

Research on the Impact of AI Virtual anchors Interaction Effects on Consumer Purchase Intentions in E-commerce Live Streaming Scenes

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Abstract—Purpose: The purpose of this study is to analyze and evaluate factors affecting AI virtual anchors on consumers' purchase intention in the Live streaming e-commerce. **Theoretical framework:** In the context of live streaming e-commerce, multiple elements of the interaction of AI virtual anchors will affect customers' sense of social presence, and then affect consumers' purchase intention.

Design/methodology/approach: In order to achieve the purpose of this study, literature review was carried out. This paper conducted an empirical study on the interactive effect of AI virtual anchors. Through data collection and analysis of 367 survey subjects, Cronbach's Alpha analysis, correlation analysis and regression analysis (RA) were used to analyze the results. **Findings:** The research results directly confirmed the five main factors of the interactive effect of AI virtual anchors (Personalized interactive experience, Interestingness, Real-time, Efficient content output, Image) authenticity) affects customers' sense of social presence and further consumers' purchase willingness. **Research, Practical & Social implications:** For all participants in live streaming e-commerce, it is necessary to fully understand how the interactive effect of AI virtual anchors affects consumer purchase intentions. **Originality/Value:** In live streaming e-commerce, there are few academic studies on how the interactive effect of AI virtual anchors affects purchase intention or behavior. This study is a supplement to the research on consumers' purchase intention against the backdrop of network broadcast, and it makes pertinent findings through a series of hypothesis tests.

Keywords— AI virtual anchor ; Interactive effect ; Consumer purchase intention.

I. INTRODUCTION

With the rapid development of information technology, e-commerce live streaming has become an innovative marketing method in modern retail industry. Especially with the support of big data and artificial intelligence technology, AI virtual hosts, as an emerging form of live streaming, have attracted the attention of a large number of consumers due to their unique advantages. Virtual hosts can provide services continuously for 24 hours, bringing unprecedented shopping experiences to consumers through highly personalized interactive experiences, creative and entertaining designs, real-time efficient content output, and increasingly realistic image authenticity (Xu, M. 2023). The application status of AI virtual host technology has made significant progress in recent years, especially showing extensive application potential and commercial value in fields such as e-commerce live streaming, news broadcasting, online education, and customer service.

Although the application prospects of AI virtual hosts are promising, how their interactive effectiveness affects consumers' purchase intentions, especially the mediating role of social presence, remains to be further explored. Social presence refers to the feeling of being immersed in the virtual environment that users experience during interaction, which has an important influence on consumer decision-making.

This study uses empirical methods to explore the impact of AI virtual hosts' interactive effectiveness in personalized interactive experiences, entertainment, real-time interaction, efficient content output, and image authenticity on consumers' purchase intentions. The research results are expected to enrich and improve the theoretical framework of e-commerce live streaming marketing effects and consumer behavior, while providing scientific basis and practical operational suggestions for enterprises to improve sales performance using AI virtual hosts. This will guide relevant enterprises to pay more attention to the improvement of interactive quality when utilizing AI virtual hosts, thereby promoting the development and upgrading of the entire e-commerce live streaming industry.

II. LITERATURE REVIEW

AI Virtual Anchors

AI virtual anchors employ technologies such as image generation, speech synthesis, and natural language processing to achieve human-like real-time interaction functions (Wang, X, 2023, Ding, H., & Zhang, L, 2023). They have emerged in some e-commerce platforms, replacing or assisting human anchors in product introductions and promotions. They can work 24/7 without interruption, reducing labor costs, and simultaneously optimize recommended products through algorithms to achieve personalized interactive experiences (Liu, H, 2023). Virtual anchors can accurately convey product information, unaffected by emotions, fatigue, etc., and can customize their image and voice according to brand positioning, enhancing brand consistency and professionalism (Li, J, 2021).

Some companies adopt AI virtual anchors as solutions for cross-border e-commerce, overcoming language and cultural barriers to achieve multilingual real-time translation and communication. Virtual anchors are also utilized in the news broadcasting field to automatically synthesize and broadcast news content, improving content update efficiency and

adapting to broadcasting demands at different time periods (Liang, X, 2023).

Importance of Interactive Effects in E-commerce Livestreaming

The real-time interactive nature of e-commerce livestreaming allows anchors to directly communicate with viewers, answer questions, and solicit feedback, greatly enhancing consumer engagement and sense of belonging. Viewers can ask questions, make comments, or like products in real-time, fostering an atmosphere of "face-to-face" shopping.

