



OPEN Influence of short video content on consumers purchase intentions on social media platforms with trust as a mediator

Chengdan Luo^{1✉}, Nurul Ain Mohd Hasan^{1✉}, Abdul Mua'ti Zamri bin Ahmad¹ & Guosheng Lei²

Short videos on social media platforms have boomed with the rapid growth of the video consumption industry and have become an important marketing tool for businesses. With the rise of platforms such as TikTok or Douyin, short videos have profoundly impacted consumer behavior, making it crucial to understand their role in shaping consumer purchase intention. However, there is still a need for further research on how short video content promotes consumer purchase intent. Based on the Stimulus–Organism–Response (SOR) model, this study constructs a structural model to explore the impact of short video content on consumer purchase intention, focusing on the mediating role of consumer trust. The model incorporates usefulness, ease of use, and entertainment as external stimuli, consumer trust as internal psychological responses, and purchase intention as the final behavioral outcome. This study collected 372 valid data from Chinese consumers through an online questionnaire and empirically analyzed it using structural equation modeling. The study results show that short-form video content's usefulness, ease of use, and entertainment significantly affect consumers' trust and purchase intention. Moreover, consumer trust positively affects purchase intention and mediates the relationship between short video content and purchase behavior. This research extends the application of the SOR model to the context of social media short videos, highlighting the crucial role of consumer trust in shaping consumer purchase decisions. Based on these findings, we propose actionable strategies for businesses to optimize short video content and build consumer trust, ultimately enhancing marketing effectiveness and driving consumer purchases.

Keywords Social media, Short video content, Purchase intention, Consumer trust

Meltwater and We Are Social have collaboratively published the “Digital 2024 Global Overview Report,” indicating that as of January 2024, there are more than 5 billion active social media user identities, totaling 5.04 billion globally¹. Social media users have increased by 266 million in the past year, reflecting an annual growth rate of 5.6%. During the final quarter of 2023, an average of 9.4 new users registered every second. The typical internet user allocates 6 h and 40 min to online activities each day. The growth of social media usage highlights its role as a dominant channel for digital interactions and consumer engagement².

In August 2024, the China Internet Network Information Center (CNNIC) published the 54th Statistical Report on Internet Development³. As of June, the data indicated that the number of online video users in China had attained 1.068 billion, with short video users comprising 1.05 billion. This is 95.5% of the entire online population, creating the largest and most vibrant digital society globally.

In the era of accelerated digitalization, emerging technologies such as mobile internet, artificial intelligence, big data, and 5G have provided a strong impetus for the rise of short video platforms, such as TikTok, Instagram, Bilibili, Red, and Kuai, which have become critical tools for socializing and information dissemination. These platforms have enabled a new marketing model, often referred to as “short video + e-commerce.” This model not only facilitates single sales but also helps businesses build long-term relationships with consumers, ultimately enhancing brand trust and engagement⁴.

¹Faculty of Modern Languages and Communication, Universiti Putra Malaysia, 43400 Serdang, Malaysia. ²Faculty of Fine and Applied Arts, Burapha University, Chon Buri, Thailand. ✉email: gs60015@student.upm.edu.my; namh@upm.edu.my

Short videos have become a new way of socializing and entertainment in today's deeply integrated daily lives. With their high interactivity, low cost, and rapid dissemination, short video marketing has gradually become an essential trend in brand promotion. However, this trend also faces many challenges. The high degree of verticalization in content delivery leads to a significant problem known as "information cocooning." In addition, content homogenization tends to lead to aesthetic fatigue and makes content creation more difficult. Another challenge is the volatility of content quality, which may negatively impact user trust^{5,6}. Moreover, consumer skepticism about repeated content exposure in short-form videos and credibility issues in digital marketing will require brands to adopt trust-building strategies⁷.

In a competitive market environment, short video platforms and merchants continue to optimize the content of their product displays to provide richer, faster, and more accurate product information to enhance the consumer shopping experience. As one of the most popular forms of content marketing in recent years, short video content marketing provides consumers with a more vivid viewing experience than traditional text and images and effectively shortens the shopping path and decision-making time, thus increasing the order conversion rate. Recent studies indicate that trust-building through digital content plays a crucial role in consumer decision-making, reinforcing the link between perceived credibility and purchase behavior⁸.

Research on short video content marketing has made some progress, mainly focusing on exploring its influencing factors and the construction of marketing strategies. Researchers have analyzed the application of short video content marketing in brand promotion, consumer behavior influence, and the e-commerce field, proposing various marketing methods and theoretical models. Miller classified online video marketing into three forms: short video⁹, live broadcasting, and long-form video. Krissanya et al. and Pu et al. (2023) further explored strategies and characteristics of brand marketing through short video platforms, particularly in terms of brand positioning, video content production, and traffic acquisition^{10,11}. Additionally, some scholars have summarized the development characteristics of short video platforms and explored the development model of brand marketing based on the theory of creative communication management¹².

Lin et al. demonstrated that consumers' trust in short videos can significantly and positively influence their purchase intention⁸. Furthermore, research on consumer psychology suggests that social norms and perceived behavioral control play a key role in shaping purchase intention, particularly within short video marketing strategies².

Despite the gradual increase in research on short videos in China in recent years, some shortcomings still need to be addressed. First, while existing studies primarily concentrate on short videos' communication effect and commercial value, exploring the relationship between content characteristics and user psychology is relatively limited and lacks in-depth mechanism analysis. To address this gap, this research utilizes the stimulus–organism–response (S–O–R) model¹³ to extract three core characteristics of short social media video content: usefulness, ease of use, and entertainment.

It then integrates communication and psychology theories, incorporating consumer trust as a mediating variable to complete the model construction. This study employs SPSS and AMOS structural equation modeling to examine how short video content affects consumers' purchase intentions. By integrating digital trust-building strategies and behavioral theories, this study provides actionable insights for businesses seeking to optimize their short video marketing strategies.

Literature review and hypotheses development

Short video content and purchase intention

Short videos, typically between 15 s and 5 min, have gained popularity among consumers due to their fragmented nature, high entertainment value, and social interactivity. Short video content marketing integrates brand and product information within videos, influencing consumer decision-making and facilitating purchasing behavior^{14,15}. Prior studies have identified three key characteristics of short video content that significantly impact consumer behavior: usefulness, ease of use, and entertainment^{16–18}. Usefulness refers to the extent to which the detailed product information presented in short videos enables consumers to develop a clear understanding of product attributes, thereby facilitating rational purchase decisions. Ease of use is related to the concise nature, appropriate pacing, and visual clarity of short videos, which enhances content comprehension and accessibility. Entertainment pertains to the engaging and immersive nature of short video content, which captures consumer attention and fosters purchase motivation^{19–21}.

With the widespread popularity of short videos, more and more brands are incorporating them into their marketing strategies to more effectively influence consumers' purchase intentions. Scholars such as Orús have found that online product demonstration videos can positively influence consumers' perceptions and imaginations about a product, influencing their attitudes and purchase intentions²². Xiao et al. further emphasized the key role of short video content features in the marketing model and noted that they significantly impact consumer purchase intention¹⁵. Yang et al., based on the Theory of Reasoned Action (TRA) and the Elaboration Likelihood Model (ELM), stated that short video content plays a crucial role in shaping consumers' purchase intentions²³. In addition, Gong et al. investigated the influence of opinion leadership (KOL) in short video platforms. They explored the mediating role of emotional response and virtual touch in consumers' purchase intentions²⁴. Lin and other scholars focus on the factors that influence consumers' willingness to repurchase on short video platforms and construct a structural model based on the customer value theory to explore the mechanism of its action⁸. Jingga et al. analyzed the purchase intention behavior of social media users through a modified model and found that personalization, perceived fun, and customer satisfaction played key roles²⁵.

In summary, these studies highlight the significant impact of short video content on consumer purchase intentions and reveal various influence mechanisms and theoretical models. Based on these literature reviews, the following hypotheses are proposed:

H1 The usefulness of short video content positively impacts consumers' purchase intention.

H2 The ease of use of short video content positively impacts consumers' purchase intention.

H3 The entertainment of short video content positively impacts consumers' purchase intention.

Short video content and consumer trust

In recent years, with the rapid development of short video platforms, the relationship between short video content and consumer trust has become a research hotspot. Numerous studies have shown that rich and diverse short video content and its presentation can significantly enhance consumers' trust in brands, thus further influencing their purchasing behavior.

Hautz et al., and Lou and Yuan show that short videos containing detailed and practical product information increase consumers' perceptions of brand professionalism and reliability, thus enhancing consumer trust^{26,27}. Pongpaew et al. point out that short, clear, and easy-to-understand video content reduces consumer uncertainty and increases trust in the brand²⁸. Furthermore, studies by Liu et al. and Apasrawirote et al. emphasize that effective management of short-form video content is crucial for building shared trust among consumers^{29,30}. Within the Technology Acceptance Model (TAM) framework, Pavlou points out that the ease of use of information technology directly affects user acceptance and further enhances user trust³¹. Wang et al. support this view, arguing that concise and easy-to-use short-form video content reduces consumers' psychological burden and increases their satisfaction with the use of the content, thus enhancing trust in the brand¹⁸.

