

Impact of limited availability and immediate gratification promotional strategies on impulse buying behaviour online : A comparative analysis among Algerian consumers**BENARAB Imen Hanane**Higher School of Management and Digital Economy (Algeria), ibenarab@esgen.edu.dz**Received:** 11/03/2025**Accepted:** 04/11/2025**Published:** 25/11/2025**Abstract:**

In this article, which answers the question : *To what extent do limited availability and immediate gratification, used as online promotional strategies, influence the impulse buying behaviour of Algerian consumers ?* We analysed the impact of these two strategies on the impulse buying behaviour of Algerian online consumers through a comparative analysis, to understand the underlying psychological mechanisms, identify consumers' perceptions of these strategies and compare their effectiveness. To this end, we conducted a questionnaire survey of 270 online consumers. The results show that limited availability has a stronger influence on impulse purchases, that these two strategies are perceived as manipulative techniques, and that they often lead to a feeling of post-purchase regret, although this does not call into question their effectiveness. This enabled us to formulate ethical recommendations tailored to companies wishing to optimise their online sales strategies in Algeria.

Keywords: Impulse buying, Buying behaviour, Limited availability, Immediate gratification, Promotional strategies.

JEL Classification: M30, M310

1. Introduction:

The development of online commerce, marked by ever-increasing competition, has given rise to new promotional strategies based on psychological mechanisms (Negoita et al., 2019; Cheng et al., 2023) aimed at quickly prompting purchase by directly influencing consumers' decision-making processes. Among these strategies, those of *limited availability* and *immediate gratification*, which are based respectively on creating a sense of urgency (Zhang et al., 2022) and instant gratification (Djamhari et al., 2024), are frequently used on the Internet to maximise sales, including in Algeria.

Research question

In this context, the central question is: *To what extent do limited availability and immediate gratification, used as online promotional strategies, influence the impulse buying behaviour of Algerian consumers?*

Sub-questions

This question raises the following issues :

- What are the differences between these two promotional strategies on the psychological mechanisms of Algerian online consumers ?
- How do these consumers perceive companies' use of these strategies in their online promotional campaigns ?
- Which strategy is more effective in the Algerian context of online sales ?

Hypotheses

In order to answer these questions, we pose the following hypotheses :

H1 : Limited availability has a stronger influence on impulse buying than immediate gratification.

H2 : Algerian consumers' perception of these strategies is generally negative, although their effectiveness remains proven.

H3 : The effectiveness of promotional strategies depends on the psychological profile and consumption habits of consumers.

Interest of the study

This study is of particular importance for several reasons :

- It contributes to a better understanding of impulse buying behaviour in the Algerian context, an area that has yet to be fully explored.
- It is part of a current theme, as online commerce has become increasingly widespread in Algeria.
- It will help identify the most effective strategies for e-commerce companies operating in our country.
- It helps consumers to become aware of the techniques used to influence their purchasing decisions.
- It contributes to the scientific literature on the psychological mechanisms of impulse buying online, while encouraging reflection on more ethical and transparent marketing.

Methodology

To provide the most comprehensive answer to our research question, and given the nature of our study, we will rely on a descriptive analysis approach. First, we will conduct an in-depth literature review to clearly define the subject of our investigation. Following this, we will move on to a field study aimed at collecting primary data from Algerian online customers to assess the influence of limited availability strategies and immediate gratification on their impulsive purchasing behaviors.

Study objectives

The main objectives of this study are to :

- Define and clarify the concepts of limited availability and immediate gratification.
- Analyse the impact of these strategies on the impulse buying behaviours of Algerian consumers.
- Identify the differences in perception and effectiveness between the two strategies.
- Propose recommendations for companies to improve the transparency and ethics of online promotions.
- Contribute to academic research on the psychological mechanisms of online promotional strategies.