Research indicates that the interactivity of e-commerce livestreaming stimulates consumers' impulsive buying intentions. For example, marketing tactics like limited-time discounts, limited quantity sales, and livestream-exclusive benefits combined with enthusiastic endorsements from anchors and interactive competitions among viewers can easily trigger immediate purchase behaviors. Intimate interactions between anchors and fans can establish emotional connections and trust, which are crucial for brand loyalty and word-of-mouth dissemination. Long-term stable interactions between anchors and viewers can effectively enhance consumer trust in merchants and subsequently improve repurchase rates (Ge,W,2023). Real-time interaction offers the possibility of personalized services, such as adjusting explanatory content and providing customized recommendations based on viewer needs. Additionally, interactive elements like games, lucky draws, and live calls increase entertainment and fun, enhancing the overall shopping experience (Sun,Y, 2023).

Comparison between Virtual Anchors and Human Anchors

Both virtual anchors and human anchors play important roles in introducing products, answering questions, and guiding purchases to viewers. Both can engage in real-time interaction with viewers, responding to comments or questions. Although the methods differ, they both provide a certain level of communication experience. Both can shape brand image and enhance brand awareness and influence through personal charm and professionalism (H,B, 2022).

Human anchors can attract fans through unique hosting styles, while virtual anchors can provide personalized services through setting specific characters, voices, and images. Virtual anchors can livestream continuously 24/7, unaffected by physical conditions, emotional fluctuations, etc., while human anchors need to consider rest time and energy allocation (D,H.Zhang,Lei, 2023). The use of virtual anchors does not require high labor costs (such as wages, benefits, etc.) or involve signing and termination risks, resulting in relatively lower long-term operational costs (Zhang,X. Lin,Z, & Yang,J, 2023). Human anchors can establish deep trust relationships through genuine emotional expressions and personalized interactions, which may resonate more easily with consumers and foster a sense of closeness; however, the emotional expression capability of virtual anchors is limited by the current level of AI technology, although it is continuously

improving, there is still a gap in authenticity and deep emotional connection (Meng,Sn, 2023).

The design of virtual anchors' images is often more perfect and conforms to popular aesthetic standards, and can be flexibly customized to adapt to different brand positioning, while the appearance and performance of human anchors are limited by individual differences.

Social Presence

Social presence generally refers to the sense of presence and interactivity in virtual reality (VR), augmented reality (AR), or online social environments (Gong, Y. Tan,&Yu,x, et al., 2023). This feeling includes, but is not limited to: intuitive feedback when interacting with characters or other users in virtual environments, the perception of the size, depth, and direction of the virtual environment, and adaptation and integration into virtual social rules and cultural atmospheres (Deng,Jun. Yi, X, & Fu,S, 2023).

In a highly immersive VR game, if well-designed, players can experience a strong sense of social presence, as if they are truly immersed in the community or society constructed by the game, engaging in real social interactions with other game characters or players (Wu, C. C. 2023).

Social presence is an important indicator for measuring the quality of virtual environments and is significant for enhancing user experience and interaction effects.

III. MATERIAL AND METHODOLOGY

Research framework

This article constructs an SOR model, with the personalized interaction experience, Interestingness, real-time, efficient content output, and Image authenticity of the AI virtual anchor's image as stimulating variables. Social presence is considered the consumer cognition, and consumer purchase intention serves as the outcome variable. The final research model is illustrated in Figure 1.

Research hypothesis

The personalized interaction experience of AI virtual anchors refers to the interactive process between users and virtual anchors, where the virtual anchor utilizes artificial intelligence technology to provide customized and contextually relevant communication content and services based on user characteristics, behavioral habits, emotional states, and real-time feedback (Xu,F,& Hu ,X, 2023). Virtual anchors can understand and respond to audience questions through natural language processing technology, providing personalized product recommendations and services to enhance user engagement (Ruan ,Y, &Shi,Y, et al., 2023). The ability for emotional recognition and simulation enables virtual anchors to adjust dialogue strategies according to changes in consumer emotions, creating a more intimate and authentic communication atmosphere. Based on this, the following hypotheses are proposed.

Hypothesis 1: There is a positive relationship between personalized interaction experience and social presence.