In addition, the entertainment of short videos plays a key role in enhancing consumer trust. Huang et al. point out that entertaining short videos can stimulate consumers' pleasant emotions, thus increasing their willingness to interact with the brand and building trust³². Research by Orús et al. suggests that lively and entertaining content can stimulate a positive emotional response in consumers and reduce their wariness, thus enhancing brand trust²². Teixeira et al., and Hollebeek & Macky further emphasize that creatively rich and entertaining short-form video presentations can enhance consumer engagement and further deepen trust in the brand^{33,34}. Based on these studies, the following hypotheses are proposed:

H4 The usefulness of short video content positively impacts consumer trust.

H5 The ease of use of short video content positively impacts consumer trust.

H6 The entertainment of short video content positively impacts consumer trust.

Consumer trust and purchase intention

Consumer trust plays a crucial role in the decision-making process and has been recognized by many studies as a key factor influencing purchase intentions. Trust enhances consumer confidence in a product or brand, reduces perceived risk, and increases the likelihood of a purchase decision.

In the food industry, Yu et al. explored the relationship between consumer trust in corporate image and organic food purchasing behavior. They showed trust is important in changing consumer behavior³⁵. Watanabe et al.'s study similarly demonstrated that perceived value significantly affects Brazilian consumers' trust and purchase intention for organic food products, confirming trust in purchasing behavior³⁶. Similarly, Arora et al. indicate that trust, price, and consumer attitudes significantly impact organic food purchasing behavior, highlighting the importance of trust in the decision-making process³⁷.

Trust is also crucial in e-commerce. A study by Nursyirwan and Ardaninggar found that promotions, website quality, and trust significantly impacted consumer purchase intentions on e-commerce platforms such as Shopee, demonstrating the critical role of trust in online shopping³⁸. Herzallah et al. identified trust as a key factor in social media shopping decisions in their Instagram commerce shopping behavior analysis. They emphasized the importance of trust in short video content marketing³⁹. In addition, Yang et al., based on the Theory of Reasoned Action (TRA) and the Elaboration Likelihood Model (ELM), found that short-video content marketing significantly enhances consumers' purchase intention, and trust plays a central role in this process²³.

In addition, Lin and Xu emphasized that trust plays an important role in advertising communication and product knowledge acquisition, which can significantly enhance consumers' purchase intentions⁴⁰. Khan explored the credibility of digital influencers, demonstrating how trust and consumer engagement act as mediators to increase purchase intentions⁴¹. Digital trust-building strategies have also become essential for ensuring long-term consumer loyalty, particularly in online environments with limited direct product experiences.

Consumer trust is a fundamental factor in shaping purchase intentions, particularly in digital marketing contexts such as short-form video content marketing. Research consistently demonstrates that trust reduces consumer uncertainty, fosters stronger brand relationships, and ultimately enhances purchase behaviors across platforms and industries. Understanding and fostering consumer trust allows companies to optimize their marketing strategies, build brand credibility, and increase purchase conversion rates.

Based on the above literature review, this study proposes the following hypothesis:

H7 Consumer trust positively influences consumers' purchase intention.

The mediating role of consumer trust

Consumer trust plays a critical mediating role in influencing purchase intentions across different consumption contexts. A substantial body of research highlights its function as a bridge between marketing strategies and consumer behavior.

In sharing economy platforms, Xu et al. examined how information disclosure influences consumer trust and purchasing behavior on Airbnb, demonstrating that transparency fosters trust, which in turn drives purchase decisions⁴². Similarly, Khaleeli and Jawabri explored the impact of environmental awareness on consumer attitudes and purchase intention, revealing that trust and attitude mediate this relationship⁴². Lin et al. studied bottled water consumption decisions, finding that advertising trust and product knowledge significantly influence consumer purchase intentions by shaping consumer perceptions⁴⁰. Ayyub et al. and Lavuri et al. emphasized the role of trust as a mediator in organic food purchases, showing that consumer trust enhances willingness to buy organic food products^{43,44}. Moreover, Lavuri et al. found that green marketing factors stimulate purchase intentions for luxury organic beauty products, reinforcing the significance of trust in environmentally consumer choices⁴⁴.

Trust also plays a key mediating role in the digital marketing environment. Habib et al. analyzed how trust and user engagement mediate the effectiveness of digital marketing on OTT (Over-the-Top) media platforms⁴⁵. Khan examined the trustworthiness of digital influencers and found that trust and user engagement can enhance the effectiveness of influencer marketing⁴⁶. In addition, Khan et al. explored how electronic word-of-mouth (eWOM) on Facebook fan pages influences consumer purchasing behavior and identified trust as a key mediating variable in virtual brand communities⁴⁶.

These studies confirm that consumer trust is a mediating factor that connects marketing strategies, content credibility, and consumer behavior across various industries. Based on the literature review, the following hypotheses are proposed:

H8 Consumer trust mediates the relationship between short video content usefulness and consumers' purchase intention.

H9 Consumer trust mediates the relationship between the ease of use of short video content and consumers' purchase intention.

H10 Consumer trust mediates between short video content entertainment and consumers' purchase intention.

Stimulus–Organism–Response (SOR) model

The Stimulus–Organism–Response (S–O–R) model, first proposed by Mehrabian and Russell, is based on the Stimulus–Response (S–R) theory and considers how a person thinks and feels⁴⁷. The model suggests that external stimuli (S) affect the organism (O), which processes the stimuli through cognitive and affective mechanisms, ultimately driving the behavioral response (R).

Belk was the first to apply the S–O–R theory to consumer purchasing behavior and illustrated how environmental stimuli affect consumer decision-making⁴⁸. Watson and Spence extended the model to online shopping and demonstrated that emotional factors, such as pleasure and arousal, affect approach and avoidance behaviors⁴⁹. More recently, researchers have widely applied the S–O–R framework to digital commerce and online marketing^{50,51}, showing that external marketing stimuli—such as short video content—trigger psychological and emotional reactions that shape purchase decisions.

Within the S–O–R framework, consumer trust functions as the organism (O) that mediates the relationship between external stimuli (S) and purchase behavior (R). Specifically, short video content characteristics—including usefulness, ease of use, and entertainment—serve as external stimuli (S) that affect consumer trust (O), which in turn influences purchase intention (R). Trust plays a crucial role in reducing perceived risk, increasing confidence in brand messaging, and enhancing consumer-brand relationships.

This study examines the relationship between short video content, consumer trust, and purchase intention from a consumer behavior perspective using the S–O–R theoretical framework. By incorporating trust as a central psychological mechanism, this study contributes to the understanding of how digital content marketing strategies drive consumer engagement and decision-making. Figure 1 presents the conceptual model of this research.

Methods

Data collection

This study adhered strictly to ethical research principles, including compliance with the Declaration of Helsinki. According to relevant Chinese regulations, formal ethical approval was not required as the research was conducted within the social sciences and did not involve sensitive personal data, medical information, or minors. Moreover, the study posed no risk to participants, and measures were implemented to safeguard data confidentiality.

All respondents provided informed consent before participation. The study was conducted through an online questionnaire using Wenjuanxing, a widely recognized research platform in China. Before completing the questionnaire, respondents were required to read and agree to an ethical statement to ensure compliance with the study. This study strictly followed the principles of voluntary participation, anonymous completion, and confidentiality of information to maximize the protection of respondents' privacy.

This study examines how short video content on social media platforms influences Chinese consumers' purchase intentions. Targeted sampling was used to recruit respondents with experience in watching short videos, focusing on users of social media platforms that are widely used for entertainment, information sharing, and e-commerce, such as TikTok and Xiaohongshu (Red). These platforms were selected based on their high fit on the core dimensions of this study, namely usefulness, ease of use, and entertainment.

An online questionnaire entitled "Relationship between Short Video Content on Social Media Platforms and Consumers' Purchase Intention" was designed and published to ensure the breadth and representativeness of the

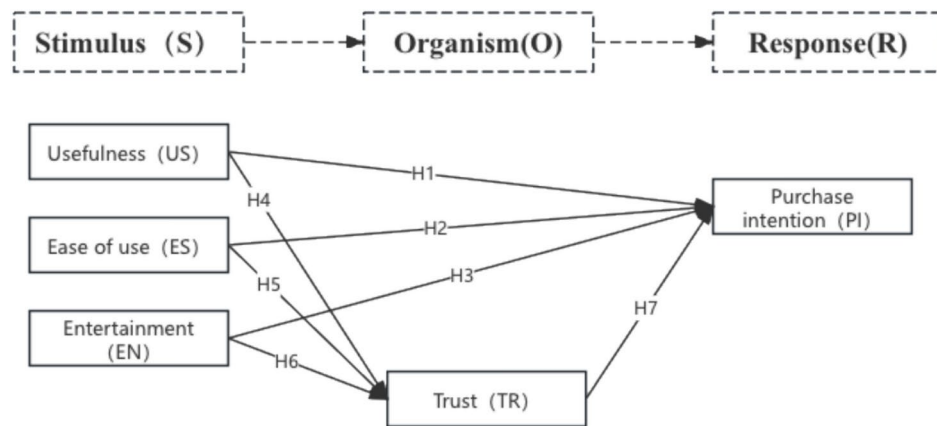


Fig. 1. Theoretical framework.

data. The questionnaire was constructed based on 21 specific measures covering the usefulness, ease of use, and entertainment of short video content, as well as consumer trust and purchase intention, to systematically assess the relationship between the variables.