Previous studies

Several recent studies have explored the impact of online promotional strategies on impulse buying behaviour :

- **Cengiz & Şenel (2023)** analysed how perceived scarcity influences impulse buying tendencies and revealed that scarcity increases the perceived value of the product, prompting consumers to make spontaneous purchase decisions.
- **Singh & Mishra (2024)** sought to identify and classify the triggers for impulse purchases online. They conducted a review of 98 studies in order to analyse the external, internal and contextual factors that influence this behaviour, and thus to propose a unified theoretical framework to guide research into marketing strategies. They found that strategies combining scarcity and immediate gratification are the most effective in influencing decisions by playing on both negative (fear of missing out) and positive (pleasure) emotions.
- **Djamhari et al. (2024)**, who explored the relationship between immediate gratification, online promotions and impulse buying, indicate that immediate gratification acts as a mediator between promotions and impulse buying, highlighting the importance of fast digital payments in intensifying this behaviour.
- **Qureshi et al. (2025)** used a quantitative survey to explore the link between impulse buying tendencies and personality dimensions in order to identify how individual psychological aspects influence unplanned purchasing behaviour. They found that affective aspects (intense emotions) and cognitive aspects (difficulty in resisting) explain impulse buying. They showed that strategies that exploit scarcity (limited promotions) are more effective because they reinforce impulsivity.

2. The conceptual framework of the study:

2.1 Online purchases:

2.1.1. Definition of online purchases

Online purchases refer to all commercial transactions carried out via digital platforms, enabling consumers to buy goods or services without necessarily interacting physically with the seller.

Online purchases have grown considerably with the rise of e-commerce, offering convenience as well as accessibility to a wide range of products (Negoita et al., 2019). These purchases are characterised by the use of various digital channels, such as merchant websites, mobile applications and social networking platforms, thereby enhancing the consumer shopping experience (Lee & Charles. 2021; Cheng et al., 2023).

2.1.2. Typology of online purchases

These purchases can be classified into two main categories : considered and impulse buying (Ngo et al., 2024), which illustrate the diversity of consumer behaviour online and which are each based on distinct psychological factors and decision-making processes that companies exploit to optimise their promotional strategies.

- Considered buying

It is a rational purchasing decision, in which the consumer takes the time to seek information, compare alternatives and evaluate quality or price before finalising their purchase. This type of decision is often associated with products with strong financial or emotional implications, such as electronics or travel (Wu et al., 2020). A considered purchase involves a longer decision-making process (Rodrigues et al., 2021) in which the consumer seeks to maximise the value of their purchase and their long-term satisfaction takes precedence over immediate gratification.

- Impulse buying

Impulse buying is characterised by rapid and spontaneous decision-making. It is often triggered by external or emotional stimuli without prior in-depth consideration or serious evaluation of the alternatives (Lehmann et al., 2019; Xiaolin et al., 2021 ; Ngo et al., 2024). It plays an important role in online commerce, exploiting psychological mechanisms to encourage immediate purchase (Wu et al., 2020). Impulse buying can be motivated by factors such as perceived scarcity, time-limited promotions or immediate gratification (Cengiz & Şenel, 2023).

2.2. Online promotional strategies :

These refer to all the marketing techniques used by companies to stimulate sales and influence purchasing decisions (Liu, 2022 ; Zhang et al., 2023) through attractive offers distributed on digital platforms.

2.2.1. How online promotional strategies work

These strategies exploit various psychological levers (Singh & Mishra, 2024), adapting to the behaviour of users identified through data collected on their preferences and purchasing habits (Cheng et al., 2023).

In fact, they rely on cognitive and emotional biases to influence consumers and encourage them to buy. Among these biases, the Fear Of Missing Out (FOMO), urgency, the need for gratification, or the perception of scarcity are particularly effective in online commerce (Wu et al., 2020) to trigger impulse purchases by playing on intense emotions (Lehmann et al., 2019; Ngo et al., 2024 ; Singh & Mishra, 2024) which limit consumers' rational thinking.

2.2.2. Diversity of promotional strategies

There are several types of online promotional strategies, including :

- *Limited availability*, which consists of playing on the limited quantity of the product or the duration of a promotion.
- *Immediate gratification*, by offering immediate benefits to those who buy.
- *Bundle offers*, which gives the impression of getting more for the same price.
- *Strike-through pricing*, which consists of displaying the old strike-through price next to the promotional price to highlight the savings made.
- *Flash sales*, offering a promotion available for just a few hours.
- *Free shipping threshold*, where the delivery is offered on purchases over a certain amount.

For this study, we have chosen the two strategies of limited availability and immediate gratification because of their high prevalence in online commerce and their demonstrated impact on impulse buying behaviour (Wu et al., 2020; Djamhari et al., 2024).