AI virtual anchors can be designed as various characters, such as cartoon characters, celebrity impersonations, historical

figures, etc., exhibiting diverse performance styles during live broadcasts, including humorous language, exaggerated actions, and expressions (Tan,X. &Li Pei, 2024). Through carefully crafted content and creative plots, virtual anchors can capture the audience's interest, increasing the entertainment

value of viewing. Engaging content and interactive methods can attract users to participate more deeply in interactions with virtual anchors, thereby enhancing social presence (Cao ,Q, & Bu,F, 2023). Based on this, the following hypothesis is proposed.

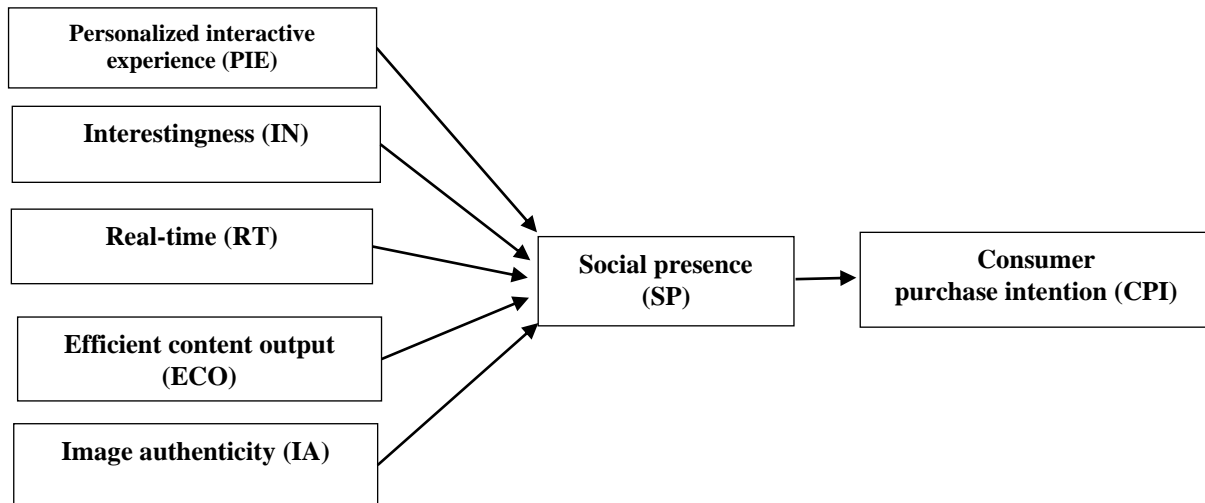


Figure 1 Conceptual framework

Hypothesis 2: There is a positive relationship between the fun factor of AI virtual anchors and social presence.

In the application of AI virtual anchors, real-time nature refers to the ability of virtual anchors to rapidly, accurately respond to user inputs or environmental changes, and immediately generate corresponding dialogue content or behavioral responses (Hu,Y, 2023). In the context of e-commerce livestreaming, virtual anchors can promptly answer consumer questions about products or dynamically report the latest developments in the live stream, making the interaction process more fluid and natural (Wang,X, &Lu,J, 2023). Only when virtual anchors can engage in effective communication in real-time and maintain synchronous interaction can users feel a continuous and on-site experience similar to actual social activities (Gong,Y,& Tan, Y, et al., 2023). Good real-time nature helps enhance user trust and closeness to virtual anchors, thereby increasing user enthusiasm and involvement and further strengthening the experience of social presence. Based on this, the following hypothesis is proposed.

Hypothesis 3: There is a positive relationship between the real-time nature of AI virtual anchors and social presence.

One major advantage of AI virtual anchors is their ability to quickly, continuously, and accurately generate and output large amounts of content without the need for rest and unaffected by emotional fluctuations (Xu,M, 2023). Virtual anchors can adjust content based on real-time news dynamics or user feedback promptly. This real-time responsiveness helps build a stronger sense of social presence (Ding, H, &Zhang, L, 2023). To achieve a good sense of social presence, it is necessary to ensure output efficiency while focusing on the simulation of details and humanized design, such as delicate simulation of emotional expressions, natural transitions of facial expressions, and even eye contact, subtle

non-verbal communication elements. Based on this, the following hypothesis is proposed.