This study collected 402 questionnaires from all regions of China, ensuring a diverse sample. The study cleaned up many data to improve its quality and validity. For example, 30 incomplete questionnaires, invalid data from people who had less than two minutes to answer, and responses that did not make sense (for example, choices that contradict each other on the same scale) were thrown out. Following data cleaning, we retained 372 valid questionnaires, yielding a 92.5% validity rate for the questionnaire.

A power analysis was conducted using G*Power software to verify the sample size's adequacy. Under the conditions of a significance level (α) of 0.05, a statistical power ($1-\beta$) of 0.80, and a medium effect size (0.3), the minimum required sample size was determined to be 300 participants. Thus, the final sample of 372 respondents exceeds this threshold, ensuring the reliability and robustness of the statistical analysis and study findings.

Variable measurement

The questionnaire comprised two primary sections. The first section collected demographic information, including gender, age, education, occupation, income level, and short video viewing habits. The second section focused on the core constructs of the study, adapted from established scales to ensure measurement validity and reliability.

The explanatory variables are short video content on social media platforms, categorized into usefulness, ease of use, and entertainment. Usefulness refers to the studies of Gefen and Straub⁵²; ease of use is based on the studies of Gefen & Straub and Dutta-Bergman^{52,53} and the term “entertaining” refers to the studies conducted by Kowalczyk, Wu et al., and Zhang et al.^{54–56} We set four measures for each dimension, resulting in a total of 12 items. The explanatory variable, consumer purchase intention, is based on a study by Gefen and Straub and includes a total of 5 measurement items⁵². The mediating variable was consumer trust, based on the studies of Hassanein and Head, and contained 4 measurement items⁵⁷.

All responses were recorded using a five-point Likert scale, ranging from 1 (strongly disagree) to 5 (strongly agree). The scale was selected to ensure robust psychometric properties and maintain consistency with prior research in consumer behavior.

Data analysis

This study employed SPSS 27 and AMOS 26 for statistical analysis, including tests for common method bias (CMB), confirmatory factor analysis (CFA), correlation analysis, and structural equation modeling (SEM).

Confirmatory Factor Analysis (CFA) was performed on purchase intention (PI), consumer trust (TR), and short video content dimensions (usefulness (US), ease of use (ES), and entertainment (EN)). CFA validated the construct measurements, which were estimated using the maximum likelihood method.

Correlation analysis was conducted to examine relationships among all constructs, ensuring theoretical alignment with the study's hypotheses.

Structural Equation Modeling (SEM) was used to test the proposed model. SEM consists of the measurement model and the structural model⁵⁸. The measurement model establishes the relationships between observed and latent variables, while the structural model tests the hypothesized relationships among constructs. Reliability and validity were assessed through factor loading values, Cronbach's alpha (CA), average variance extracted (AVE), and composite reliability (CR).

Model fit was evaluated using various fit indices, including χ^2/df ratio, comparative fit index (CFI), normal fit index (NFI), goodness of fit index (GFI), Tucker-Lewis Index (TLI), adjusted goodness of fit index (AGFI), incremental fit index (IFI), and root mean square error of approximation (RMSEA).

To assess the mediating role of consumer trust, we applied bootstrapping with 5000 resamples at a 95% confidence interval⁵⁹. This technique provided robust evidence for mediation effects.

Results
Descriptive statistics

The analysis results (Table 1) reveal that the age group of 18 to 35 years old dominates the audience of social media short video content, with 18 to 25 years old accounting for 40.59% and 26 to 35 years old accounting for 29.3%, indicating that the middle-aged and young groups account for a significant portion of short video consumption. This suggests that users in this age group have a high degree of attention and participation in short video content. In terms of education level, the proportion of respondents with a college degree or above is relatively high, with 40.32% of them having a bachelor's degree and 26.07% having a master's degree or above, indicating that the more educated group is more inclined to watch social media short videos.

According to the distribution of respondents' monthly incomes, 50.54% had an income between 1001 and 8000, 21.51% had an income between 8001 and 12,000, 14.78% had an income over 12,000, and 13.17% had an income of less than 2,000. These data indicate that the middle-income group is the primary consumer of short video content, demonstrating a strong purchasing power and potential for consumption. According to the occupational background, the largest group consisted of 38.44% company staff, then 18.28% employees of government agencies and public institutions, 17.47% self-employed or freelance, and 15.59% students. This indicates that short-video content marketing is likely to influence consumers from diverse occupational backgrounds, particularly company employees and government agency personnel.

Furthermore, a full 100% of respondents reported having watched short videos on social media, demonstrating the widespread popularity of these content types among users. In summary, the audience group for social media short video content is characterized by youthfulness, high education, and higher consumption ability, providing a solid empirical foundation for further exploring the influence of short video content on consumers' purchase intention.

In addition to demographic characteristics, descriptive statistics were computed for the main constructs in this study, including usefulness (US), ease of use (ES), entertainment (EN), consumer trust (TR), and purchase intention (PI). Table 2 presents the means and standard deviations of these constructs.

The results indicate that ease of use ($M=3.25$, $SD=0.783$) and entertainment ($M=3.257$, $SD=0.763$) received the highest mean scores, suggesting that users generally perceive short video content as engaging and easy to interact with. Usefulness ($M=3.219$, $SD=0.784$) and consumer trust ($M=3.239$, $SD=0.872$) also exhibited relatively high ratings, indicating that viewers find short video content valuable and that it contributes to trust formation. Meanwhile, purchase intention ($M=3.098$, $SD=0.85$) had the lowest mean score among the constructs, implying that while short video content characteristics and consumer trust are influential, their direct effect on purchase intention may require further examination through structural modeling.

Common method biases

This study necessitated an examination of common method bias among the variables, given that the data originated from the individuals' self-reports. To accomplish this, we performed a Harmon one-way test⁶⁰ on all questions within the questionnaire. The findings indicated that five components had eigenvalues over 1,

Item	Cohort	Count	Ratio (%)
Gender	Male	154	41.39
	Female	218	58.61
Age	18–25	151	40.59
	26–35	109	29.3
	36–45	44	11.83
	46–55	38	10.22
	> 55	30	8.06
Educational Level	High school degree or below	28	7.53
	Associate degree	97	26.08
	Bachelor's degree	150	40.32
	Master's degree or high	96	26.07
Occupation	Student	58	15.59
	Self-employed/freelance	65	17.47
	Company staff	143	38.44
	Government organs and public institutions	68	18.28
	other	38	10.22
Average monthly income	< 2000	49	13.17
	2001–8000	188	50.54
	8001–12,000	80	21.51
	> 12,000	55	14.78
Have you ever watched a short video?	Yes	372	100
Total 372,100			

Table 1. Basic information.

Construct	Mean(M)	Standard deviation (SD)
Usefulness (US)	3.219	0.784
Ease of Use (ES)	3.25	0.783
Entertainment (EN)	3.257	0.763
Consumer Trust (TR)	3.239	0.872
Purchase Intention (PI)	3.098	0.85

Table 2. Means and Standard Deviations of Constructs.

Latent variable	Item	Standardized factor loading	Cronbach's Alpha	CR	AVE
Usefulness (US)	US1	0.785	0.852	0.855	0.598
	US2	0.799			
	US3	0.824			
	US4	0.768			
Ease of use (ES)	ES1	0.803	0.858	0.859	0.603
	ES2	0.771			
	ES3	0.847			
	ES4	0.807			
Entertainment (EN)	EN1	0.82	0.865	0.866	0.617
	EN2	0.795			
	EN3	0.79			
	EN4	0.793			
Trust (TR)	TR1	0.815	0.897	0.898	0.689
	TR2	0.816			
	TR3	0.833			
	TR4	0.857			
Purchase intention (PI)	PI1	0.752	0.913	0.914	0.68
	PI2	0.806			
	PI3	0.799			
	PI4	0.84			
	PI5	0.877			

Table 3. Validity and reliability of the constructs.

collectively accounting for 72.788% of the total variance. The first factor accounted for merely 35.625% of the variance, falling short of the 40% threshold. This signifies the absence of a substantial common technique bias issue in this study.

Validity and reliability

Before the structural equation modeling analysis, we conducted confirmatory factor analyses for each latent variable. Table 3 demonstrates the reliability and validity metrics for all latent variables. We assessed convergent validity by factor loadings and average variance extracted (AVE). Typically, factor loadings greater than 0.5 indicate that the factor has high convergent validity^{58,61}. In this investigation, the factor loadings for each latent variable exceeded 0.5, thus satisfying the criteria. Moreover, the AVE values above 0.5 further demonstrate excellent convergence validity⁶². The AVE values in Table 3 are much higher than the 0.5 level for the latent variables of short-video content features (US), ease of use (ES), and entertainment (EN), as well as for trust (TR) and willingness to purchase (PI).

The study also looked at each latent variable's composite reliability (CR). The scale is reliable if the CR value is above 0.7⁶¹. The study found that all latent variables' composite reliability (CR) values were higher than the critical value of 0.7. In that order, these values were 0.855, 0.859, 0.866, 0.898, and 0.914. This means that the scale had a high level of internal consistency. Meanwhile, Cronbach's alpha coefficients for each latent variable were 0.852, 0.858, 0.865, 0.897, and 0.913, further validating the scale's reliability. The Kaiser–Meyer–Olkin (KMO) measure and Bartlett's Test of Sphericity returned a KMO value of 0.902 > 0.7 and a *p*-value of 0.000. This means that the variables in the measurement model were strongly connected. Overall, the scales in this study performed well in terms of reliability and validity, providing reliable support for subsequent analysis.