2.3 Focus on limited availability and immediate gratification :

2.3.1. Definition of the two strategies

- Limited availability

This strategy is based on the perceived scarcity of a product or promotional offer. It consists of restricting the number of products available or the duration of the promotion, which creates psychological pressure encouraging consumers to make a purchase quickly for fear of missing the opportunity (Cengiz & Şenel, 2023 ; Qureshi et al. 2025). Zhang et al. (2022) and Khan et al. (2023) point out that perceived scarcity acts as an emotional trigger, which will increase the perceived value of the product and thus reduce the time taken to think before buying. This strategy is based, according to Cengiz & Şenel (2023) on the psychological principle that individuals place greater value on goods perceived as rare.

- Immediate gratification

This strategy refers to the instant gratification felt by the consumer when acquiring a product or service (Morozova & Vlaev, 2024). It is often associated with offers such as immediate discounts or instant access to digital content. Morozova & Vlaev (2024) explain that this strategy is based on the brain's reward system, which prioritises immediate satisfaction over future benefits and, according to Djamhari et al. (2024), exploits consumers' need to obtain a reward quickly, which encourages impulse buying decisions.

2.3.2. Comparison of the two strategies

Although limited availability and immediate gratification are both aimed at encouraging impulse purchases, they operate according to distinct psychological mechanisms. The former acts primarily on the Fear Of Missing Out (FOMO) which drives consumers to make quick decisions to avoid potential loss (Wu et al., 2020), while the latter

exploits the desire for instant gratification, by mirroring to consumers the prospect of an immediate reward (Lee et al., 2023).

These two strategies have points in common, notably their ability to trigger strong emotions in consumers and reduce their time to think. That said, their effectiveness may vary depending on the cultural context and consumer habits. Ngo et al (2024) highlight that the impact of limited availability is often greater in environments where consumers have limited experience of e-commerce, while immediate gratification may be more influential with younger consumers used to digital transactions. In the Algerian market, where online shopping practices are still developing, it is relevant to examine which of these strategies proves to be the most effective and thus enable businesses to better understand how these psychological mechanisms can be exploited to influence consumer behaviour, and increase their online sales.

3. Field study

3.1 Survey methodology :

In order to address our problem and verify our hypotheses, we conducted a quantitative study among Algerian online consumers. The aims of the study were to

- Understand how Algerian consumers perceive the promotional strategies of limited availability and immediate gratification.
- Measure the impact of each on impulse buying on the Internet and compare their effectiveness.
- Define the perception of constraint or manipulation exerted by these strategies.
- Evaluate the possible reconsideration after the purchase.

The tool chosen for data collection was the questionnaire. We administered our questionnaire online via our personal and professional networks to ensure that it would be widely distributed and reached a large audience, even one that was geographically dispersed, in a short space of time, while ensuring the anonymity of the participants.

3.2. Description of the questionnaire :

Our questionnaire contains only closed-ended questions, which have the advantage of facilitating quantitative data analysis and ensuring uniformity of responses (LeSphinx, 2023), thus enabling clear comparisons between the different variables. The majority of our questions are Likert scale questions, which allow us to accurately measure the intensity of respondents' perceptions and attitudes (Yohan, 2024), providing standardised and comparable data.

Apart from questions designed to collect respondents' socio-demographic information, our questionnaire is structured into four areas as follows

Axis 1: Online shopping habits, which aims to gather information on participants' online shopping behaviour.

Axis 2. Perception of promotional strategies, to assess consumers' perception of limited availability and immediate gratification strategies, as well as their feelings about the pressure or manipulation associated with these practices.

Axis 3. Impact on impulse buying behaviour, to assess the extent to which these promotions influence impulse buying decisions, highlighting consumers' reactivity to each strategy.

Axis 4. Post-purchase reconsideration, which explores the possible feelings of post-purchase regret that determine future purchases.

3.3. Target population and sample :

Our survey covers the Algerian consumers aged 18 and over who have previous experience of buying online.

After distributing our questionnaire online over a two weeks period from 18 February 2025 to 4 March 2025, we selected a sample of 270 people who correspond to the target population. Even if this sample remains of convenience, its large size allows us to understand the phenomenon studied, to provide empirical results to support the comparative analysis of the two promotional strategies and to formulate recommendations adapted to the Algerian context.

4. Results analysis:

We used SPSS 24 to analyze the responses. We applied various statistical tests to examine the data and extract relevant information for our study.

- **Reliability test** : We began with a reliability test to evaluate the internal consistency of the measurement scale and verify the instrument's validity.

