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Digital transformation in Greece during COVID: A case-study on digital marketing strategies' effectiveness

Anastasia Koutsautaki*, **Paraskevi Boufounou[†]**, **Kanellos Toudas[‡]**,

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Abstract

This paper aims to examine the effectiveness of all digital marketing strategies (i.e., marketing campaigns that appear on a computer, phone, tablet, or other device that can take many forms, such as internet videos, display ads, search engine marketing, paid social media ads, and social media posts) employed by Greek enterprises due to the digital transformation they went into due to the ongoing COVID 19 pandemic. A questionnaire of 16 questions was used and a sample of 358 questionnaires was surveyed. The results were analyzed based on age groups. Millennials and Generation X possessing different digital skills, ended up into developing different consumer preferences. The findings are of particular importance to Greek SMEs that since COVID are learning paving their growth strategies through digital paths adjusting to the new digital era.

JEL classification: O33, L21, H12

Keywords: Digital marketing, COVID, Millennials, generation X, consumer preferences

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1. Introduction

As noted by Boufounou et al (2022) “significant advances in digital innovation and technology have ushered in the 4th Industrial Revolution and the 5th Social Revolution with far-reaching implications for all aspects of human activity. Furthermore, these changes have been amplified by the COVID pandemic, as online searches for the term "digital transformation" have surged”. Digital marketing is the use of the internet, mobile devices, social media, search engines and other channels to reach consumers. Some marketing experts believe that digital marketing is an entirely new endeavor that requires a new way of reaching customers and new ways of understanding how customers behave compared to traditional marketing. Boufounou et al (2024) showed that the digital transformation of the Greek banks during the pandemic reflected a dynamic interplay between generational digital skills, consumer preferences, and the evolving landscape of digital transformation.

The scope of this study is to examine the effects and implications of the current COVID 19 pandemic on business marketing strategies, the rise of digital marketing and whether it is effective in promoting and ultimately increasing a business's sales in Greece. The rest of the paper is organized as follows: First the main dimensions of the issues addressed are presented. Then, a bibliographic overview of the key relevant studies addressing the main challenges of digital marketing follows. Accordingly, the data and methodology used in carrying out the study follows, along with the comparative assessment of the results obtained against those of previous studies for Greece. Finally, the main conclusions and their potential implications are discussed, along with thoughts for further study and research.

2. COVID-19 Pandemic and Digital Marketing

The Covid-19 pandemic has ultimately changed the way people search for information, communicate and even buy products and/or services. These changes mean brands need to rethink how they sell to customers and find new ways to create loyalty. At the same time, the way people work in companies has changed radically. Daily face-to-face work has in many cases been reduced, to be replaced by remote and hybrid working. This drastic change has forced companies to re-evaluate how teams can communicate and collaborate to drive business success.

In such unprecedented times, with remote workforces and constrained budgets, marketing departments are under pressure to do more with less and demonstrate a high return on investment (ROI). Many marketing teams are allocating resources to digital and online channels that can more effectively target niche audiences and demonstrate measurable results.

Although pandemic restrictions are loosened, we are spending more of our daily lives online. According to an OECD survey, consumers say they are spending more time-consuming media at home. Smartphone use is growing significantly, with 70% of all global respondents spending more time on their smartphone, rising to over 80% for Generation Z.

In addition, due to the social disconnect resulting from COVID-19, marketers are now reconsidering investments in live events. Last year, the OECD found that COVID-19 concerns led to a 500% increase in trade show cancellations and postponements. The potential of the Internet as a marketing tool is well documented in many publications. However, there is no proven method of success that can help management evaluate how beneficial digital marketing can be, before making a significant capital investment in online marketing and risking the possibility of interfering with its current channels. The effectiveness of digital marketing through any digital platform remains unknown and often a combination of digital marketing and conventional marketing channels is consistently used by furniture companies around the world. In fact, the rapid adoption of digital marketing as the sole channel for marketing activities among companies has become very evident since the onset of the global coronavirus pandemic 2019 (COVID-19) in early 2020.

Marketing channels can be broadly divided into direct and indirect marketing approaches. Most companies do not sell their products or services directly to end users for three important reasons. Lack of financial resources to complete negotiations, reduced cost-effectiveness in selling consumer goods directly at a low price, and priority the core business. It should be recognized that digital marketing shares some of the characteristics of both direct and indirect marketing. In the rapidly digitizing world, the role of digital marketing cannot be downplayed, especially when physical marketing activities are no longer possible.

Establishing a new normal for marketing in the post-pandemic world requires a new approach. Surviving in the age of the empowered customer, with fewer physical meetings and social distance makes traditional mass marketing tactics almost useless. In this context, understanding the role of technology in shaping the market and, more importantly, engaging with social media as part of the marketing toolkit becomes a strategic imperative. Social media platforms have made customers more sophisticated and have paved the way for the development of new tactics in the search, evaluation, selection and purchase of goods and services.

Digitalization has also increased the demand for customized products and opened up opportunities for customers to be actively involved in the product development process. As customers want to have more influence at various stages of the business process, such developments have influenced the way marketers operate and affect marketing practices at

strategic and tactical levels, which has presented marketers with difficult choices and challenges.

The COVID-19 pandemic has significantly increased the competitive pressure among businesses while challenging all aspects of the business environment. Businesses today seem determined to regain control of the customer-controlled social media space, which has prompted many businesses to invest in social media presence, especially during the global pandemic. This would require the use of various platforms to attract the attention of younger tech-savvy customers in the future. While market growth and market penetration of a company's products are very important growth strategies for firms in the globalized world with extensive supply chains, the impact of digital marketing on international market growth has not been well researched.

As a result of the Covid-19 pandemic, global e-commerce retail sales increased to nearly \$4.28 trillion with nearly \$432 billion of that generated in the United States. Between 2019 and 2021 (which was the peak of the restrictions imposed by Covid), retail platforms - according to Statista - reported a \$2 billion increase in five months from January 2021 to June of that year, amounting to 22 billion visits. According to Charged Retail Gazette, online sales in July 2021 in the UK broke records by reaching £10 billion, as 40% of people chose to shop from home rather than visit a physical store despite the end of the lockdown. In the second quarter of 2021, Shopify touted that it reached its first \$1 billion in a record-breaking quarter with Gross Merchandise Volume (GMV) up 57% year-on-year. GlobalData's research revealed that 90% of the top ten e-commerce sites, including Shopify, Amazon, and Alibaba, saw double-digit revenue growth. This is due to an increase in the number of people visiting online retail platforms as a result of Covid. And this trend in online retail shopping continues, even after the introduction of mass vaccinations and the shift to a more normal life.