Tests of measurement models

We evaluated each structure individually and incorporated all relevant variables into the final model for comprehensive testing. The fit indices of the measurement model, as presented in Table 4, demonstrate an excellent fit: $\chi^2/df=1.099$, TLI=0.995, CFI=0.996, IFI=0.996, GFI=0.954, NFI=0.958, AGFI=0.940, and

Statistical validation	χ^2/df	RMSEA	TLI	CFI	IFI	GFI	NFI	AGFI
Critical value	< 3	< 0.10	> 0.9	> 0.9	> 0.9	> 0.9	> 0.9	> 0.9
Testing results	1.099	0.016	0.995	0.996	0.996	0.954	0.958	0.940

Table 4. Model fitting index.

Construct	US	ES	EN	TR	PI
Usefulness (US)	0.773				
Ease of Use (ES)	0.306	0.777			
Entertainment (EN)	0.343	0.336	0.786		
Trust (TR)	0.354	0.280	0.389	0.83	
Purchase Intention (PI)	0.383	0.346	0.398	0.408	0.825

Table 5. Discriminant validity: pearson correlation and AVE square root values.

Statistical validation	χ^2/df	RMSEA	TLI	GFI	CFI	IFI	NFI	AGFI
Critical value	< 3	< 0.08	> 0.9	> 0.9	> 0.9	> 0.9	> 0.9	> 0.9
Testing results	1.099	0.016	0.995	0.954	0.996	0.996	0.958	0.940

Table 6. Model validation factor.

RMSEA = 0.016. These metrics confirm a strong alignment between the observed data and the hypothesized model, thereby validating the model's reliability and construct validity⁶³.

Tests of discriminant validity

In Table 5, we can see the results of the Pearson correlation analysis that looked at the relationship between the usefulness, ease of use, and entertainment of short video content, consumer trust, and long-term purchase intention. It also shows the square root of the average variance extracted (AVE) values for each factor. We use the square root of AVE to measure the strength of the correlations among the factors. If the square root of a factor's AVE value exceeds its Pearson correlation coefficient with other factors, it signifies that the factor possesses exceptional discriminant validity. The study's results indicate that the correlation coefficients of the core variables are inferior to the square root values of their respective AVE. This shows a moderate relationship between the variables, yet they also exhibit significant differences. This supports the scale's excellent discriminant validity.

Further analysis revealed significant positive correlations between each of these key variables. Specifically, there is a significant positive correlation between usefulness and ease of use ($r = 0.30$), entertainment ($r = 0.343$), consumer trust ($r = 0.354$), and purchase intention ($r = 0.383$); the relationship between ease of use and entertainment ($r = 0.336$), consumer trust ($r = 0.280$), and purchase intention ($r = 0.346$) also has a significant positive correlation; the relationship between entertainment and consumer trust ($r = 0.389$) and purchase intention ($r = 0.398$) is also substantial. In addition, the positive relationship between consumer trust and purchase intention ($r = 0.408$) is also significant. These results indicate that there is a strong correlation between the variables, which provides strong support for further testing the research hypotheses.

Tests of the structural modeling

After validating the reliability and validity of the questionnaire, the research model was further assessed using structural equation modeling (SEM) with AMOS software to evaluate the validity of the proposed hypotheses.

As shown in Table 6, the CMIN/df value of the model was 1.099, which falls within the acceptable range of 1 to 3. The TLI (0.995), GFI (0.954), CFI (0.996), IFI (0.996), NFI (0.958), and AGFI (0.940) all exceeded the recommended threshold of 0.9, indicating an excellent model fit. Additionally, the RMSEA value of 0.016 was well below the threshold of 0.08, further confirming the robustness of the model fit. Overall, all fit indices surpassed the recommended criteria^{63,64} demonstrating that the structural model provides a high level of explanatory power and applicability.

These model fit values are consistent with previous studies that have applied SEM in digital marketing and consumer trust research. For example, prior studies in short-video content marketing^{8,23} and digital consumer behavior^{31,52} reported similarly strong model fit indices, supporting the reliability of our findings. Compared to these earlier models, our results confirm that short-video content characteristics (usefulness, ease of use, and entertainment) have a significant role in shaping consumer trust and purchase intentions. These findings align with theoretical expectations and extend the stimulus–organism–response (S–O–R) model framework in the context of short-video marketing.

Based on the theoretical model proposed in this research, the structural equation modeling diagram was constructed using AMOS software, as shown in Fig. 2.

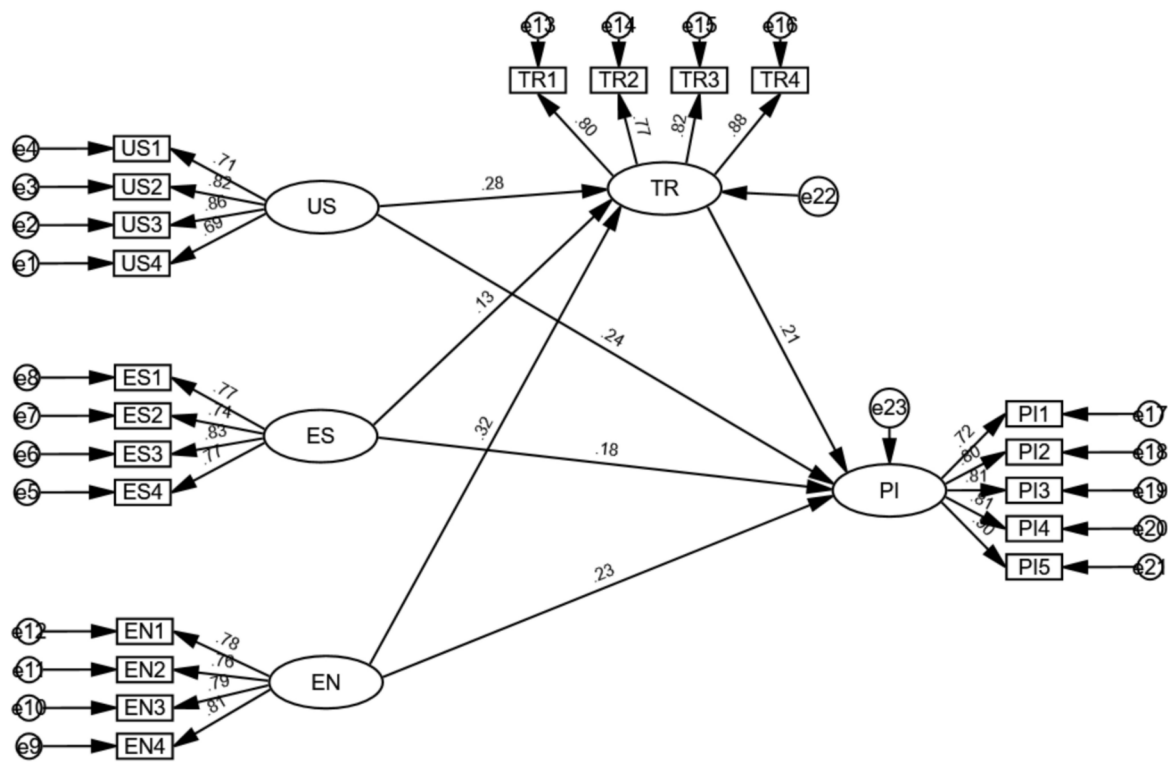


Fig. 2. Result of structural modeling analysis.

Path	Estimate	S.E	C.R	P	Hypotheses	Result
US → TR	0.321	0.067	4.821	***	H4	Supported
ES → TR	0.143	0.060	2.378	0.017	H5	Supported
EN → TR	0.340	0.061	5.593	***	H6	Supported
TR → PI	0.170	0.049	3.444	***	H7	Supported
US → PI	0.228	0.055	4.133	***	H1	Supported
ES → PI	0.157	0.048	3.253	0.001	H2	Supported
EN → PI	0.197	0.051	3.895	***	H3	Supported

Table 7. Structural equation model validation results. Note(s): Estimate: the standardized path coefficient; S.E.: standard error of the estimate; C.R.: critical ratio; P = p-value; ***: $p < 0.001$.

Structural equation path coefficients and hypothesis testing results

The results of the path analysis, as shown in Table 7, indicate that the characteristics of short video content—usefulness (US), ease of use (ES), and entertainment (EN)—significantly and positively affect both consumer trust (TR) and purchase intention (PI).

Usefulness (US) demonstrated a substantial impact on consumer trust, with a standardized path coefficient of 0.321 (SE=0.067, CR=4.821, $p < 0.001$). Additionally, usefulness directly influenced purchase intention, with a path coefficient of 0.228 (SE=0.055, CR=4.133, $p < 0.001$). These findings suggest that usefulness not only enhances consumer trust but also directly drives purchase behavior.

Ease of use (ES) exhibited a positive relationship with consumer trust (path coefficient=0.143, SE=0.060, CR=2.378, $p = 0.017$). Similarly, it positively influenced purchase intention, as evidenced by a path coefficient of 0.157 (SE=0.048, CR=3.253, $p = 0.001$). This indicates that ease of use plays a supportive role in fostering trust and encouraging purchase behavior.