Hypothesis 4: There is a positive relationship between the efficient content output of AI virtual anchors and social presence.

The authenticity of appearance refers to the degree of fidelity in the appearance, actions, expressions, and voice of virtual anchors. Highly authentic virtual anchors can simulate subtle facial expression changes, body movements, and the richness of speech tones similar to human anchors, including but not limited to facial capture technology based on deep learning, 3D modeling technology, and high-fidelity speech synthesis technology (Wang,X, & Lu,J, 2023). The closer the image of virtual anchors is to that of real humans, the easier it is for viewers to immerse themselves and feel like they are facing a real individual (Ding, H, & Zhang,L, 2023). For example, highly realistic facial expressions can better convey emotions, and lifelike body language helps to convey information more naturally, thereby enhancing social presence. Based on this, the following hypothesis is proposed.

Hypothesis 5: There is a positive relationship between the authenticity of appearance of AI virtual anchors and social presence.

High social presence in e-commerce livestreaming environments can enhance the vividness and authenticity of information transmission, enabling consumers to understand product features and advantages more intuitively and comprehensively, thereby enhancing their perception of product value and, consequently, their purchase intention (Tan,X.,& Li, P, 2024). In the context of e-commerce livestreaming, consumers are stimulated by the interaction of AI virtual anchors, leading to the generation of social

presence, which ultimately influences purchase intention. Based on this, the following hypothesis is proposed.

Hypothesis 6: Social presence mediates the relationship between personalized interaction experience and purchase intention.

Hypothesis 7: Social presence mediates the relationship between the Interestingness and purchase intention.

Hypothesis 8: Social presence mediates the relationship between the real-time and purchase intention.

Hypothesis 9: Social presence mediates the relationship between the efficient content output and purchase intention.

Hypothesis 10: Social presence mediates the relationship between the Image authenticity and purchase intention.

IV. RESULTS AND DISCUSSION

This study primarily collected and analyzed data through the method of designing survey questionnaires. The questionnaires were mainly distributed electronically via the Credamo platform for data collection. In the end, 380 individuals completed the questionnaire. After removing questionnaires with excessively short completion times, 367 valid responses remained. Data analysis was conducted using SPSS software, and the results of descriptive statistical analysis are presented in Table 1.

TABLE 1. Descriptive Statistical Analysis of the Data

Variable	Option	Frequency	Percentage%
Gender	Male	177	48.2
	Female	190	51.8
Age	55 years and older	3	0.8
	18-26 years old	144	39.2
	Under 18 years old	1	0.3
	27-35 years old	146	39.8
	35-45 years old	57	15.5
	46-55 years old	16	4.4
Education	Bachelor's degree	251	68.4
	Associate's degree	35	9.5
	High school diploma or below	15	4.1
	Master's degree or above	66	18
Occupation	Self-employed	10	2.7
	Other	9	2.5
	Corporate employee	197	53.7
	Government employee	41	11.2
	Student	93	25.3
	Freelancer	17	4.6

Reliability and validity test

The present study utilizes SPSS and AMOS software to assess the reliability and validity of the questionnaire results. The Cronbach's α , AVE, and CR of each variable all meet the standards. The final examination results are depicted in Table 2.

The Cronbach's α coefficient ranging from 0.823 to 0.84 indicates a high level of internal consistency reliability for the scale or questionnaire. It is generally considered acceptable when $\alpha \geq 0.7$, indicating good consistency and stability of the scale items in measuring the trait or concept, suggesting a high level of internal consistency reliability.

The $CR \geq 0.8$ implies strong reliability of the constructed factor or latent variable. CR is used to assess the effectiveness of a set of observed variables as indicators of a latent factor

score. When CR is greater than 0.7, it is generally considered reasonable, and when it exceeds 0.8, it indicates excellent composite reliability of the group of items.

TABLE 2. Reliability and Validity Test Table

Variable	Number of Measurement Items	Cronbach's α	A V E	C R
Personalized interactive experience (PIE)	4	0.838	0.5433	0.8299
Interestingness (IN)	4	0.840	0.6538	0.8172
Real-time (RT)	4	0.824	0.6017	0.8436
Efficient content output (ECO)	4	0.823	0.6732	0.8102
Image authenticity (IA)	4	0.826	0.6244	0.8338

The $AVE > 0.5$ means that the factor explains at least half or more of the variance of the items, meeting the requirements for validity testing, indicating that the factor should be able to effectively "extract" the common variance among its observed variables.