Table 1. Reliability statistics

Cronbach's	
Alpha	Items number
,796	19

Source : SPSS24 analysis

Cronbach's alpha, which measures the internal consistency of our questionnaire and our measurement scale, is equal to 0.796 with 19 of the 20 items we have, which indicates that our items measure the same concept in a homogeneous manner and that our scale offers a reasonable level of confidence, thus signifying satisfactory internal consistency and good reliability of our measurement

- **Frequency analysis** : we conducted this analysis to assess the frequency with which respondents make online purchases and whether they are used to encountering the two promotional strategies of *limited availability* and *immediate gratification*.

Table 2. How often do you shop online ?

		Frequency	Percentage	Valid percentage	Cumulative percentage
Valid	Sometimes	48	17,8	17,8	17,8
	Often	132	48,9	48,9	66,7
	Always	90	33,3	33,3	100,0
	Total	270	100,0	100,0	

Source: SPSS24 analysis

On the basis of this question, we were able to select the 270 respondents who correspond to our target group, i.e. people who are used to making online purchases and who are most likely to provide relevant answers to our questionnaire. In fact, from this table we can see that our sample is made up entirely of online shoppers, with 222 of the 270 people doing so Often to Always, which represents over 82% of our sample.

Table 3. I often come across online promotions based on limited availability (e.g., limited stock, limited spots, etc.)

		Frequency	Percentage	Valid percentage	Cumulative percentage
Valid	Disagree	9	3,3	3,3	3,3
	Neutral	27	10,0	10,0	13,3
	Agree	147	54,4	54,4	67,8
	Strongly agree	87	32,2	32,2	100,0
	Total	270	100,0	100,0	

Source : SPSS24 analysis

According to this table, 234 (=147+87) out of 270 people, representing 86.6% of our sample, confirm that they encounter promotional techniques based on limited availability when they are online.

Table 4. I often come across online promotions based on immediate gratification (Get -30% off right now!, Enjoy free shipping immediately, etc.)

		Frequency	Percentage	Valid percentage	Cumulative percentage
Valid	Strongly disagree	9	3,3	3,3	3,3
	Disagree	30	11,1	11,1	14,4
	Neutral	27	10,0	10,0	24,4
	Agree	111	41,1	41,1	65,6
	Strongly agree	93	34,4	34,4	100,0
	Total	270	100,0	100,0	

Source : SPSS24 analysis

This table shows that 204 (=111+93) of our respondents have encountered promotions based on immediate gratification techniques, which represents 75.5% of our sample.

From tables 2, 3 and 4, we can conclude that the majority of our respondents are exposed to promotional strategies when they are purchasing on the net.

- **ANOVA tests** : We proceeded to a first one-way ANOVA test to analyze whether there are statistically significant differences between the different age levels regarding the propensity to buy when promotions are offered and their sensitivity in relation to the two promotional strategies under our study.

Table 5. ANOVA test-AGE/Reaction to promotions

		Sum of squares	DDL	Mean square	F	Sig.
I am more inclined to buy when an online promotion is available	Inter-groups	11,529	4	2,882	2,355	,054
	Intragroups	324,337	265	1,224		
	Total	335,867	269			
I am often attracted to promotions based on limited availability (e.g., limited stock, limited spots, etc.)	Inter-groups	27,605	4	6,901	5,033	,001
	Intragroups	363,361	265	1,371		
	Total	390,967	269			
Promotions offering immediate gratification (Get - 30% off right now!, Enjoy free shipping immediately, etc.) push me to finalize my purchase quickly	Inter-groups	19,996	4	4,999	3,728	,006
	Intragroups	355,371	265	1,341		
	Total	375,367	269			
Time-limited promotions push me to buy without prior planning	Inter-groups	14,496	4	3,624	2,658	,033
	Intragroups	361,371	265	1,364		
	Total	375,867	269			
When an offer is limited, I feel that I will miss an opportunity if I don't buy immediately	Inter-groups	17,275	4	4,319	3,604	,007
	Intragroups	317,525	265	1,198		
	Total	334,800	269			
Promotions offering immediate gratification (Get - 30% off right now!, Enjoy free shipping immediately, etc.) strengthen my desire to buy without thinking	Inter-groups	26,134	4	6,533	4,117	,003
	Intragroups	420,566	265	1,587		
	Total	446,700	269			
I am more likely to buy impulsively when an offer is limited	Inter-groups	13,975	4	3,494	2,541	,040
	Intragroups	364,325	265	1,375		
	Total	378,300	269			

Source : SPSS24 analysis

All the results are below the 0.05 level of significance, which means that there is a significant difference between the various age levels in terms of willingness to make impulse purchases when there is a promotion, and in terms of attraction to each of the two strategies studied.