Due to the nature of their businesses, some sectors benefited more than others during the lockdown: for example, hospitality and tourism unsurprisingly saw their profits plummet. According to Kotler & Keller (2017) digital marketing targets a specific segment of the customer base and is interactive. Digital marketing is on the rise and includes search result ads, email ads and promoted tweets - anything that integrates marketing with customer feedback or a two-way interaction between company and customer. Online marketing is different from digital marketing. Internet marketing is advertising that is exclusively on the Internet, whereas digital marketing can be done via mobile devices, on a subway platform, in a video game or through a smartphone app.

Digital marketing poses specific challenges for its suppliers. Digital channels are proliferating rapidly, and digital marketing professionals need to monitor how these channels work, how

they are used by receivers and how to use these channels to effectively market their products or services. In addition, it is becoming increasingly difficult to attract the attention of receivers because receivers are increasingly inundated with competing ads. Digital marketers also find it difficult to analyze the vast amounts of data they gather and then leverage that information into new marketing efforts. The main categories of Digital Marketing include Display ads, Mobile app ads, Paid search ads (i.e. Google Search), YouTube ads, Promotional e-mails, Social Media Marketing (i.e. facebook, instagram), Sponsored Story links.

The main findings of the main relevant recent studies on consumer preferences towards using alternative categories of Digital Marketing are summarized as follows:

- ***Alshaketheep et al. (2020)*** by studying a sample of 500 people, they concluded that there was no significant difference between consumer age groups, also that there was a significant difference between personalized digital communications and age group price indicating that customers in the 30-40 age group tend to be more attracted to remote communications. Finally, they stated that there was significant difference between empathy and age group of consumers. The mean value shows that customers in the 30-40 age group tend to be attracted to empathy messages.
- ***Devanesan et al. (2021)*** by studying a sample of 100 individuals, they demonstrated that there was a significant correlation between DPS-related promotions and intention to increase DPS, although the combination of influencing factors differed across demographics. In addition, there is a correlation between changes in buyer behavior related to DPS and intention to increase DPS.
- ***Koeswandi et al. (2021)*** by studying a sample of 100 people, they showed that the variable of digital marketing has a significant impact on millennials' purchase decision. The more strongly digital marketing is applied in the Covid-19 situation, the more influence millennials receive to make a purchase decision.
- ***Harari et al. (2022)*** by studying a sample of 958 people, they found that members of Gen Z were less resistant. Also, members of Gen Z had higher levels of openness to change and self-empowerment compared to Gen X. In addition, Gen Z was found to be more positive in their attitudes towards flexible learning, but no differences were found between generations in terms of flexible working. Both generations had similar attitudes towards e-consumption. Despite the size and importance of the crisis, the core values of each generation remained unchanged in many respects, but both generations' attitudes towards hybrid working and consumption were positive.
- ***Limna et al. (2022)*** surveying the relevant literature, they concluded that the digitization of marketing communication channels in businesses highlights the

importance of discovering an appropriate method for developing business practices focused on promoting technological change in organizations and creating customized communication strategies. The dynamic nature of today's marketing trends increases the need to implement innovative communication technologies and tools that increase customer satisfaction and retention (loyalty) through customer relationship management (CRM) and digital marketing activities in the digital economy.

3. Materials and methods

In the context of the study, the opinions of Greek consumers regarding the change in their preferences and their purchasing habits during the COVID pandemic period are recorded with the help of a suitably designed questionnaire. To draw conclusions that may offer valuable guidance in the design of future strategies of companies regarding their marketing activities.

The study focuses on recording and evaluating:

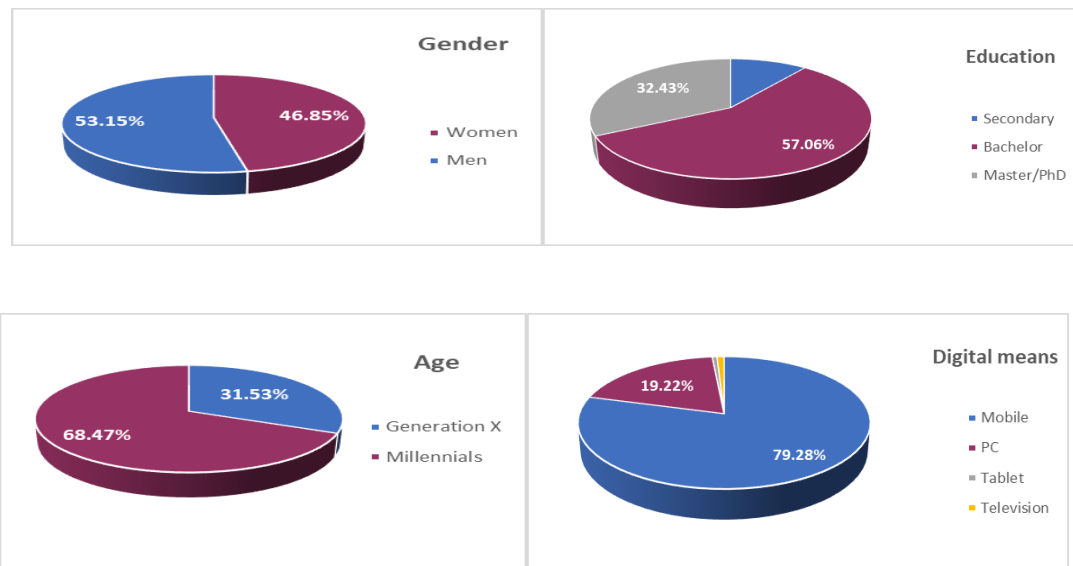
- Age dependence (i.e. the difference between Millennials and Generation X) in consumer preferences on marketing strategies
- COVID dependence, i.e. changes in consumer preferences on marketing strategies for the aforementioned age groups before and after the COVID-19 pandemic. The study findings are critically compared against those of a relevant study of Birdahas (2017) before COVID-19.

The questionnaire consists of 16 questions. The survey was conducted between 11/18/2021 and 12/28/2021. The sample size is 333 individuals, and the random sampling method was followed. The sampling method used was face-to-face interviews in the form of a questionnaire through the Google Forms application, ensuring the informed consent of research participants and guaranteeing their anonymity. The analysis of the questionnaire results is done through statistical analysis & processing, using statistical package SPSS (IBM, 2021).