In summary, these statistical indicators demonstrate that the scale or model under study has good reliability and validity, making it suitable for measuring the constructs of interest.

Correlation Analysis

The purpose of correlation analysis is to explore the relationship between variables, determine their direction of influence, and facilitate further testing, judgment, and in-depth analysis. In order to investigate how the interactive effects of AI virtual anchors influence variables of purchase intention and validate the causal relationships between these variables, it is necessary to conduct correlation analysis between variables and consumer purchase intention. The Pearson correlation analysis method is applied to test the correlation between variables, and the correlation between variables is shown in Table 3.

TABLE 3. Table of Variable Correlations

		PIE	IN	RT	ECO	IA	SP	CPI
PIE	Pearson Correlation	1	.514**	.552**	.632**	.994**	.519**	.552**
	Sig.		.000	.000	.000	.000	.000	.000
IN	Pearson Correlation	.514**	1	.421**	.508**	.515**	.696**	.421**
	Sig.	.000		.000	.000	.000	.000	.000
RT	Pearson Correlation	.552**	.421**	1	.607**	.553**	.423**	.627**
	Sig.	.000	.000		.000	.000	.000	.000
ECO	Pearson Correlation	.632**	.508**	.607**	1	.637**	.509**	.607**
	Sig.	.000	.000	.000		.000	.000	.000
IA	Pearson Correlation	.994**	.515**	.553**	.637**	1	.520**	.553**
	Sig.	.000	.000	.000	.000		.000	.000
SP	Pearson Correlation	.519**	.696**	.423**	.509**	.520**	1	.423**
	Sig.	.000	.000	.000	.000	.000		.000
CPI	Pearson Correlation	.552**	.421**	.627**	.607**	.553**	.423**	1
	Sig.	.000	.000	.000	.000	.000	.000	

** . At the 0.01 level (two-tailed), the correlation is significant.

Consumer purchase intention (CPI) is significantly correlated with Personalized Interactive Experience (PIE) ($r=.552^{**}$, $P<0.01$), Interestingness (IN) ($r=.421^{**}$, $P<0.01$), Real-time (RT) ($r=.627^{**}$, $P<0.01$), Efficient Content Output (ECO) ($r=.607^{**}$, $P<0.01$), Image Authenticity (IA) ($r=.553^{**}$, $P<0.01$), and Social Presence (SP) ($r=.423^{**}$, $P<0.01$). This indicates a causal relationship between the variables and consumer purchase intention, laying the groundwork for further regression analysis and providing preliminary validation for some hypotheses.

Hypothesis Testing

This study first applies AMOS software to conduct structural equation modeling analysis on the data. The results show that the fit indices are as follows: the chi-square-to-degree-of-freedom ratio (χ^2/df) = 1.773, the comparative fit index (CFI) = 0.968, the Tucker-Lewis index (TLI) = 0.959, the root mean square error of approximation (RMSEA) = 0.048, and the standardized root mean square residual (SRMR) = 0.033. The analysis results all indicate a high level of fit validity for this study. Additionally, this study examines the original hypotheses through regression analysis, with the results shown in Table 4. From Table 4, it can be seen that hypotheses H1 to H6 are supported.

TABLE 4. Hypothesis Testing Results

Hypotheses	Standardized regression coefficient	T	Hypothesis testing results
H1: Personalized interactive experience → Social presence	0.243**	3.981	Supported
H2: Interestingness → Social presence	0.297**	5.339	Supported
H3: Real-time → Social presence	0.189**	4.477	Supported
H4: Efficient content output → Social presence	0.217**	2.457	Supported
H5: Image authenticity → Social presence	0.144**	2.342	Supported
H6: Social presence → Purchase intention	0.236**	4.254	Supported

Note: ** indicates significance at the 0.01 level, * indicates significance at the 0.05 level.

Mediation Test

This study employed the PROCESS plugin in SPSS to examine the mediation effects, and the results are shown in Table 5. From Table 5, it can be observed that the mediating effects of social presence and trust in the model exist, supporting hypotheses H7 to H11.