Then we conducted a second ANOVA test to determine if the different age levels influence the perception our respondents have on on line promotional strategies as manipulation.

Table 6. ANOVA test-Perception of promotions as manipulation

I perceive promotional strategies as techniques to manipulate consumers

	Sum of squares	DDL	Mean square	F	Sig.
Inter-groups	6,729	4	1,682	1,438	,222
Intragroups	310,071	265	1,170		
Total	316,800	269			

Source : SPSS24 analysis

This test carried out on the perception of promotions as a technique for manipulating consumers gives a value of Sig. = 0.222 which is above the significance level of 0.05, meaning that the difference between the groups is not statistically significant. In other words, respondents of all ages have a homogeneous perception of promotions as a form of manipulation.

- **Dispersion tests** : We carried out various dispersion tests to measure the variability or spread of the responses obtained, as follows :

Table 7. Dispersion- Perception of promotions as manipulation

	N	Minimum	Maximum	Mean	Standard deviation
I perceive promotional strategies as techniques to manipulate consumers	270	1	5	3,93	1,085
N valid (list)	270				

Source : SPSS24 analysis

The average of 3.93 out of 5 indicates that the majority of respondents have a relatively strong perception of promotions as a lever for manipulation when the standard deviation of 1.085 shows that the variability in responses is moderate.

Table 8. Dispersion- Propensity to buy when a promotion is offered

	N	Minimum	Maximum	Mean	Standard deviation
I am more inclined to buy when an online promotion is available	270	1	5	3,58	1,117
I am often attracted to promotions based on limited availability (e.g., limited stock, limited spots, etc.)	270	1	5	3,66	1,206
Promotions offering immediate gratification (Get - 30% off right now!, Enjoy free shipping immediately, etc.) push me to finalize my purchase quickly	270	1	5	3,26	1,181

Promotions offering immediate gratification (Get - 30% off right now!, Enjoy free shipping immediately, etc.) strengthen my desire to buy without thinking	270	1	5	3,30	1,289
I am more likely to buy impulsively when an offer is limited	270	1	5	3,57	1,186
N valid (list)	270				

Source : SPSS24 analysis

This dispersion analysis aims to assess the influence of online promotions, particularly those based on limited availability and immediate gratification, on consumer purchasing behaviour. We obtained the following results :

- For the proposition « I am more inclined to buy when an online promotion is available » we obtained a mean $M = 3.58$ and a standard deviation = 1.117, indicating that respondents have a high tendency to be influenced by online promotions.
- For the proposition « I am often attracted to promotions based on limited availability », the mean is higher ($M = 3.66$), meaning that promotions displaying limited availability are more attractive to consumers.
- For the proposition « I am more likely to buy impulsively when an offer is limited » we have $M = 3.57$ and standard deviation = 1.186, which suggests a probable correlation between perceived scarcity and impulse buying. In fact, the score is similar to that of the first proposition, which means that limited availability plays an important role in the impulse purchase decision.
- For the proposition « Promotions offering immediate gratification push me to finalize my purchase quickly », the mean is 3.26, which means that promotions based on immediate gratification have a slightly weaker effect than limited availability.
- For the proposition « Promotions offering immediate gratification strengthen my desire to buy without thinking », we have a score which is close to the previous one ($M = 3.30$ and standard deviation = 1.289), which reinforces the idea that even if immediate gratification can provoke an impulse purchase, its effect remains less marked than that of limited availability.

Table 9. Dispersion- Post-purchase perception

	N	Minimum	Maximum	Mean	Standard deviation
I am satisfied with my purchases made under the effect of promotions based on limited availability (e.g., limited stock, limited spots, etc.)	270	1	5	3,07	,906
After buying under the effect of a promotion based on limited availability, I feel regret	270	1	5	3,38	,986
I am satisfied with my purchases made under the effect of promotions offering immediate gratification (Get - 30% off right now!, Enjoy free shipping immediately, etc.)	270	1	5	2,98	,944
After buying under the effect of a promotion offering immediate gratification, I feel regret	270	1	5	3,39	,976
N valid (list)	270				

Source : SPSS24 analysis

This third dispersion analysis enabled us to compare the post-purchase perceptions (satisfaction, regret) generated by our two strategies.