The main sample characteristics are presented in Figure 1 below, which shows that:

- 53.15% of the sample is male and the remaining 46.85% is female.
- 68.47% of the sample belongs to the Millennials and 31.53% to Generation X.
- In terms of educational level, it is observed that 57.06% of the sample have a bachelor's degree, 32.43% of the sample have a Master/ PhD degree and the remaining 10.51% of the sample have completed secondary education.
- Finally, 79.28% of the sample reports that they use their mobile phone more often, 19.22% of the sample reports that they use their computer, 0.90% of the sample reports TV and 0.60% of the sample reports their tablet.

Figure 1: Sample characteristics



		Age				X ²	p
		Generation X		Millennials			
		N	%	N	%		
Gender	Women	42	40.00%	114	50.00%	2.89	0.089
	Men	63	60.00%	114	50.00%		
Education	Secondary	18	17.14%	17	7.46%	23.27	<0.001
	Bachelor	40	38.10%	150	65.79%		
	Master/PhD	47	44.76%	61	26.75%		
Digital Means	Mobile	68	64.76%	196	85.96%	22.25	<0.001
	PC	34	32.38%	30	13.16%		
	Tablet	2	1.90%	0	0.00%		
	TV	1	0.95%	2	0.88%		

As shown in Figure 2 below, there is no statistically significant difference in terms of gender characteristic between the two generations ($p = 0.089$). However, it is observed that 44.76% of Generation X versus 26.75% of Millennials have a Master's/Doctoral degree. Meanwhile, 38.10% of Generation X versus 65.79% of Millennials have a college education ($p < .001$). Finally, 64.76% of Generation X versus 85.96% of Millennials use their cell phones more often. Meanwhile, 32.38% of Generation X vs. 13.16% of Millennials use their computer more often ($p < .001$).

Figure 2: Generation X – Millennials’ characteristics

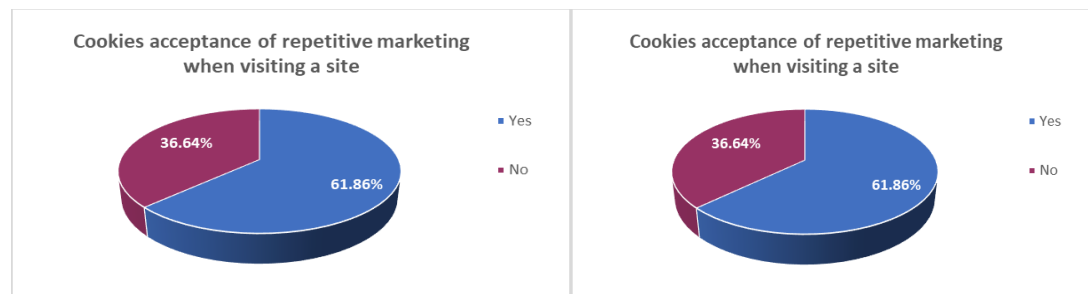
		Age				X ²	P
		Generation X		Millennials			
		N	%	N	%		
Gender	Women	42	40.00%	114	50.00%	2.89	0.089
	Men	63	60.00%	114	50.00%		
Education	Secondary	18	17.14%	17	7.46%	23.27	<0.001
	Bachelor	40	38.10%	150	65.79%		
	Master/PhD	47	44.76%	61	26.75%		
Digital Means	Mobile	68	64.76%	196	85.96%	22.25	<0.001
	PC	34	32.38%	30	13.16%		
	Tablet	2	1.90%	0	0.00%		
	TV	1	0.95%	2	0.88%		

4. Results

As shown in Figure 3 below, regarding *Ad-Blocker Use and Cookies Acceptance*, the results obtained showed that 49,55% use ad blocker and 61,86% of the sample accept repeat marketing cookies when browsing a site. These findings comply with the relevant findings reported in Birdahas (2017), who found that the relevant percentages range around 50%, showing that COVID did not change consumer behavior on this issue. In addition, these studies’ findings reveal that both before and after COVID, both Millennials and Generation X age groups use ad blockers at a higher rate when browsing the internet.

Furthermore, the results showed that after COVID, fewer Millennials are using ad blockers, while more Generation Xers do. Finally, regarding age dependence (i.e. difference between Millennials and Generation X) on Ad-Blocker Use and Cookies Acceptance, we found that it is statistically significant at the 1% level of significance for the use of ad blocker while browsing the internet. Also, it is statistically significant at the 10% level of significance for cookies acceptance of repetitive marketing when visiting a site.

Figure 3: Ad-blocker use and cookies acceptance

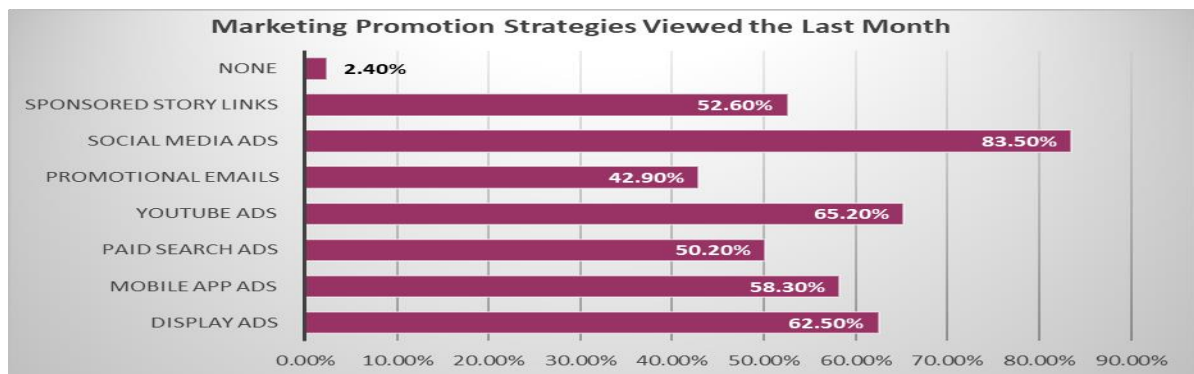


		Age				χ ²	p
		Generation X		Millennials			
		%	N	%	N		
Use of ad blocker while surfing the internet	Yes	35.24%	37	56.14%	128	17.67	<0.001
	No	52.38%	55	40.35%	92		
	Don't Know	12.38%	13	3.51%	8		
Cookies acceptance of repetitive marketing when visiting a site	Yes	61.90%	65	61.84%	141	5.67	0.06
	No	34.29%	36	37.72%	86		
	Don't Know	3.81%	4	0.44%	1		

		Age	
		Generation X	Millennials
		% Change COVID	
Use of ad blocker while surfing the internet	Yes	0.73%	-8.57%
	No	-3.37%	7.73%
	Don't Know	2.65%	0.84%

Regarding *Marketing Promotion Strategies* (based on Junes' 2024 views reported), as presented in Figure 4 below, it is evident that age dependence (i.e. the difference between Millennials and Generation X) is statistically significant at the 1% level regarding social media ads strategy, statistically significant at the 5% level regarding mobile app ads, promotional emails, sponsored story links strategies, and not statistically significant for display ads, paid search ads and YouTube ads strategies.