TABLE 5. Results of Mediation Effects Test

Indirect Effects	Coefficients	Standard Error	Lower Bound	Upper Bound
Personalized interactive experience → Social presence → Purchase intention	0.1644	0.0346	0.0986	0.2562
Interestingness → Social presence → Purchase intention	0.1579	0.0453	0.0887	0.2567
Real-time → Social presence → Purchase	0.1631	0.0399	0.1217	0.2768

intention				
Efficient content output → Social presence → Purchase intention	0.1826	0.0467	0.1102	0.2880
Image authenticity → Social presence → Purchase intention	0.1829	0.0488	0.1046	0.2814

V. CONCLUSION AND SUGGESTIONS

Conclusion

In this study, an empirical analysis was conducted on the impact of AI virtual anchors' interactive effects in e-commerce live streaming scenes on consumers' purchase intentions. Through carefully designed questionnaires, data on personalized interactive experiences, interestingness, real-time interaction, efficient content output, and image authenticity in AI virtual anchor interactions with customers were collected. Social presence was used as a mediating variable to explore its role in influencing consumer purchase intentions.

The empirical results indicate significant correlations and effects among the independent variables, the mediating variable, and the dependent variable. The reliability and validity tests demonstrate high internal consistency (Cronbach's α coefficients all above 0.8), as well as robust structural and convergent validity (CR values and AVE values both exceeding standard thresholds of 0.8 and 0.5, respectively). This confirms the effectiveness of the research tools and the reasonableness of the research hypotheses.

The data analysis reveals that personalized interactive experiences, interestingness, real-time interaction, efficient content output, and image authenticity of AI virtual anchors have significant positive effects on the social presence they create. Enhanced social presence positively influences consumers' purchase intentions. This suggests that by optimizing these interactive features, AI virtual anchors can enhance users' immersive experiences in e-commerce live streaming scenarios, thereby stimulating and strengthening their purchase intentions.

Based on this, the study concludes that the interactive efficacy of AI virtual anchors is a key factor significantly influencing consumers' purchase intentions in e-commerce live streaming environments, with social presence playing an important mediating role in this process. This study not only validates the importance of AI virtual anchor interactive traits for the marketing value of e-commerce live streaming but also provides theoretical evidence and practical references for how businesses can use technological means to enhance live shopping experiences and effectively improve conversion rates. Future research could further explore optimization strategies for various dimensions of AI virtual anchor characteristics to more accurately meet consumer needs and drive consumer upgrades and continuous innovation in the e-commerce live streaming industry.

Suggestions

Based on the in-depth exploration and empirical analysis of the impact of AI virtual anchors' interactive efficacy on consumer purchase intentions in e-commerce live streaming

scenarios, the following targeted recommendations are proposed:

First, strengthen personalized interactive experiences: E-commerce platforms should fully leverage AI technology to further enhance the personalized interaction capabilities of virtual anchors. For example, through deep learning of user behavior data, achieve more accurate personalized recommendations and real-time interactive communication, enhancing consumers' sense of participation and belonging.

Second, optimize interestingness and content output: Design and implement attractive and entertaining live streaming content, combining hot topics, gamified interactions, and other means to increase viewers' interest. At the same time, leverage AI's powerful information processing capabilities to ensure that live streaming content is efficient, accurate, and timely, meeting consumers' needs for quickly obtaining effective product information.

Third, enhance image authenticity and real-time interaction: Continuously invest in technology research and development to improve the realism and fluidity of virtual anchors' images and movements to achieve more natural and realistic interactive effects. Simultaneously, utilize advanced technologies such as 5G and cloud computing to ensure the real-time response speed of virtual anchors, eliminating the negative experiences caused by delays.

Fourth, foster social presence: Emphasize the creation of social presence by constructing immersive shopping environments, simulating real interpersonal communication situations, making consumers feel as if they are on-site, thereby strengthening their purchase intentions. For example, enhance virtual anchors' emotional expression capabilities and situational awareness functions so that they can provide appropriate feedback based on changes in audience emotions.

Fifth, practice and evaluation go hand in hand: E-commerce platforms should continuously experiment and improve various interactive features of virtual anchors in practical applications and establish effective evaluation mechanisms. Regularly collect and analyze user feedback to adjust strategies promptly, ensuring continuous improvement of interactive efficacy and continuous enhancement of consumer purchase intentions.