➤ *Comparison of perceived satisfaction*

With regard to limited availability, for the proposition « I am satisfied with my purchases made under the effect of promotions based on limited availability », we obtained an average $M = 3.07$ and a standard deviation = 0.906, which indicates that satisfaction is positive and that the responses are convergent. However, as far as immediate gratification is concerned, we obtained a score of $M = 2.98$ and standard deviation = 0.944 for the proposition « I am satisfied with my purchases made under the effect of promotions offering immediate gratification », which shows that satisfaction is lower than for promotions based on scarcity. This means that the limited availability strategy appears to be more effective in generating post-purchase satisfaction.

➤ *Comparison of regret felt*

For limited availability, we obtained for the proposition « After buying under the effect of a promotion based on limited availability, I feel regret », $M = 3.38$ and the standard deviation = 0.986. For immediate gratification with the proposition « After buying under the effect of a promotion offering immediate gratification, I feel regret », we have $M = 3.39$ and the standard deviation = 0.976. These results indicate that the two strategies can lead to impulse purchases generating similar levels of regret, and more marked than the levels of satisfaction (the means being higher than those for satisfaction).

- **Linear regression :** Through this analysis, we first seek to determine which of the two promotional strategies studied has the greatest influence on impulse buying by online consumers, then to find out whether the regret felt after a purchase can lead people to stop responding to promotions.

Table 10. Coefficients^a- Influence of the two strategies on impulse buying

Model		Non-standardised coefficients		Standardised coefficients	t	Sig.
		B	Standard error	Beta		
1	(Constant)	,815	,156		5,239	,000
	I am often attracted to promotions based on limited availability (e.g., limited stock, limited spots, etc.)	,375	,084	,405	4,483	,000
	Promotions offering immediate gratification (Get -30% off right now!, Enjoy free shipping immediately, etc.) push me to finalize my purchase quickly	-,256	,111	-,271	-2,296	,022
	Time-limited promotions push me to buy without prior planning	,344	,136	,364	2,525	,012
	Promotions offering immediate gratification (Get -30% off right now!, Enjoy free shipping immediately, etc.) strengthen my desire to buy without thinking	-,119	,160	-,137	-,745	,457
	I am more likely to buy impulsively when an offer is limited	,414	,085	,440	4,870	,000

a. Dependent variable : I am more inclined to buy when an online promotion is available

Source : SPSS24 analysis

This table analyses the influence of our two strategies on the propensity to buy impulsively when a promotion is available online, which is therefore our dependent variable. The results show that promotions based on limited availability (scarcity and limited time) significantly increase this propensity to buy on impulse, whereas those offering immediate gratification appear to be more mitigated. We found that impulse buying under scarcity was the most predictive factor (with $B = 0.414$, $p < 0.001$), indicating the importance of the perception of urgency and scarcity in promotional buying behaviour.

Table 11. Coefficients^a- Impact of regret on response to promotions

Model		Non-standardised coefficients		Standardised coefficients	t	Sig.
		B	Standard error	Beta		
1	(Constant)	2,844	,243		11,690	,000
	After buying under the effect of a promotion based on limited availability, I feel regret	,307	,242	,271	1,271	,205
	After buying under the effect of a promotion offering immediate gratification, I feel regret	-,089	,244	-,078	-,367	,714

a. Dependent variable : I am more inclined to buy when an online promotion is available

Source : SPSS24 analysis

Post-purchase regret experienced in response to a promotion based on limited availability has a positive but non-significant effect ($B=0.307$, $P=0.205$), which means that it has no statistically proven influence on the propensity to buy under promotion. On the other hand, the effect of immediate gratification is negative but not significant ($B= -0.089$, $P=0.714$), which indicates that it does not affect consumers' propensity to respond to promotions.

5. Conclusion:

This study, whose central question was : *To what extent do limited availability and immediate gratification, used as online promotional strategies, influence the impulse buying behaviour of Algerian consumers?*, looked at the impact of two online promotional strategies, namely limited availability and immediate gratification on the impulse buying behaviour of Algerian consumers. It aimed not only to compare the effectiveness of these two strategies, but also to analyse their perception by consumers and thus proposing recommendations for optimising these practices by companies while remaining ethical.