Figure 4: Marketing promotion strategies (June 2024)

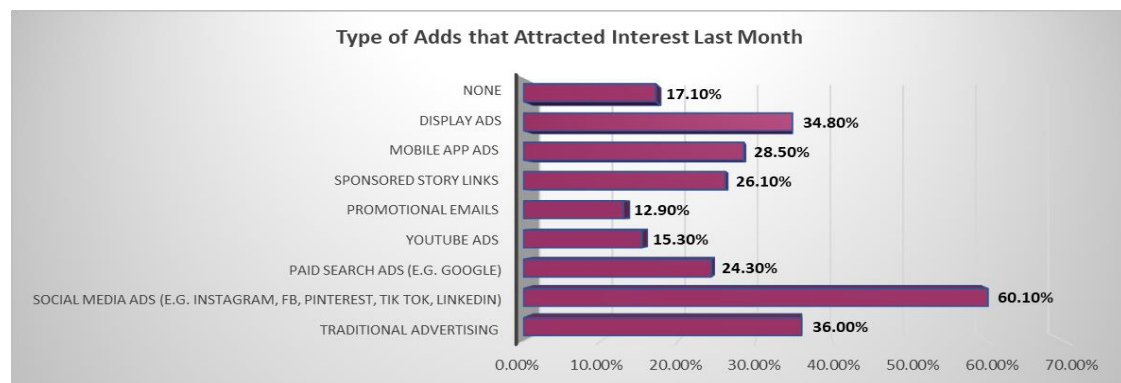


	Age				Z	p
	Generation X		Millennials			
	N	%	N	%		
Display ads	67	63.80%	141	61.80%	0.34	0.731
Mobile app ads	50	47.60%	144	63.20%	-2.69	0.007
Paid search ads	52	49.50%	115	50.40%	-0.16	0.877
YouTube Ads	73	69.50%	144	63.20%	1.13	0.259
Promotional emails	55	52.40%	88	38.60%	2.37	0.018
Social media ads	74	70.50%	204	89.50%	-4.45	<0.001
Sponsored story links	42	40.00%	133	58.30%	-3.15	0.002
None	7	6.70%	1	0.40%	3.50	0.001

Regarding the *Type of Ads that Attracted Interest* (based on Junes' 2024 views reported), as presented in Figure 5 below, it is evident that age dependence (i.e. the difference between Millennials and Generation X) is statistically significant at the 1% level for the following marketing strategies: traditional advertising, social media ads, sponsored story links, mobile ads and display ads, statistically significant at the 5% level for paid search ads and YouTube ads, and not statistically significant for promotional emails.

Comparing the findings of the present study to the relevant ones of Birdahas (2017), we conclude that COVID did not change the consumers' behavior. Social media ads were and remain the most interesting (regarding June's 2024 views reported), followed by Display ads, Mobile app ads and Sponsored story links. Furthermore, comparing Generation X and Millennial's behavior it is observed that Millennials are more exposed to advertising than Generation X, as the latter see a decrease in almost all types of advertising except for "Paid-search ads". This may be due to either the targeting of ads, or Generation X's indifference towards ads. In addition, exposure to ads also depends on the use of ad blockers, which as Generation X is using more in after COVID than before COVID as reported by Birdahas (2017).

Figure 5: Types of ads that attracted interest (June 2024)



	Age				Z	p
	Generation X		Millennials			
	N	%	N	%		
Traditional advertising	23	21.90%	97	42.50%	-3.71	<0.001
Social media ads	41	39.00%	159	69.70%	-5.54	<0.001
Paid search ads	15	14.30%	66	28.90%	-2.93	0.004
YouTube Ads	10	9.50%	41	18.00%	-2.00	0.047
Promotional emails	18	17.10%	25	11.00%	1.56	0.119
Sponsored story links	13	12.40%	74	32.50%	-3.95	<0.001
Mobile app ads	17	16.20%	78	34.20%	-3.43	<0.001
Display ads	20	19.00%	96	42.10%	-4.20	<0.001
None	28	26.70%	29	12.70%	3.18	0.002

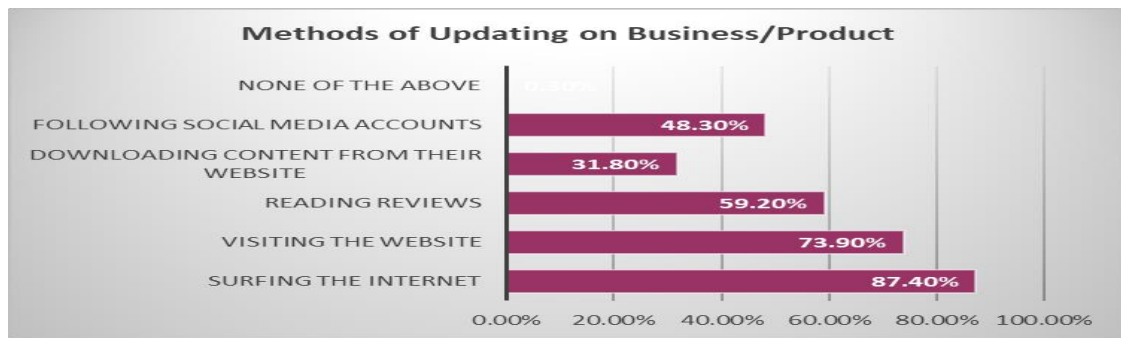
	Age				Z	p
	Generation X		Millennials			
	N	%	N	%		
Traditional advertising	23	21.90%	97	42.50%	-3.71	<0.001
Social media ads	41	39.00%	159	69.70%	-5.54	<0.001
Paid search ads	15	14.30%	66	28.90%	-2.93	0.004
YouTube Ads	10	9.50%	41	18.00%	-2.00	0.047
Promotional emails	18	17.10%	25	11.00%	1.56	0.119
Sponsored story links	13	12.40%	74	32.50%	-3.95	<0.001
Mobile app ads	17	16.20%	78	34.20%	-3.43	<0.001
Display ads	20	19.00%	96	42.10%	-4.20	<0.001
None	28	26.70%	29	12.70%	3.18	0.002

Regarding *Updating Methods used on Business/Products*, as presented in Figure 6 below, it is evident that age dependence (i.e. the difference between Millennials and Generation X) is: statistically significant at the 1% level for monitoring their social media accounts, statistically significant at the 10% level for downloading content from their website, and not statistically significant for other Marketing strategies.