REFERENCES

- [1]. Deng, J, Yi,X, & Fu,S. (2023). How do Social Robots Enhance User Social Presence? The Role of Emoji Emotional Valence in Human-Machine Dialogue Interaction. *Journal of Library and Information Sciences*, 40(2), 29-39.
- [2]. Ding, H., & Zhang, L. (2023). "Digital Avatar" of Human Anchors: Reshaping and Restricting the News Industry by AI Virtual Anchors in the Perspective of Media Availability. *Northern Media Research*, (06), 17-24. doi:10.19544/j.cnki.bmyj.2023.0117.
- [3]. Ding, H., & Zhang, L. (2023). "Digital Avatar" of Human Anchors: Reshaping and Restricting the News Industry by AI Virtual Anchors in the Perspective of Media Availability. *Northern Media Research*, (06), 17-24. doi:10.19544/j.cnki.bmyj.2023.0117.
- [4]. Ge, W. (2023). Influence of Online Interaction on Consumer Purchase Intentions and Marketing Implications. *Modern Business*, (8), 48-51.
- [5]. Hu, Y. (2023). Insights into the Characteristics of Second-Dimensional Virtual Anchor
- [6]. Characters for Human Anchors. *Audiovisual World*, (04), 57-61. doi:10.13994/j.cnki.stj.2023.04.015.
- [7]. Huang, B. (2022). "Breaking the Circle" for "Human Anchors" under the Strong Impact of "Virtual Anchors". *Southeast Communication*, (04), 16-18. doi:10.13556/j.cnki.dncb.cn35-1274/j.2022.04.021.
- [8]. Li, J. (2021). Research on the Current Situation of Virtual Anchors Applied to Taobao Live in the Era of Intelligent Media. *Journalism and Communication*, (11), 2.
- [9]. Li, J., & Li, Y. (2023). Application of Deep Synthesis Technology and Risk Management. *Journal of Network and Information Security*, 9(2), 184-190.
- [10]. Liang, X. (2023). "Xiaoqing" from Guangxi TV Station Emerges as a New Force in Broadcasting: Advantages and Broad Prospects of AI Virtual Anchors. *China Radio and Television*.
- [11]. Lin, H. (2020). Analysis of the Current Situation of China's Virtual Anchor Industry from the Perspective of Media Materiality. *Advances in Social Sciences*, 9, 1287.
- [12]. Lin, H. (2020). The Dilemma and Breakthrough of China's Virtual Anchor Industry Breaking the Circle. *Advances in Social Sciences*, 9, 1867.
- [13]. Liu, H. (2023-12-20). Virtual Anchors Are "Stealing Jobs". *Shanxi Daily*, 011. doi:10.28713/n.cnki.nshxr.2023.004887.
- [14]. Meng, S. (2023). Master's Thesis on the Development of AI and Human Anchors in the Era of Intelligent Media. Henan University. <https://link.cnki.net/doi/10.27114/d.cnki.ghnau.2023.000157> doi:10.27114/d.cnki.ghnau.2023.000157.
- [15]. Sun, Y. (2023-05-12). Will AI Anchors Replace Li Jiaqi? *IT Times*, 001. doi:10.28404/n.cnki.nitsd.2023.000226.
- [16]. Tian, L., & Li, D. (2023). Impact Study of E-commerce Anchor Online Interaction on Consumer Purchase Intentions. *Technology and Market*, 30(7), 187-192.
- [17]. Tian, M. (2022). Study on the Impact of Internet Celebrity Characteristics on Impulse Purchase Intention of Customers: A Case Study of Live Broadcasting Scenes. *National Circulation Economy*, (19), 4-7.
- [18]. Wang, X. (2023). Exploration of the Strategic Integration and Development of AI Virtual Anchors and Traditional Broadcast Hosts. *News Research Digest*, 14(8), 1-3.
- [19]. Wang, X., & Lu, J. (2023). Presentation and Group Interaction Patterns of AI Virtual Anchors. *Media Forum*, 6(19), 61-63.
- [20]. Wang, X., & Lu, J. (2023). Presentation Methods and Group Interaction Patterns of AI Virtual Anchors. *Media Forum*, 6(19), 61-63.
- [21]. Xu, M. (2023). Challenges and Ways Out for the Development of AI Virtual Anchors in the Intelligent Era. *Media*, (21), 53-55.
- [22]. Zhang, X., Lin, Z., & Yang, J. (2023). AI-Driven: Value, Issues, and Trends of Virtual Anchors. *International Brand Observation*, (4), 30-34.