Entertainment (EN) emerged as the most influential factor for building consumer trust and stimulating purchase intention. With a path coefficient of 0.340 (SE=0.061, CR=5.593, $p < 0.001$), entertainment had the most potent effect on trust. Moreover, it significantly impacted purchase intention (path coefficient=0.197, SE=0.051, CR=3.895, $p < 0.001$). These results underscore the critical role of engaging and entertaining content in driving consumer trust and purchase behavior.

Consumer trust (TR) also served as a significant mediator between the characteristics of short video content and purchase intention, with a path coefficient of 0.170 (SE=0.049, CR=3.444, $p < 0.001$). This highlights the pivotal role of trust in linking the features of short video content to purchase intentions.

Overall, the findings confirm that the features of short video content have multifaceted effects on consumer trust and purchase intention. Among these features, entertainment content is the most significant factor for enhancing trust. Also, consumer trust effectively mediates the relationship between the characteristics of the content and the intention to buy. This gives businesses real-world information to improve short video strategies and increase consumer engagement and buying intention.

Mediation effect

This study employed the Bootstrap method and Hayes’ Process macro to analyze the mediating effect of consumer trust (TR) between short video content features and purchase intention (PI). Specifically, the study examined three dimensions of short video content—usefulness (US), ease of use (ES), and entertainment (EN)—as independent variables, with purchase intention as the dependent variable and consumer trust as the mediator. A repeated sampling of 5000 iterations at a 95% confidence level was conducted to validate the mediation model. The detailed results are presented in Table 8. By observing whether the 95% confidence intervals for the indirect effects exclude zero, the following conclusions were drawn:

First, the mediating effect of consumer trust in the relationship between usefulness (US) and purchase intention (PI) was significant (Est=0.029, SE=0.013, $z=2.23$, $p=0.026$, 95% CI [0.004, 0.055]). In addition, the direct effect was significant (Est=0.175, $z=3.362$, $p=0.001$), and the total effect was 0.204 ($z=3.849$, $p<0.001$), indicating that consumer trust partially mediates this relationship, supporting H9.

Second, entertainment (EN) demonstrated a significant indirect effect on purchase intention (PI) through consumer trust (Est=0.067, SE=0.016, $z=4.078$, $p<0.001$, 95% CI [0.031, 0.095]). The direct effect was also significant (Est=0.215, $z=3.86$, $p<0.001$), with a total effect of 0.282 ($z=5.119$, $p<0.001$). These findings confirm that consumer trust mediates the relationship between entertainment and purchase intention, supporting H10.

Lastly, ease of use (ES) exhibited a significant indirect effect on purchase intention (PI) via consumer trust (Est=0.054, SE=0.016, $z=3.394$, $p=0.001$, 95% CI [0.022, 0.084]). The direct effect (Est=0.205, $z=3.851$, $p<0.001$) and total effect (Est=0.259, $z=4.867$, $p<0.001$) further confirmed the partial mediation, supporting H8.

Overall, the results validate the mediating role of consumer trust in linking short video content features to purchase intention. All paths were found to be significant, indicating that usefulness, ease of use, and entertainment contribute to consumers’ purchase intention by enhancing trust. These findings offer critical insights into the mechanisms by which short video content influences consumer behavior, highlighting the importance of trust as a mediator.

Hypothesis testing results

Table 9 presents the results of hypothesis testing, demonstrating that the usefulness, ease of use, and entertainment value of short video content have significant positive effects on consumer trust and purchase intentions. These findings provide support for hypotheses H1–H7. Furthermore, consumer trust serves as a partial mediator in the relationships between these content attributes and consumers’ purchase intentions, supporting hypotheses H8, H9, and H10. These results highlight the profound impact of short video content marketing on consumer behavior through the enhancement of consumer trust.

Figure 3 illustrates the hypothetical model framework based on the Stimulus–Organism–Response (SOR) theory. The model posits that the usefulness (US), ease of use (ES), and entertainment value (EN) of short video content serve as stimulus variables, influencing purchase intention (PI) through consumer trust (TR) as an organism variable. The significance of all pathways in the model has been confirmed through hypothesis testing. The coexistence of direct and indirect effects underscores the critical mediating role of consumer trust in the relationship between short video content marketing and purchase intentions.

Discussion and conclusions

This study investigates the impact of short video content marketing on consumer trust and purchase intention using the Stimulus–Organism–Response (S–O–R) model. By analyzing the key attributes of short video

Path	Estimate	SE	95% CI (Lower)	95% CI (Upper)	z-value	p-value	Results
US → TR → PI							Partial mediation
Indirect effect	0.029	0.013	0.004	0.055	2.23	0.026	Significant
Direct effect	0.175	0.052	0.073	0.277	3.362	0.001	Significant
Total effect	0.204	0.053	0.1	0.308	3.849	<0.001	Significant
ES → TR → PI							Partial mediation
Indirect effect	0.067	0.016	0.031	0.095	4.078	<0.001	Significant
Direct effect	0.215	0.056	0.106	0.325	3.86	<0.001	Significant
Total effect	0.282	0.055	0.174	0.39	5.119	<0.001	Significant
EN → TR → PI							Partial mediation
Indirect effect	0.054	0.016	0.022	0.084	3.394	0.001	Significant
Direct effect	0.205	0.053	0.101	0.309	3.851	<0.001	Significant
Total effect	0.259	0.053	0.154	0.363	4.867	<0.001	Significant

Table 8. Mediation effect analysis results.

H1	The usefulness of short video content positively impacts consumers' purchase intention	Support
H2	The ease of use of short video content positively impacts consumers' purchase intention	Support
H4	The entertainment of short video content positively impacts consumers' purchase intention	Support
H4	The usefulness of short video content positively impacts consumer trust	Support
H5	The ease of use of short video content positively impacts consumer trust	Support
H6	The entertainment of short video content positively impacts consumer trust	Support
H7	Consumer trust has a positive effect on consumers' purchase intention	Support
H8	Consumer trust plays a mediating role in the usefulness of short video content and consumers' purchase intentions	Support
H9	Consumer trust plays a mediating role in the ease of use of short video content and consumers' purchase intentions	Support
H10	Consumer trust plays a mediating role in the entertainment value of short video content and consumers' purchase intentions	Support

Table 9. Hypothesis testing results.

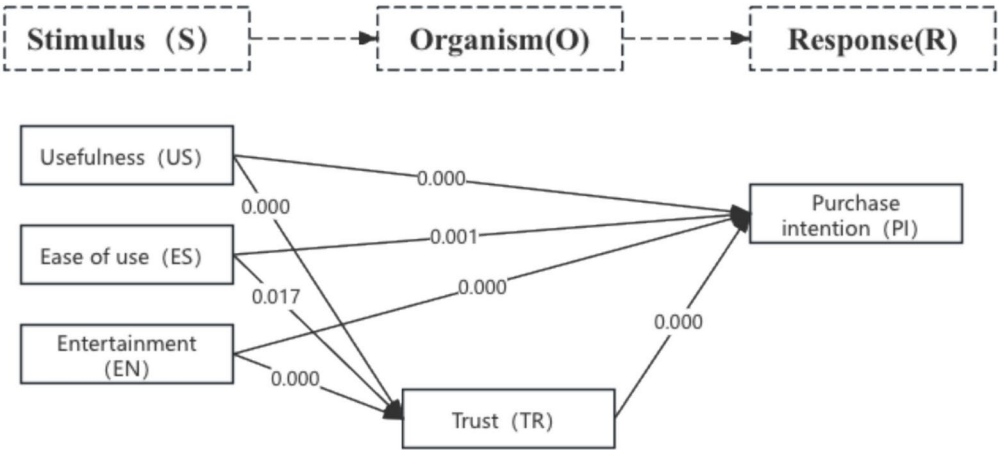


Fig. 3. Hypothetical framework diagram.

content—usefulness, ease of use, and entertainment—and their role in shaping consumer trust and purchasing decisions, this research provides both theoretical contributions and practical implications.

Research discussion

Unlike traditional image-based product displays, short video content offers a more immersive and dynamic form of engagement, allowing merchants to convey product features and brand narratives effectively. However, short video marketing faces significant challenges. Merchants must balance informative and entertaining content while ensuring clarity and ease of understanding. Furthermore, limited time constraints in short videos may lead to insufficient information delivery, which could hinder consumer decision-making and impact marketing effectiveness.

This study extends previous research by empirically validating the role of consumer trust as a mediator between short video content attributes and purchase intention. Findings suggest that consumer trust is shaped by the informativeness, and usability of video content and the emotional appeal generated through entertainment. This aligns with prior research indicating that emotionally engaging content enhances consumer-brand relationships^{56,57}. Additionally, the study highlights that ease of use significantly lowers cognitive effort, supporting previous findings that streamlined content improves user experience and brand credibility⁵².

However, while all hypothesized relationships in this study were statistically significant, it is important to acknowledge that not all prior studies have reported consistent findings regarding the impact of short video content characteristics on trust and purchase behavior. For instance, some research suggests that excessive entertainment elements might dilute information credibility, thereby weakening consumer trust⁸. Moreover, the influence of ease of use may vary depending on product complexity—simplified content might be less effective for high-involvement products requiring detailed explanations¹. Future research should explore these potential moderating effects in greater depth.