The study findings exploring changes in updating content consumer behavior to COVID, showed that the options "Searching the internet" and "Reading other people's reviews" seem to have decreased in both age groups, update content options "Visiting the respective website" and "Downloading content from their website" seem to have increased for both age groups, and the only difference between the age groups found is that while Millennials decreased using the "Following their media accounts" option, the Generation X increased its use after COVID.

Comparing consumer behavior before and after COVID as measured in our study, to the relevant one before COVID as measured by Birdahas (2017), it is evident that the hierarchy of choice of sources used for update has remained the same with "Searching the internet" as the first choice, followed by "Visiting their website", "Reading other people's reviews", "Following their social media accounts" and lastly "Downloading content from their website". Moreover, differences between age groups were evidenced before and after COVID were only evidenced for update by "Following their media accounts". Overall, it became evident that Generation X during 2017-2021 became more familiar with social media, so they also choose it as a way of being informed on a business/product and updating on this information.

Figure 6: Methods used for updating on business/products



	Age				Z	p
	Generation X		Millennials			
	N	%	N	%		
Surfing the internet	93	88.60%	198	86.80%	0.44	0.660
Visiting the website	76	72.40%	170	74.60%	-0.42	0.675
Reading reviews	57	54.30%	140	61.40%	-1.23	0.221
Downloading content from their website	26	24.80%	80	35.10%	-1.88	0.060
Following social media accounts	30	28.60%	131	57.50%	-5.07	<0.01
None of the above	1	1.00%	0	0.00%	1.48	0.141

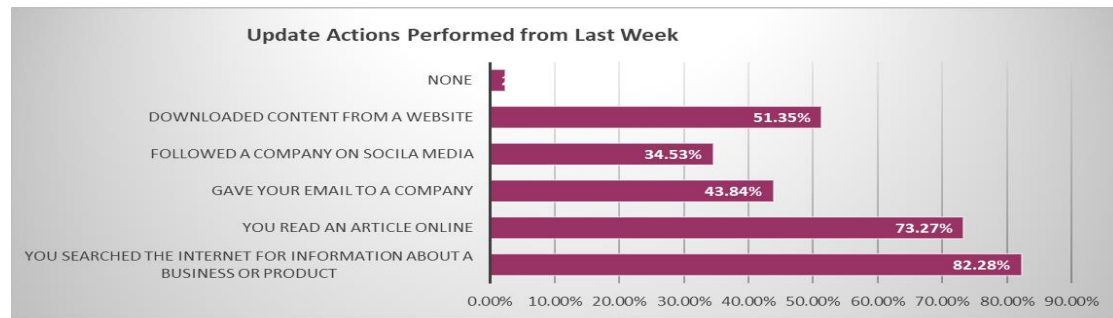
	Age	
	Generation X	Millennials
	% Change COVID	
Surfing the internet	-4.32%	-4.64%
Visiting the website	5.14%	2.41%
Reading reviews	-5.88%	-7.32%
Downloading content from their website	18.87%	50.28%
Following social media accounts	-2.68%	-9.02%
None of the above	1.20%	-0.80%

Regarding *Updating Actions Performed last week*, as presented in Figure 7 below, it is evident that age dependence (i.e. the difference between Millennials and Generation X) is statistically significant at the 5% level only with respect to whether they gave their Mail to a business, and not statistically significant for the rest of the marketing strategies. The study findings exploring changes in updating actions performed due to COVID, showed that for both age groups, after COVID it became more likely for a user to follow a business on social media, as well as to give his/her email to a business, than before COVID.

Comparing consumer behavior before and after COVID as measured in our study, to the relevant one before COVID as measured by Birdahas (2017), it is evident that Birdahas (2017) found for both age groups that consumers mainly “search online for information about a business/product”, the rest of search options ranking as follows: “reading an article online” second, “following a business on social media” third, “downloading content from a website” fourth and “giving their email address to a business” in the fifth and last place. In our study,

for both age groups consumer preferences are ranked the same as Birdahas' (2017) for the first two options (namely "online search" in the first place, followed by "reading an article online" in the second place). Then the ranking changes and "downloading content from a website" is in the third place, followed by "giving the email to a business" in the fourth place and "following a business on social media" in the last place"

Figure 7: Updating actions performed last week



	Age				Z	p
	Generation X		Millennials			
	N	%	N	%		
You searched the internet for information about a business or product	86	81.90%	188	82.46%	-0.12	0.903
You read an article online	74	70.48%	170	74.56%	-0.78	0.435
Gave your email to a company	34	32.38%	112	49.12%	-2.89	0.004
Followed a company in social media	32	30.48%	83	36.40%	-1.06	0.292
Downloaded content from a website	48	45.71%	123	53.95%	-1.40	0.163
None of the above	4	3.81%	4	1.75%	1.14	0.256

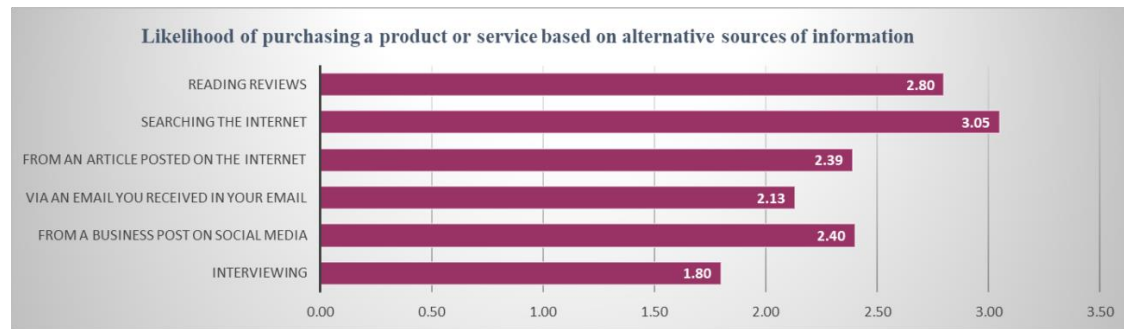
	Age	
	Generation X	Millennials
	% Change COVID	
You searched the internet for information about a business or product	-0.0660	-0.0390
You read an article online	-0.0828	-0.8900
Gave your email to a company	0.2536	0.4300
Followed a company in social media	0.0052	0.8000
Downloaded content from a website	-0.0580	-1.2000
None of the above	0.0027	0.1700

Regarding the *Likelihood of purchasing a product or service based on alternative sources of informing about it* as presented in Figure 8 below, it is evident that age dependence (i.e. the difference between Millennials and Generation X) is statistically significant at the 1% level of significance in terms of internet search, and statistically significant at the 10% level of significance regarding articles from the internet and others' reviews. The study findings exploring changes on that issue due to COVID, showed that the only increase observed is the likelihood of purchasing a product or service that a consumer being informed "Through an email he/she received in his/her email" and through a "Press Conference", from the Generation X age group. All other options for both age groups seem decreased.

