pleasure, arousal and dominance had a positive and significant effect on attitude. The fact that a measurement was made based on the participants' general online purchasing habits within the scope of this research may have affected the fact that the measurement on motivation was meaningless. The arousal variable should continue to be explored by conducting different studies on the use of internet tools in the purchasing process on a particular product or service.

Unlike previous studies on the subject, the study aimed to examine the Consumer Technology Acceptance Model comparatively across generations. The results obtained from the study show that there are differences between generations. X, Y and Z generation individuals covered within the scope of the study may show different characteristics depending on the generations they belong to. The prediction that generations whose habits and perceptions regarding purchasing behavior may differ will differ in terms of adopting technological innovations has been confirmed according to the results obtained from the research. In the study, it was determined that the effect of perceived usefulness on attitude towards adaptation was insignificant according to Generation X and Generation Z participants. According to Y generation participants, the effect of perceived usefulness on attitude towards adaptation was found to be significant.

Most previous Technology Acceptance Model studies have found that perceived usefulness contributes more to predicting attitude than perceived ease of use, and that perceived usefulness has a significant effect on attitude (Hu et al., 1999; Davis, 1989; Childers et al., 2001; Nasco et al., 2008b; Zarouali et al., 2018). There was no difference between generations in the effect of perceived ease of use on perceived usefulness. According to participants of all generations, perceived ease of use was found to have a significant effect on perceived usefulness. This result coincides with the results obtained for all participants. It is also consistent with the Technology Acceptance Model research results (e.g., Davis, 1989; Childers et al., 2001; Kulwivat et al., 2007; Nasco et al., 2008b). It was concluded that the effect of perceived ease of use on the attitude towards adaptation was significant according to the participants of Generation X and Y. This result is consistent with Kulwivat et al. (2007), Nasco et al. (2008b) and Ferreira et al. (2014) that there is a direct and positive effect. On the contrary, according to Generation Z participants, the effect of perceived ease of use on attitude towards adaptation was found to be insignificant. It appears that the ease of use perceived by Generation Z consumers regarding their views on technology acceptance in their online shopping experiences does not have an impact on their attitudes. This may be due to the fact that Generation Z is a generation that uses technology widely and effectively in all areas of daily life.

The study results examined across generations that the attitude towards adopting the Emotional State Model paradigm is an important predictor. Accordingly, taste has a significant effect on attitudes towards adaptation across all generations. This shows that taste has a significant impact on attitude in the online shopping experiences of all generation X, Y and Z consumers. This result is parallel to the evaluation results made on all participants.

According to Generation X consumers, arousal has a significant impact on attitude towards adaptation but it does not have a significant effect on Generation Y and Z consumers. Similar to the results of Generation Y and Z participants, a significant effect of arousal on attitude could not be detected among the participants in general. However, this situation differs from the literature. For example, Lee et al., (2011) stated that there is a connection between arousal and a consumer's approach/avoidance behavior regarding new technologies. Also, Ferreira et al. (2013) concluded in their study on the adoption of high technology products that motivated consumers developed positive attitudes. According to generation Y consumers, dominance has been found to have a significant effect on attitudes towards adaptation. This result coincides with the results obtained for all participants. However, no significant effect of dominance on attitude was detected compared to Generations X and Z. The results obtained for Generation X and Z participants are similar to Kulviwat et al., (2007), Nasco et al. (2008b) and Ferreira et al. (2014) is parallel to the findings obtained from their study. As in previous studies, it was determined that the effect of

attitude towards adaptation on behavioral intention was significant for X, Y and Z generation participants.

The results have several implications for both academics and managers interested in technology adoption. Most studies in the innovation diffusion literature from sociology or the technology acceptance literature from management information systems have generally focused on cognition as the sole driver of adoption. Few studies have investigated the effects of emotions on adoption (Kulwivat et al., 2007; Nasco et al., 2008; Kulviwat et al., 2013; Ferreira, 2014; Zarouali, 2018). This study builds on several studies in recent years that have provided strong evidence that a more complete picture of adoption intention is possible by including the impact in technology acceptance models (Bruner & Kumar, 2005; Childers et al., 2001; Dabholkar & Bagozzi, 2002; Wood & Moreau, 2006; Kulwivat et al., 2007; Nasco et al., 2008; Kulviwat et al., 2013; Ferreira, 2014; Zarouali, 2018). By integrating the Technology Acceptance Model and the Mood Model to create a unified theoretical model, the Consumer Technology Acceptance Model improves technology adoption prediction. More specifically, the results of this study indicate that the effects of pleasure and dominance can greatly increase the predictive power of the Technology Acceptance Model.

Regarding managerial implications, this study provides several valuable findings for practitioners. The results of this study, conducted within the framework of online purchasing experiences, are clearly of interest to retail managers in the implementation of product management strategies. The Consumer Technology Acceptance Model is useful for consumers purchasing online to predict the extent to which the target market intends to adopt a particular technological innovation. Due to the use of technology, the online purchasing experience often has a high degree of technological uncertainty determined by complex product functions. This research shows that for products with low usability, ease of use alone is unlikely to influence consumer attitudes and adoption intentions. Companies should especially take this into consideration when designing internet tools. Moreover, Consumer Technology Acceptance leads marketing managers to recognize that emotional responses, beyond considering how useful and useful Internet purchasing tools are, can play a significant role in consumers' adoption of such tools. The finding that feelings of pleasure and dominance have strong effects on consumer attitudes is of particular interest to managers. Internet purchasing tools should not only be designed based on ease of use and usefulness, but these emotional dimensions should also be evaluated together with the target market and target consumer groups (Generations X, Y and Z) during market research to more accurately assess the level of acceptance of the innovation.

The findings also provide important implications for managers involved in promotional activities to inform and persuade consumers to accept the online purchasing process. Advertising professionals must tailor their campaigns to convey not only the usefulness and ease of use of internet technologies, but also the pleasure and dominance of using the product. Amusement, a mixture of pleasure and dominance, appears to be a particularly powerful emotion to evoke (Solomon, 2003; O'Donnell & Wardlow, 2000). Also, these processes should be carried out taking into account information on the differences in technology adoption between generations. One of the limitations of this study is that the research data includes only generation X, Y and Z consumers residing in Mersin province. In the future, more comprehensive studies can be conducted by evaluating generations separately, expanding the sample area, and examining the products that emerge as a result of technological developments such as the use of electric vehicles with the Consumer Technology Acceptance Model.

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### **Conflict of Interest**

The authors declare that they have no competing interest.

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