Another key finding is the dominant role of entertainment value in shaping consumer trust and purchase intention. This suggests that in highly competitive digital environments, entertaining content strategies, such as humor, storytelling, and interactive elements, may be more effective in driving engagement than purely informational approaches. The results indicate that consumers respond favorably to engaging narratives and visual appeal, reinforcing the importance of crafting content that balances emotional stimulation with product messaging.

However, despite the robustness of our findings, the fact that all hypothesized relationships were statistically significant raises concerns about potential overfitting. Future research should employ Bayesian SEM or multi-group analysis to identify whether unobserved latent variables may explain unexplored variations in consumer behavior. Additionally, alternative psychological mechanisms, such as perceived authenticity, influencer credibility, and consumer skepticism, should be considered in future studies to expand the theoretical contributions of this research.

From a theoretical standpoint, this research contributes to the extension of the S–O–R framework in the domain of short video marketing by emphasizing the role of consumer trust as an intermediary factor. However, while this study builds on existing work, its contribution should be considered an empirical validation and refinement rather than a groundbreaking theoretical expansion. Prior studies^{8,65} have explored similar mechanisms, and while our research strengthens the application of the S–O–R model in short video marketing, future research should strive to uncover new theoretical constructs or alternative mediators (e.g., Uses and Gratifications Theory, Electronic Word-of-Mouth, consumer skepticism, brand familiarity) that may influence purchase intention.

Research conclusions

The empirical analysis leads to the following key conclusions:

First, usefulness, ease of use, and entertainment value in short video content significantly influence consumer trust, which drives purchase intention. Short video content with high usefulness reinforces consumer trust in brand professionalism and reliability by providing practical, detailed product information. Short videos offer a more intuitive and engaging product demonstration than traditional static images, allowing consumers to better visualize product functionalities and benefits. This result is consistent with previous research's findings that visual content enhances consumers' understanding of products and boosts their confidence in purchasing decisions⁵⁵.

Second, ease of use is a key factor in content effectiveness. Short, clear, well-structured, and easy-to-understand short video content reduces the cognitive load on consumers, improves user experience, and enhances trust. This suggests that precise and intuitive messaging is critical to the effectiveness of short video marketing, while overly complex or vague content may lead to consumer attrition. The results of this study further emphasize that companies should adhere to a user-centered approach in content design to ensure that information is easy to access and understand, which enhances marketing effectiveness.

Finally, the entertainment of short video content significantly impacts consumer trust and purchase intention. Emotionally appealing and humorous content can attract audience attention, enhance brand interaction, and increase consumer trust. The findings suggest that utilizing popular content, viral marketing strategies, and interactive formats can further enhance marketing effectiveness. In the short-form video marketing environment, creativity, empathy, and emotional appeal are key factors that drive consumer engagement. By incorporating narrative techniques, humor, and interactive experiences, brands can strengthen the emotional connection with consumers and drive purchase conversions, improving overall marketing performance.

In conclusion, this study reveals the multiple roles of short-video content marketing in influencing consumer trust and purchasing behavior. It emphasizes the importance of balancing informativeness and entertainment to optimize marketing effectiveness. As the dominance of short videos in digital marketing strategies continues to grow, brands should carefully plan their content to ensure that it delivers practical information, is entertaining, and can trigger emotional resonance in consumers to maximize marketing impact.

However, although this study provides strong empirical evidence to support these relationships, it should be noted that consumers' purchase intentions are not always directly translated into actual purchase behaviors. To improve the study's external validity and usefulness in real life, it could be used in the future to look into the links between purchase intentions and actual consumption behaviors using behavioral tracking data, transaction records, or experimental methods.

Research significance

Theoretical significance

This study expands the application of the S–O–R model in the context of short-video content marketing by demonstrating how short-video content characteristics influence consumer trust, which subsequently drives purchase intention. However, it is important to acknowledge that this study primarily builds on established frameworks rather than proposing entirely novel constructs. Future research should explore alternative psychological mechanisms beyond trust, such as perceived authenticity, influencer credibility, or perceived risk, to deepen the theoretical contributions in this area.

Additionally, this study addresses a critical research gap by clarifying the mediating role of consumer trust in the relationship between short video content and purchase intention. While previous studies have explored the influence of digital content marketing, few have explicitly examined how short-video content fosters consumer trust and facilitates purchase behavior. Our findings contribute to consumer behavior and digital marketing literature by demonstrating that trust-building mechanisms significantly impact consumer decision-making in short video environments.

Moreover, this study contributes to the growing discourse on digital content marketing effectiveness by providing empirical evidence on how specific video content attributes (usefulness, ease of use, and entertainment) shape consumer perceptions. These insights help refine existing consumer engagement theories and provide a more nuanced understanding of short-video content marketing strategies.

While this study focuses on the Chinese market, future research should test whether similar mechanisms apply in different cultural contexts, particularly in markets with varying degrees of individualism and collectivism. Cultural differences may influence how consumers perceive trust in digital content and shape their purchase

behaviors. Conducting cross-cultural comparisons can further validate the robustness of these findings and extend the theoretical implications of short-video content marketing research.

Practical significance

From a practical standpoint, this study provides valuable insights for e-commerce platforms, digital marketers, and brand managers seeking to refine their short video marketing strategies. A well-crafted short video enhances brand visibility, strengthens consumer trust, and drives purchase intention. However, achieving optimal results requires a strategic approach tailored to different platforms, content types, and consumer expectations.

One of the key takeaways from this study is the importance of aligning content usefulness with consumer expectations. Informative and well-structured short videos can reduce purchase uncertainty by providing detailed product demonstrations, comparisons, and testimonials. Content highlighting key product features, durability, and real-world applications fosters greater transparency, reinforcing consumer confidence in the brand. This is particularly relevant for high-involvement products, where consumers seek in-depth information before purchasing.

Equally important is ensuring that short video content is both accessible and engaging. In a highly information-saturated digital environment where consumers are constantly surrounded by content of all kinds, brands must simplify their messaging while maintaining clarity and authenticity. A straightforward, concise, and engaging narrative reduces the cognitive load on consumers, making it easier for them to absorb the information and form positive brand perceptions. Optimizing video formats to make them visually appealing and adaptable to the mobile experience is critical to improving content accessibility, especially on platforms where users prefer fast, easily digestible content.

It is impossible to overlook the importance of entertainment in short videos. This study confirms that entertainment elements can significantly enhance consumer trust and interaction and establish a positive emotional connection between consumers and brands. By combining humor, narrative techniques, user-generated content (UGC), and interactive experiences, brands can make short videos more memorable and communicative, thus increasing their potential for viral spread. However, while creating entertaining content, brands must maintain a balance between informational and entertaining content to ensure that the fun of the content does not overshadow the core product message. In addition, with the help of real-time hotspots, cultural symbols, and KOL cooperation, brands can strengthen their interactions with consumers, making the marketing message more resonant and persuasive and thus enhancing the overall marketing effect.

This study emphasizes that successful short video marketing requires a multidimensional and comprehensive strategy that balances informativeness, accessibility, and entertainment value. Brands that optimize and precisely place content according to platform characteristics, product type, and consumer preferences will be more helpful in building consumer trust, increasing brand loyalty, and ultimately driving purchasing behavior in a competitive digital environment.

Limitations and future research

Although this study provides meaningful insights into short-video content marketing, some limitations provide directions for further exploration in future research. The study failed to consider differences in product categories, which could influence consumers' perceptions and responses to short video marketing. The effectiveness of different content strategies may vary in terms of product involvement, purchase frequency, and decision complexity. For example, high-involvement products (e.g., electronics, automobiles, and luxury goods) often require more detailed and credible content to increase consumer confidence in product quality and long-term value. Future researchers could look into how short-form video marketing affects different products differently. This would make marketing strategies more relevant and effective. In contrast, low-involvement products, such as fast-moving consumer goods and fashion items, may benefit more from emotionally engaging and entertainment-focused content that drives impulse purchases. Future research should further explore these variations to determine how short-video marketing strategies can be customized for different product types.

Another limitation is that the study exclusively focuses on Chinese consumers, which restricts the generalizability of the findings across different cultural contexts. Cultural values, social norms, and digital consumption habits deeply influence consumer trust and purchase behavior, which vary across regions. In individualistic cultures like the United States and Germany, consumers may respond more to personalized, self-expressive content that highlights uniqueness and product differentiation. On the contrary, social influence and community-based recommendations may play a more significant role in consumers' purchase decisions in collectivist cultures such as China and Japan. Given these cultural differences, more research should examine whether the relationships found in this study still hold in different market settings by comparing them across cultures. This will make the study more generalizable and valuable.

Demographic factors are also an important limitation of this study, particularly regarding differences in engagement with short-form video content across age groups. Younger consumers, such as Generation Z and Millennials, prefer interactive, on-trend content created by opinion leadership (KOL). In comparison, older consumers may rely more on expert-driven, informative content to aid in purchase decisions. These differences suggest that short-form video marketing strategies should be accurately segmented according to different age groups to optimize consumers' interactive experience and engagement. Future research could explore how age-specific preferences affect consumers' trust and purchase intent toward short video marketing to provide more targeted marketing strategy recommendations.

Despite using Harman's single factor test to assess Common Method Bias (CMB) in this study, this method may still have some limitations. Marker Variable Analysis or Multi-Source Data Collection could be used in future studies to make the results even more reliable and lessen the effect of any possible biases.