Comparing consumer behavior before and after COVID as measured in our study, to the relevant one before COVID as measured by Birdahas (2017), it is evident that Birdahas'

(2017) ranking in terms of the likelihood of purchasing a product or service that consumers were informed through various information sources is similar for the sample as a total, the ranking of different sources of information is as follows "By searching the internet" ranks first followed by "From other people's reviews", "From a post of a business on social media", "From an article that went up on the internet", "Through an email you received in your email" and lastly by "Press conference". Also, the ranking of the various sources of information for both age groups (Millennials, Generation X) and the sample as a total in terms of the likelihood of purchasing a product or service was similar for Birdahas (2017) and the present study. Overall, a decline in outbound marketing after COVID as compared to before COVID was observed.

Figure 8: Likelihood of purchasing a product/service based on alternative sources of informing about it



	Age				t	p
	Generation X		Millennials			
	Mean	std	Mean	std		
Interviewing	2.05	1.02	1.69	0.86	3.34	<0.001
From a business post on social media	2.31	1.02	2.43	0.99	-1.01	0.311
Via an email you received in your email	2.17	1.05	2.11	0.88	0.60	0.551
From an article posted on the internet	2.52	1.06	2.33	0.97	1.66	0.098
Searching the internet	3.45	1.22	2.86	1.22	4.09	<0.001
Reading reviews	2.98	1.25	2.71	1.19	1.90	0.059

	Age	
	Generation X	Millennials
	% Change COVID	
Interviewing	0,47	-7.00%
From a business post on social media	-19.00%	-60.00%
Via an email you received in your email	17.00%	-11.00%
From an article posted on the internet	-16.00%	-32.00%
Searching the internet	-18.00%	-107.00%
Reading reviews	-44.00%	-80.00%

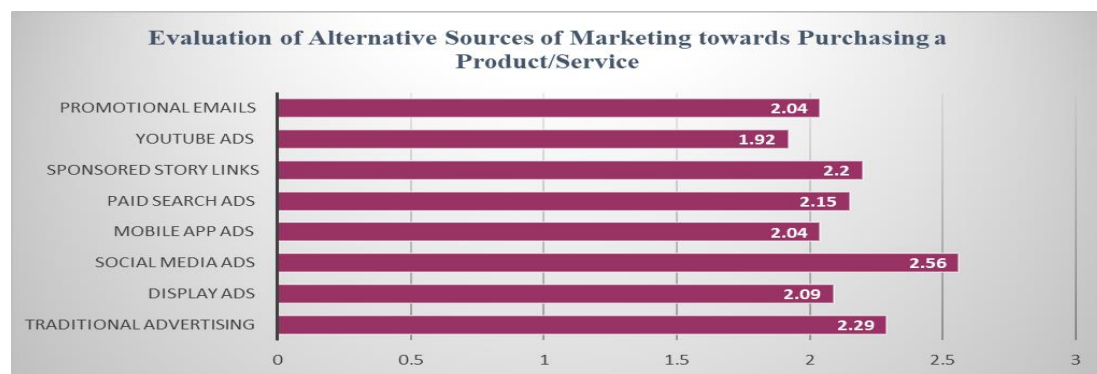
Regarding the *Evaluation of Alternative Sources of Marketing towards Purchasing a Product/Service*, as presented in Figure 9 below, it is evident that age dependence (i.e. the difference between Millennials and Generation X) is statistically significant at 1% level of

significance for traditional advertising, display ads and sponsored story links, and not statistically significant for all other marketing strategies.

The study findings exploring changes on that issue due to COVID, showed that for the Generation X age group, an increase in all marketing options is evident, except for the "Social media ads" option, which remains stable while, for the Millennials age group, see drop in most marketing options is observed, except for "Paid search & "Mobile app ads". Comparing consumer behavior before and after COVID as measured in our study, to the relevant one before COVID as measured by Birdahas (2017), it is evident that: Birdahas' (2017) study, for the sample as a whole and for both age groups, ranked in terms consumer preferences of marketing tools towards purchasing a product/service "Social media" first, followed by "Traditional advertising", "Display ads", "Direct mail", "Pay-per-click ads" and lastly "Mobile app ads". In this study, the percentages obtained for each option were almost similar, the only difference being that Generation's X preferences on "Traditional advertising" were higher.

Therefore, in contrast to the findings discussed above for Figure 8, it is evidenced that for Generation X age group, digital marketing is more influential after COVID than it was before COVID, towards inducing them to purchase a product/service. In contrast, the relevant decline evidenced for the Millennials age group shows that they are no longer equally influenced by all types of marketing.

Figure 9: Evaluation of alternative sources of marketing towards purchasing a product/service



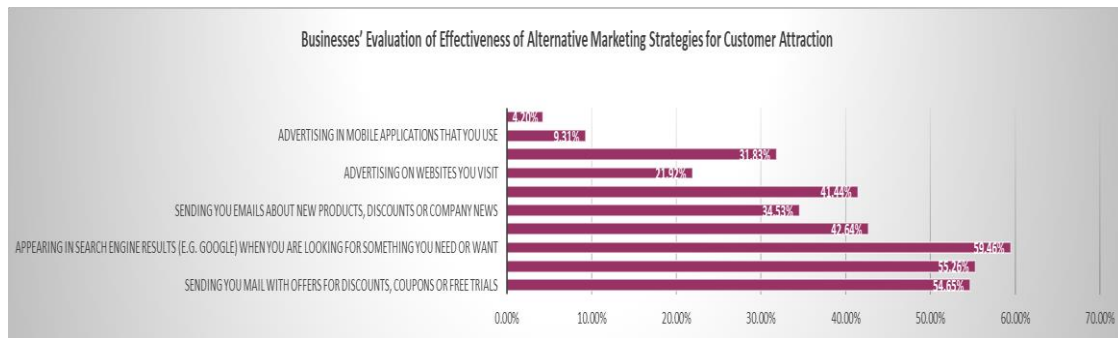
	Age				t	p
	Generation X		Millennials			
	Mean	std	Mean	std		
Traditional advertising	2.64	1.05	2.13	0.91	4.51	0.00
Display ads	2.28	0.96	2.00	0.85	2.61	0.01
Social media ads	2.44	1.11	2.62	1.04	-1.44	0.15
Mobile app ads	2.08	1.01	2.02	0.91	0.53	0.60
Paid search ads	2.18	0.99	2.13	1.01	0.42	0.68
Sponsored story links	1.92	0.99	2.32	1.05	-3.29	0.00
YouTube Ads	1.97	1.08	1.90	0.90	0.64	0.52
Promotional emails	2.13	1.07	2.00	0.95	1.15	0.25