To this end, we carried out a quantitative study using questionnaires among 270 Algerian consumers who regularly shop online, which led us to the following results:

- Limited availability strategies, based on perceived scarcity (limited stock, short duration), have a significantly stronger influence on impulse purchases than strategies based on immediate gratification.
- Although these two strategies are perceived by the majority of respondents as manipulative techniques, their effectiveness does not seem to be called into question.
- Statistically significant differences exist between different age levels in terms of sensitivity to promotions, underlining the importance of targeting audiences according to specific criteria.
- Impulse purchases generated by these promotions are often followed by a moderate level of post-purchase satisfaction but a significant level of regret. However, this does not seem to deter consumers from responding to future promotions.

These results allow us to confirm our initial hypotheses :

H1: Limited availability has a stronger influence on impulse buying than immediate gratification. **Confirmed.**

H2: Algerian consumers' perception of these strategies is generally negative, although their effectiveness remains proven. **Confirmed.**

H3 : The effectiveness of promotional strategies depends on the psychological profile and consumption habits of consumers. **Confirmed.**

Based on these findings, we can make the following recommendations for companies wishing to sell products online to Algerian consumers :

- Favour limited availability strategies, while skilfully combining them with immediate rewards (instant discount, instant free delivery, etc.), to maximise consumer engagement and impulse purchases.
- Combine scarcity with perceived added value (e.g. exclusive packaging, free bonus, etc.) to enhance its appeal.
- Adopt a transparent approach, communicating clearly about the terms and conditions of promotions to reinforce the company's credibility and avoid a feeling of manipulation, which could undermine consumers' long-term trust.
- Avoid aggressive promotions which can put psychological pressure on consumers thereby damaging their experience of the company.
- Accompany promotions with guarantees (e.g. return policies, customer assistance) to reduce post-purchase regret, avoid a negative impact on brand image and strengthen consumer loyalty.
- Exploit data from buying behaviour to analyse consumer preferences in real time and propose personalised promotions according to the target by dynamically adjusting offers to match their expectations.
- Follow up the impulse buying generated by promotions with loyalty actions to transform this one-off act into a lasting relationship with the consumer.

Even if our present study contributes to the understanding of the psychological dynamics linked to the strategies of limited availability and immediate gratification and

their impact on impulse purchases online in Algeria, by offering avenues for aligning these strategies with consumer expectations, several questions remain open and deserve to be explored in greater depth in future research. In fact, it would be relevant to analyse in more detail the long-term impact of these strategies on customer loyalty. In addition, changes in purchasing behaviour with the emergence of new technologies (Artificial Intelligence and Augmented Reality) pose challenges that deserve to be explored. Finally, it would be useful to compare different markets (e.g. developed countries and emerging economies), to better understand how these strategies are adapted to different cultural and economic contexts.