Finally, this study utilizes the cross-sectional survey method, which limits the identification of causal relationships between short video content characteristics, consumer trust, and purchase intention. Although the findings provide strong empirical support for the proposed relationship, it is still impossible to directly verify the dynamic mechanism of the causal effect. Future research could adopt an experimental design, a longitudinal study, or real-time behavioral tracking to explore how short video exposure affects consumers' decisions over time. Additionally, qualitative approaches, such as in-depth interviews, can provide deeper insights into how consumers interact with short-form video content and what key elements most influence their trust and purchase decisions.

Future research addressing these issues will help us gain insight into the theory and practice of short video content marketing and better understand the patterns of people's behavioral changes in the digital space.

Data availability

The data presented in this study can be made available upon request from the corresponding author.

Received: 21 November 2024; Accepted: 18 March 2025

Published online: 13 May 2025

References

1. We Are Social & Meltwater. *Digital 2024: Global overview report*. DataReportal. <https://datareportal.com/reports/digital-2024-global-overview-report>. (2024).
2. Gupta, S., Yadav, S. S., Kar, S. K. & Harichandan, S. Factors influencing the purchase intention of ethanol blended fuel in India: A sustainable cities perspective. *J. Adv. Manag. Res.* <https://doi.org/10.1108/jamr-03-2024-0082> (2025).
3. China Internet Network Information Center (CNNIC). The 54th statistical report on internet development in China. APNIC. Retrieved February 24, 2025 from https://conference.apnic.net/58/assets/files/APNZ606/cnnicupdate-2024.9_1725494012.pdf (2024).
4. Yadav, S. S. & Kar, S. K. Consumers' purchase intention of private labels: The case of e-retailers. *Glob. Bus. Organ. Excell.* <https://doi.org/10.1002/joe.22268> (2024).
5. Meng (Monroe), L., Kou, S., Duan, S. & Bie, Y. The impact of content characteristics of Short-Form video ads on consumer purchase Behavior: Evidence from TikTok. *J. Bus. Res.* **183**, 114874. <https://doi.org/10.1016/j.jbusres.2024.114874> (2024).
6. Pansari, A. & Kumar, V. Customer engagement: the construct, antecedents, and consequences. *J. Acad. Mark. Sci.* **45**(3), 294–311 (2017).
7. Yadav, S. S., Kar, S. K. & Rai, P. K. Why do consumers buy recycled shoes? An amalgamation of the theory of reasoned action and the theory of planned behaviour. *Front. Environ. Sci.* <https://doi.org/10.3389/fenvs.2022.1007959> (2022).
8. Lin, B., Chen, Y. & Zhang, L. Research on the factors influencing the re-purchase intention on short video platforms: A case of China. *PLoS ONE* **17**(3), e0265090. <https://doi.org/10.1371/journal.pone.0265090> (2022).
9. Miller, M. *YouTube for business : online video marketing for any business*. Que. (2011).
10. Krissanya, N., Sholikhah, S., Berutu, M. B. & Sari, D. A. Exploring the role of green. *Int. J. Appl. Econ. Financ. Account.* **15**(2), 88–95 (2023).
11. Pu, J., Hou, J., Wei, L. & Sun, Y. The analysis of marketing strategy of short video platforms—Taking Douyin as example. *Adv. Econ. Manag. Polit. Sci.* **9**(1), 355–360. <https://doi.org/10.54254/2754-1169/9/20230410> (2023).
12. Xu, X. Tiktok platform—Brand marketing and business model behind live commerce. *Adv. Econ. Manag. Polit. Sci.* **7**(1), 220–226. <https://doi.org/10.54254/2754-1169/7/20230236> (2023).
13. Yadav, S. S. & Kar, S. K. Influence of religious value and minimalism on repurchase intention of sustainable fashion: A combined PLS-SEM and NCA approach. *J. Clean. Prod.* **486**, 144585–144585. <https://doi.org/10.1016/j.jclepro.2024.144585> (2024).
14. Dai, X. & Wang, J. Effect of online video infotainment on audience attention. *Humanit. Soc. Sci. Commun.* **10**(1), 1–18. <https://doi.org/10.1057/s41599-023-01921-6> (2023).
15. Xiao, Y., Wang, L. & Wang, P. Research on the influence of content features of short video marketing on consumer purchase intentions. In *Proceedings of the 2019 4th International Conference on Modern Management, Education Technology and Social Science (MMETSS 2019)*, 351. <https://doi.org/10.2991/mmets-19.2019.82> (2019).
16. Cheung, C. M. K. & Thadani, D. R. The impact of electronic word-of-mouth communication: A literature analysis and integrative model. *Decis. Support Syst.* **54**(1), 461–470. <https://doi.org/10.1016/j.dss.2012.06.008> (2012).
17. Davis, F. D. Perceived usefulness, perceived ease of use, and user acceptance of information technology. *MIS Q.* **13**(3), 319–340. <https://doi.org/10.2307/249008> (1989).
18. Wang, X., Yu, Y., Zhu, Z. & Zheng, J. Visiting intentions toward theme parks: Do short video content and tourists' perceived playfulness on TikTok matter?. *Sustainability* **14**(19), 12206. <https://doi.org/10.3390/su141912206> (2022).
19. Cui, Y., Zhu, J. & Liu, Y. Exploring the social and systemic influencing factors of mobile short video applications on the consumer urge to buy impulsively. *J. Glob. Inf. Manag.* **30**(1), 1–23. <https://doi.org/10.4018/jgim.301201> (2022).
20. Hwei, T. Influence of online comments on clothing impulse buying behavior in mobile short video app live broadcast. *Front. Psychol.* **13**, 913073. <https://doi.org/10.3389/fpsyg.2022.913073> (2022).
21. Huang, T.-Y., Chen, W.-K., Chen, C.-W. & Silalahi, A. D. K. Understanding how product reviews on YouTube affect consumers' purchase behaviors in Indonesia: An exploration using the stimulus–organism–response paradigm. *Hum. Behav. Emerg. Technol.* **2022**, 1–19. <https://doi.org/10.1155/2022/4976980> (2022).
22. Orús, C., Gurra, R. & Flavián, C. Facilitating imaginations through online product presentation videos: Effects on imagery fluency, product attitude and purchase intention. *Electron. Commer. Res.* **17**(4), 661–700. <https://doi.org/10.1007/s10660-016-9250-7> (2016).
23. Yang, Q., Qin, L., Chen, Z., Ji, S., Zhang, K., & Ma, X. (2019, August 1). *Empirical Study on the Impact of Short Video Content Marketing on Consumer's Purchasing Intention based on the Integrated Model of TRA and ELM*. *Www.atlantis-Press.com*. Atlantis Press. <https://doi.org/10.2991/edmi-19.2019.86>
24. Gong, X., Ren, J., Zeng, L. & Xing, R. How KOLs influence consumer purchase intention in short video platforms—Mediating effects of emotional response and virtual touch. *Int. J. Inf. Syst. Serv. Sect.* **14**(1), 0. <https://doi.org/10.4018/ijiss.287576> (2022).
25. Jingga, F., Wiryawan, R. R., Rahmanita, M., & Adani, F. Z. User behavior analysis of short-form video prolonging usage towards purchase intention on social media using SEM method. In *2023 27th International Conference on Information Technology (IT)*. <https://doi.org/10.1109/it57431.2023.10078656> (2023).
26. Hautz, J., Füller, J., Hutter, K. & Thürridl, C. Let users generate your video ads? The impact of video source and quality on consumers' perceptions and intended behaviors. *J. Interact. Mark.* **28**(1), 1–15. <https://doi.org/10.1016/j.intmar.2013.06.003> (2014).
27. Lou, C. & Yuan, S. Influencer marketing: How message value and credibility affect consumer trust of branded content on social media. *J. Interact. Advert.* **19**(1), 58–73 (2019).