	Age	
	Generation X	Millennials
	% Change COVID	
Traditional advertising	20.00%	-55.00%
Display ads	14.00%	-22.00%
Social media ads	0.00%	-13.00%
Mobile app ads	35.00%	23.00%
Paid search ads	43.00%	24.00%
Promotional emails	24.00%	-3.00%

Regarding the *Businesses' Evaluation of Effectiveness of Alternative Marketing Strategies for Customer Attraction*, as presented in Figure 10 below, it is evident that age dependence (i.e. the difference between Millennials and Generation X) is statistically significant at the 1% level of significance for emails about offers and free content on topics of interest, statistically significant at the 10% level of significance in terms of appearance in search engine results and social media posts, and not statistically significant for all other marketing strategies.

The study findings exploring changes on that issue due to COVID, showed that the Millennial age group seems to find almost all ways that a business attract customers equally effective, while Gen X age group seems to prefer even after covid-19, more traditional marketing strategies such as TV and email, although at the same time an increase in "With ads on websites you visit" and in "With ads on mobile apps you use" is observed. Furthermore, comparing consumer behavior before and after COVID as measured in our study, to the relevant one before COVID as measured by Birdahas (2017), it is evident that in both studies for both age groups and for the sample as a total "ads in search engine results" ranks first, followed by "sending mailings with offers (discounts, coupons, free trials)", "through posts on social media to which you have an account", "offering free content on a topic you are interested in", and finally "through ads on TV, radio".

Figure 10: Businesses’ evaluation of effectiveness of alternative marketing strategies for customer attraction



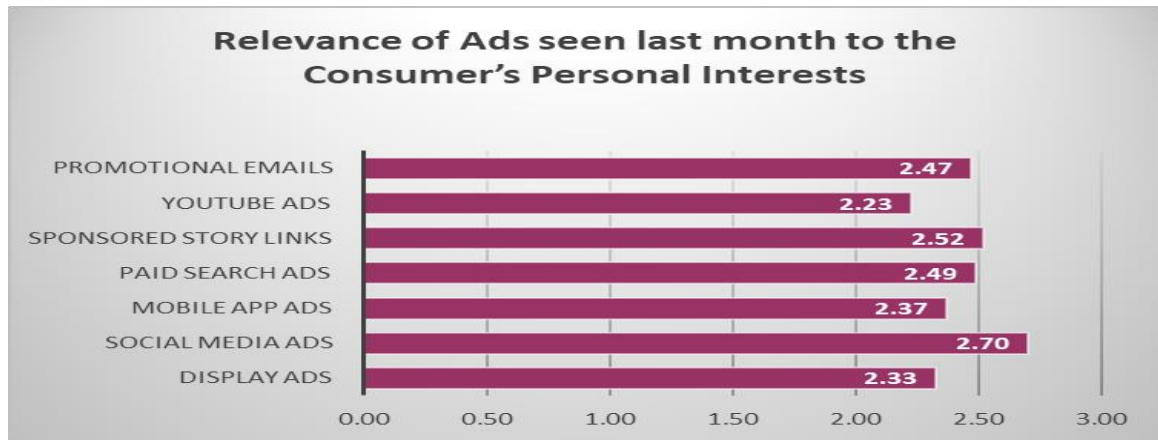
	Age				Z	p
	Generation X		Millennials			
	N	%	N	%		
Sending you mail with offers for discounts, coupons or free trials	44	41.90%	138	60.53%	-3.21	0.001
Offering you free content (e.g. articles) on a topic of interest to you	39	37.14%	145	63.60%	-4.64	<0.001
Appearing in search engine results (e.g. Google) when you are looking for something you need or want	52	49.52%	146	64.04%	-2.52	0.012
Advertising on TV, radio, billboards and newspapers	43	40.95%	99	43.42%	-0.42	0.673
Sending you emails about new products, discounts or company news	31	29.52%	84	36.84%	-1.30	0.193
Posting on the social media you have an account with	33	31.43%	105	46.05%	-2.53	0.012
Advertising on websites you visit	22	20.95%	51	22.37%	-0.29	0.772
Advertising on the social media you have an account with	28	26.67%	78	34.21%	-1.37	0.171
Advertising in mobile applications that you use	13	12.38%	18	7.89%	1.31	0.192
None of the above	7	6.67%	7	3.07%	1.52	0.129

	Age	
	Generation X	Millennials
	% Change COVID	
Sending you mail with offers for discounts, coupons or free trials		
Offering you free content (e.g. articles) on a topic of interest to you	-5.34%	26.97%
Appearing in search engine results (e.g. Google) when you are looking for something you need or want	-10.66%	0,127
Advertising on TV, radio, billboards and newspapers	13.52%	6.25%
Sending you emails about new products, discounts or company news	-1.46%	13.74%
Posting on the social media you have an account with	-4.85%	1.13%
Advertising on websites you visit	0.60%	7.93%
Advertising on the social media you have an account with	-2.53%	-2.96%
Advertising in mobile applications that you use	3.53%	3.61%
None of the above	4.02%	0.40%

Regarding the *Relevance of Ads seen in June 2024 to the Consumer’s Personal Interests*, as presented in Figure 11 below, it is evident that age dependence (i.e. the difference between Millennials and Generation X) does not show statistically significant differences. The study findings exploring changes on that issue due to COVID, showed that ads seen are not relevant to users' personal interests, and even less relevant after COVID than before COVID. Comparing consumer behavior before and after COVID as measured in our study, to the relevant one before COVID as measured by Birdahas (2017), it is evident that Birdahas’ (2017) study ranked for the whole sample first “Social media ads”, followed by “display ads”, “Paid search ads” “Sponsored story links”, and finally “Mobile app ads”. This ranking applies for the sample as a total and for both the age groups studied. In this study “Paid search ads” also rank second along with “Sponsored story links”, while “Mobile app ads” along with

“Display ads” rank in the third place. Minor ranking differences are evidenced between the sample as a total and the two age groups.