6. References:

- 1-Cengiz, H., Şenel, M. (2023). The effect of perceived scarcity on impulse-buying tendencies in a fast fashion context : A mediating and multigroup analysis. *Journal of Fashion Marketing and Management : An International Journal*. Vol.28. doi : 10.1108/JFMM-03-2023-0082.
- 2-Cheng, X., Deng, S., Jiang, X., & Li, Y. (2023). Optimal promotion strategies of online marketplaces. *European Journal of Operational Research*. 306(3). 1264-1278. <https://doi.org/10.1016/j.ejor.2022.08.020>.
- 3-Djamhari, S. I., Mustika, M. D., Sjabadhyni, B., & Ndaru, A. R. P. (2024). Impulsive buying in the digital age : investigating the dynamics of sales promotion, FOMO, and digital payment methods. *Cogent Business & Management*, 11(1). <https://doi.org/10.1080/23311975.2024.2419484>
- 4-Khan, J., Qu, Y., Su, Y., Tong, J., & Zhao, S. (2023). Impulse buying tendency in live-stream commerce : The role of viewing frequency and anticipated emotions influencing scarcity-induced purchase decision. *Journal of Retailing and Consumer Services*. Vol.75. <https://doi.org/10.1016/j.jretconser.2023.103534>.
- 5-Lee, L., Charles, V. (2021). The impact of consumers' perceptions regarding the ethics of online retailers and promotional strategy on their repurchase intention. *International Journal of Information Management*. Vol. 57. <https://doi.org/10.1016/j.ijinfomgt.2020.102264>.
- 6-Lee, Y.Y., Gan, C.L., Liew, T.W. (2023). Rationality and impulse buying : Is your emotion a part of the equation?. *Computers in Human Behavior Reports*. Vol.12. <https://doi.org/10.1016/j.chbr.2023.100337>.
- 7-Lehmann, T.A., Krug, J., & Falaster, C.D. (2019). Consumer purchase decision : factors that influence impulsive purchasing. *Revista Brasileira de Marketing*, 18(4). 196-219. <https://www.redalyc.org/journal/4717/471767357010/html/>
- 8-LeSphinx. (2023). Questions fermées vs questions ouvertes : définition et recommandations. <https://www.lesphinx-developpement.fr/blog/questions-fermees-vs-questions-ouvertes-definition-et-recommandations/>
- 9-Liu, Z. (2022). Promotional Strategies on Online Platforms. These. University of Washington. <https://www.proquest.com/openview/4aac11f5904446f89c06ff9687b6a8a1/1?pq-origsite=gscholar&cbl=18750&diss=y>
- 10-Morozova, N., Vlaev, I. (2024). The urge to splurge : Differentiating unplanned and impulse purchases. *International Journal of Market Research*. 66(5). <https://doi.org/10.1177/14707853241229671>
- 11-Negoita, O.D., Purcărea, A.A., & Popescu, M.A. (2019). Research on Online Promoting Methods Used in a Technological Society. *Procedia Manufacturing*. Vol. 32. 1043-1050. <https://doi.org/10.1016/j.promfg.2019.02.319>.
- 12-Ngo, T.T.A. Nguyen, H.L.T, Nguyen, H.P., Mai, H.T.A, Tran, T. Hoang, P.L. (2024). A comprehensive study on factors influencing online impulse buying behavior : Evidence from Shopee video platform. *Heliyon*. 10(15). <https://doi.org/10.1016/j.heliyon.2024.e35743>.
- 13-Qureshi, F. H., Sokić, K., & Khawaja, S. (2025). Impulsive Buying Tendencies and Personality : Cognitive and Affective Aspects. *Psychiatry International*. 6(1) : 5. <https://doi.org/10.3390/psychiatryint6010005>

- 14-Rodrigues, R.I., Lopes, P., Varela, M. (2021). Factors Affecting Impulse Buying Behavior of Consumers. *Front Psychol.* Vol.12. Doi : 10.3389/fpsyg.
- 15-Singh, P.P., Mishra, P. (2024). Understanding the Triggers of Impulse Buying Behaviour : A Comprehensive Review. *International Journal of Research Publication and Reviews.* 5(2). 1029-1034. <https://ijrpr.com/uploads/V5ISSUE2/IJRPR22614.pdf>
- 16-Wu, Y., Liwei, X., Dahui, L. Jie, Y., & Guo, J. (2020). How does scarcity promotion lead to impulse purchase in the online market ? A field experiment. *Information & Management.* <https://doi.org/10.1016/j.im.2020.103>
- 17- Xiaolin, L., You, L., Jiali, C., & Yunzhong, C. (2021). Understanding the Psychological Mechanisms of Impulse Buying in Live Streaming : A Shopping Motivations Perspective. Presented at the 12th EAI International Conference, SIMUtools 2020, Guiyang, China. Retrieved from Doi : 10.1007/978-3-030-72792-5_64
- 18-Yohan. (2024). Tout sur l'Échelle de Likert : Définition, Exemples et Utilisations. <https://meditrust.io/echelle-likert/>
- 19-Zhang, C. et al. (2023). PromotionLens : Inspecting Promotion Strategies of Online E-commerce via Visual Analytics. *IEEE Transactions on Visualization and Computer Graphics.* 29(1). 767-777. Doi : 10.1109/TVCG.2022.3209440
- 20-Zhang, J., Jiang, N., Turner, J., & Saeed, P.S. (2022). The Impact of Scarcity on Consumers' Impulse Buying Based on the S-O-R Theory. *Frontiers in Psychology.* Vol. 13. Doi : 10.3389/fpsyg.2022.792419.

7. Appendices :

To consult our questionnaire, follow the link or use the QR code below:

<https://forms.gle/WC6h8y4xYHyGXGxu8>