28. Pongpaew, W., Speece, M. & Tiangsoongnarn, L. Social presence and customer brand engagement on Facebook brand pages. *J. Prod. Brand Manag.* **26**(3), 262–281. <https://doi.org/10.1108/jpbm-08-2015-0956> (2017).
29. Apasrawiroe, D., Yawised, K., Chatrangsarn, M. & Muneesawang, P. Short-form video content (SVC) engagement and marketing capabilities. *Asian J. Bus. Account.* **15**(2), 221–246. <https://doi.org/10.22452/ajba.vol15no2.8> (2022).
30. Liu, L., Lee, M. K. O., Liu, R. & Chen, J. Trust transfer in social media brand communities: The role of consumer engagement. *Int. J. Inf. Manag.* **41**, 1–13. <https://doi.org/10.1016/j.ijinfomgt.2018.02.006> (2018).
31. Pavlou, P. A. Consumer acceptance of electronic commerce: Integrating trust and risk with the technology acceptance model. *Int. J. Electron. Commer.* **7**(3), 101–134 (2003).
32. Huang, Z., Zhu, Y., Hao, A. & Deng, J. How social presence influences consumer purchase intention in live video commerce: The mediating role of immersive experience and the moderating role of positive emotions. *J. Res. Interact. Mark.* **17**(4), 1–17. <https://doi.org/10.1108/jrim-01-2022-0009> (2022).
33. Hollebeek, L. D. & Macky, K. Digital content marketing's role in fostering consumer engagement, trust, and value: framework, fundamental propositions, and implications. *J. Interact. Mark.* **45**(1), 27–41. <https://doi.org/10.1016/j.intmar.2018.07.003> (2019).
34. Teixeira, T., Wedel, M. & Pieters, R. Emotion-induced engagement in internet video advertisements. *J. Mark. Res.* **49**(2), 144–159. <https://doi.org/10.1509/jmr.10.0207> (2012).
35. Yu, W., Han, X., Ding, L. & He, M. Organic food corporate image and customer co-developing behavior: The mediating role of consumer trust and purchase intention. *J. Retail. Consum. Serv.* **59**, 102377. <https://doi.org/10.1016/j.jretconser.2020.102377> (2021).
36. de Watanabe, E. A. M., Alfinito, S., Curvelo, I. C. G. & Hamza, K. M. Perceived value, trust and purchase intention of organic food: A study with Brazilian consumers. *Br. Food J.* **122**(4), 1070–1184. <https://doi.org/10.1108/bfj-05-2019-0363> (2020).
37. Arora, A., Rani, N., Devi, C. & Gupta, S. Factors affecting consumer purchase intentions of organic food through fuzzy AHP. *Int. J. Qual. Reliab. Manag.* <https://doi.org/10.1108/ijqrm-01-2021-0019> (2021).
38. Nursyirwan, V. I. & Ardaninggar, S. S. The factor analysis that influence the student purchase intention in Shopee e-commerce. *EAJ (Econ. Account. J.)* **3**(2), 118. <https://doi.org/10.32493/eaj.v3i2.y2020.p118-129> (2020).
39. Herzallah, D., Muñoz-Leiva, F. & Liebana-Cabanillas, F. Drivers of purchase intention in Instagram commerce. *Span. J. Mark. ESIC* **26**(2), 168. <https://doi.org/10.1108/sjme-03-2022-0043> (2022).
40. Lin, C. A. & Xu, X. Exploring bottled water purchase intention via trust in advertising, product knowledge, consumer beliefs and theory of reasoned action. *Soc. Sci.* **10**(8), 295. <https://doi.org/10.3390/socsci10080295> (2021).
41. Khan, N. S. The role of digital influencer credibility on purchase intention and the mediating effect of customer trust and engagement. *Global J. Manag. Adm. Sci.* **4**(1), 19–45. <https://doi.org/10.46568/gjmas.v4i1.177> (2023).
42. Khaleeli, M. & Jawabri, A. The effect of environmental awareness on consumers' attitudes and consumers' intention to purchase environmentally friendly products: Evidence from United Arab Emirates. *Manag. Sci. Lett.* <https://doi.org/10.5267/j.msl.2020.9.011> (2021).
43. Ayyub, S., Asif, M. & Nawaz, M. A. Drivers of organic food purchase intention in a developing country: The mediating role of trust. *SAGE Open* **11**(3), 215824402110450. <https://doi.org/10.1177/21582440211045076> (2021).
44. Lavuri, R., ChiappettaJabbour, C. J., Grebnevych, O. & Roubaud, D. Green factors stimulating the purchase intention of innovative luxury organic beauty products: Implications for sustainable development. *J. Environ. Manag.* **301**(2), 113899. <https://doi.org/10.1016/j.jenvman.2021.113899> (2022).
45. Habib, S., Hamadneh, N. N. & Hassan, A. The relationship between digital marketing, customer engagement, and purchase intention via OTT platforms. *J. Math.* **2022**, 1–12. <https://doi.org/10.1155/2022/5327626> (2022).
46. Khan, M. A. et al. Unleashing the role of e-word of mouth on purchase intention in select Facebook fan pages of smart phone users. *PLoS ONE* **19**(9), e0305631. <https://doi.org/10.1371/journal.pone.0305631> (2024).
47. Mehrabian, A. & Russell, J. A. *An approach to environmental psychology* (MIT Press, 1974).
48. Roslow, S., Li, T. & Nicholls, J. A. F. Impact of situational variables and demographic attributes in two seasons on purchase behaviour. *Eur. J. Mark.* **34**(9/10), 1167–1180. <https://doi.org/10.1108/03090560010342548> (2000).
49. Watson, L. & Spence, M. T. Causes and consequences of emotions on consumer behaviour: A review and integrative cognitive appraisal theory. *Eur. J. Mark.* **41**(5/6), 487–511. <https://doi.org/10.1108/03090560710737570> (2007).
50. Changhui, N. & Nannan, X. A review and prospects of foreign gamification marketing research. *Foreign Econ. Manag.* **39**(10), 72–85. <https://doi.org/10.16538/j.cnki.fem.2017.10.005> (2017).
51. Li, M., Wang, Q. & Cao, Y. Understanding consumer online impulse buying in live streaming e-commerce: A stimulus–organism–response framework. *Int. J. Environ. Res. Public Health* **19**(7), 4378 (2022).
52. Gefen, D. & Straub, D. W. Consumer trust in B2C e-commerce and the importance of social presence: Experiments in e-products and e-services. *Omega* **32**(6), 407–424. <https://doi.org/10.1016/j.omega.2004.01.006> (2004).
53. Dutta-Bergman, M. J. The impact of completeness and web use motivation on the credibility of e-health information. *J. Commun.* **54**(2), 253–269. <https://doi.org/10.1111/j.1460-2466.2004.tb02627.x> (2004).
54. Kowalczyk, P. Consumer acceptance of smart speakers: A mixed methods approach. *J. Res. Interact. Mark.* **12**(4), 418–431. <https://doi.org/10.1108/jrim-01-2018-0022> (2018).
55. Wu, J., Liu, L. & Huang, L. Consumer acceptance of mobile payment across time. *Ind. Manag. Data Syst.* **117**(8), 1761–1776. <https://doi.org/10.1108/imds-08-2016-0312> (2017).
56. Zhang, L., Nyheim, P. & Mattila, A. S. The effect of power and gender on technology acceptance. *J. Hosp. Tour. Technol.* **5**(3), 299–314 (2014).
57. Hassanein, K. & Head, M. Manipulating perceived social presence through the web interface and its impact on attitude towards online shopping. *Int. J. Hum. Comput. Stud.* **65**(8), 689–708. <https://doi.org/10.1016/j.ijhcs.2006.11.018> (2007).
58. Byrne, B. M. *Structural Equation Modeling With AMOS* (Routledge, 2016).
59. Preacher, K. J. & Hayes, A. F. Asymptotic and resampling strategies for assessing and comparing indirect effects in multiple mediator models. *Behav. Res. Methods* **40**(3), 879–891. <https://doi.org/10.3758/BRM.40.3.879> (2008).
60. Podsakoff, P. M., MacKenzie, S. B., Lee, J.-Y. & Podsakoff, N. P. Common method biases in behavioral research: A critical review of the literature and recommended remedies. *J. Appl. Psychol.* **88**(5), 879–903 (2003).
61. Hair, J., Black, W. C., Babin, B. J., & Anderson, R. E. (2010). *Multivariate Data Analysis: A Global Perspective* (7th ed.). Pearson Education, Cop.
62. Bagozzi, R. P. Evaluating structural equation models with unobservable variables and measurement error: A comment. *J. Mark. Res.* **18**(3), 375–381. <https://doi.org/10.1177/002224378101800312> (1981).
63. McDonald, R. P. & Ho, M.-H.R. Principles and practice in reporting structural equation analyses. *Psychol. Methods* **7**(1), 64–82. <https://doi.org/10.1037/1082-989x.7.1.64> (2002).
64. Browne, M. W. & Cudeck, R. Alternative ways of assessing model fit. *Sociol. Methods Res.* **21**(2), 230–258. <https://doi.org/10.1177/0049124192021002005> (1993).
65. Yu, S. et al. Consumer behavior based on the SOR model: How do short video advertisements affect furniture consumers' purchase intentions?. *BioResources* **19**(2), 2639–2659 (2024).

Author contributions

CL conceived and designed the research; CL and G.L. contributed to questionnaire distribution and collection;

CL performed the statistical analyses and drafted the manuscript; and CL and G.L. contributed to the interpretation of the results. N.A.M.H. and A.M.Z.B.A. supervised the implementation of this research. All authors reviewed and approved the final manuscript.

Declarations

Competing interests

The authors declare no competing interests.

Additional information

Supplementary Information The online version contains supplementary material available at <https://doi.org/10.1038/s41598-025-94994-z>.

Correspondence and requests for materials should be addressed to C.L. or N.A.M.H.

Reprints and permissions information is available at www.nature.com/reprints.

Publisher's note Springer Nature remains neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Open Access This article is licensed under a Creative Commons Attribution-NonCommercial-NoDerivatives 4.0 International License, which permits any non-commercial use, sharing, distribution and reproduction in any medium or format, as long as you give appropriate credit to the original author(s) and the source, provide a link to the Creative Commons licence, and indicate if you modified the licensed material. You do not have permission under this licence to share adapted material derived from this article or parts of it. The images or other third party material in this article are included in the article's Creative Commons licence, unless indicated otherwise in a credit line to the material. If material is not included in the article's Creative Commons licence and your intended use is not permitted by statutory regulation or exceeds the permitted use, you will need to obtain permission directly from the copyright holder. To view a copy of this licence, visit <http://creativecommons.org/licenses/by-nc-nd/4.0/>.

© The Author(s) 2025