Figure 11: Relevance of ads seen in June 2024 to the consumer’s personal interests

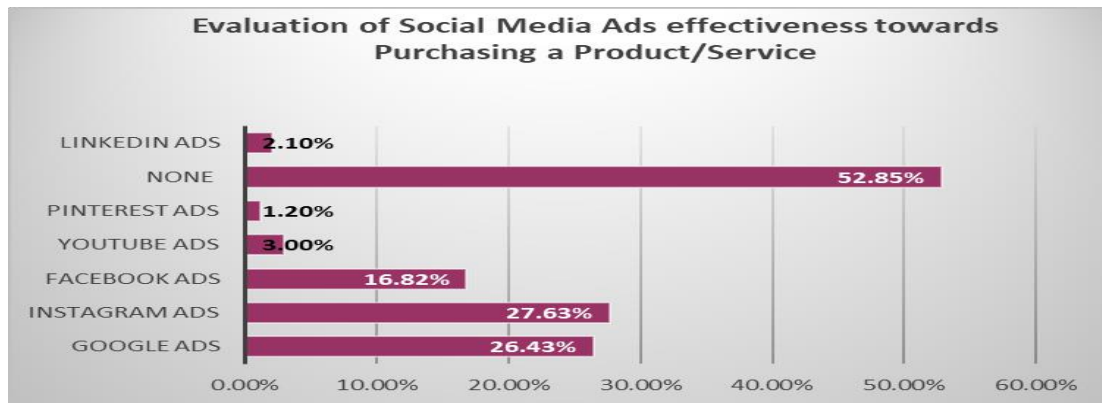


	Age				t	p
	Generation X		Millennials			
	Mean	std	Mean	std		
Display ads	2.48	1.19	2.27	1.27	1.42	0.158
Social media ads	2.68	1.35	2.71	1.42	-0.23	0.815
Mobile app ads	2.34	1.20	2.38	1.18	-0.28	0.782
Paid search ads	2.57	1.24	2.45	1.23	0.85	0.395
Sponsored story links	2.39	1.24	2.58	1.25	-1.28	0.201
YouTube Ads	2.18	1.18	2.25	1.22	-0.49	0.628
Promotional emails	2.53	1.34	2.44	1.30	0.59	0.559

	Age	
	Generation X	Millennials
	% Change COVID	
Display ads	-20.00%	-61.00%
Social media ads	-34.00%	-71.00%
Mobile app ads	3.00%	5.00%
Paid search ads	-6.00%	-38.00%
Sponsored story links	-19.00%	-24.00%

Social media platforms are becoming more sophisticated. No longer just a way for someone to just meet friends, many social networks are becoming the perfect place for brands to promote and sell their products. Especially for the younger generations, which is why this study pays special attention to studying generational preferences. The Status of Social Commerce 2021 report found that 97% of Gen Z uses social media as their top shopping inspiration. With such activity of this generation on social media, it would be inconceivable for companies/brands not to explore a purchase option on these media. After all, the global social media commerce market is projected to reach \$604.5 billion by 2027, making the future of social media marketing look very bright. Regarding the *Evaluation of Social Media Ads effectiveness towards Purchasing a Product/Service*, as presented in Figure 12 below, it is evident that age dependence (i.e. the difference between Millennials and Generation X) is statistically significant at the 5% level of significance for Instagram and LinkedIn ads, an not statistically significant for ads on all other social media.

Figure 12: Evaluation of social media ads effectiveness towards purchasing a product/service



5. Conclusions

The main research objective of this study was to explore and understand the challenges that emerged in digital marketing during the COVID 19 pandemic. In addition, this study focused on the changes that tend to become entrenched, on a day-to-day level, and explored how these changes and new challenges affect business marketing in the future and after the pandemic is over. To this end, an attempt was made to answer questions concerning the way in which business marketing strategies and the consumption decisions of Greeks have been affected. The present study attempted to record and evaluate the age dependence (i.e. the difference between Millennials and Generation X) in consumer preferences on marketing strategies and the COVID dependence, i.e. the changes in consumer preferences on marketing strategies for the aforementioned age groups before and after the COVID-19 pandemic, comparing and critically evaluating the survey findings against those of a relevant study of Birdahas (2017) before COVID-19. The main conclusions of the study can be summarized as follows:

Generation X after COVID is more likely to follow a business on its account versus pro-covid period. Additionally, a drop in the use of outbound marketing is evidenced for Generation X age group, as they are no longer appear as likely to purchase a product/service through an outbound marketing medium. Generation X age group are now more likely to purchase a product or service through advertising and as an increase in all advertising media was observed for this age group. In contrast, it was observed that Millennials after COVID, are no longer equally influenced by all types of marketing, except for "Pay-per-click" & "Mobile app ads". Furthermore, it was evidenced Millennials to be more exposed to ads than Generation X during COVID (in 2021), as compared to previous studies (2017). By extension, Millennials click more on ad types than Generation X.

For both age groups (Generation X and Millennials), for "Pay-per-click ads" & "Mobile app ads" an increased use was evidenced, as compared to previous studies, Both Millennials and

Generation X responded that the ads they see are not relevant to their personal interests. After COVID-19 Millennials use fewer ad blockers, while Generation X use more than before COVID, as reported by other studies. Therefore, many of Generation X's responses is likely to be affected by the increased use of ad blockers during COVID-19.

Finally, Millennials find almost all marketing strategies that a business can employ to attract customers effective, while Generation X seem to prefer even after COVID-19, more traditional media such as TV and email, while at the same time an increase in the "With ads on websites you visit" option and in the "With ads on mobile apps used" option is observed. These findings are extremely important for companies and policy makers for shaping and implementing their future marketing strategy, exploiting Greece' digital transformation and leading their businesses to growth.

The scope of this study was to examine the effects and implications of the current COVID 19 pandemic on business marketing strategies, the rise of digital marketing and whether it is effective in the effort to promote and ultimately increase a business's sales. However, as is understandable, the topic of this paper is dynamic as it is constantly evolving. Thus, it would be useful at a subsequent stage to re-conduct new research carrying out on a sample of Millennials and Generation X in both urban and non-urban - rural areas. Furthermore, useful findings could be also obtained if a new survey was conducted using other alternative methods instead of using a structured questionnaire. Ultimately, and perhaps most importantly, this survey should be conducted once the pandemic has conclusively ended, likely in two to three years, to examine the new attitudes of respondents shaped by the post-COVID era.

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