

Examining the role of parasocial interactions in generating the bandwagon effect: a parallel mediation and multigroup analysis

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Abstract

Purpose – The bandwagon effect – a psychological phenomenon where people embrace particular behaviours, purchase products or support trends simply because many others are doing the same – is emerging as an important concept in marketing literature. This study aims to investigate the role of parasocial interactions (PSI) in generating the bandwagon effect, using the parallel mediation of vicarious expression and electronic word of mouth (eWOM).

Design/methodology/approach – Framed within the context of parasocial relationship theory, this study used a purposive sampling method to collect data from 488 social media users who actively followed at least one tech YouTube influencer and one brand fan page on a social media platform, with a specific focus on the online retail sector. The collected data was analysed using partial least squares structural equation modelling and a multigroup analysis based on gender.

Findings – The results demonstrate that PSI with social media influencers significantly enhances mechanisms like vicarious expression experiences and eWOM, both of which emerged as key drivers of the bandwagon effect. Vicarious expression positively shapes consumer attitudes, while eWOM amplifies product and brand

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Erratum: It has come to the attention of the publisher that article Nadroo, Z.M., Jayawardena, N.S., Naqshbandi, M.A., and Thaichon, P. (2025), “Examining the role of parasocial interactions in generating the bandwagon effect: a parallel mediation and multigroup analysis”, – *Spanish Journal of Marketing – ESIC*, Vol. ahead-of-print No. ahead-of-print. <https://doi.org/10.1108/SJME-08-2024-0233>, incorrectly listed author Zeeshan Majeed Nadroo’s affiliation. This has now been amended from IILM University, Gurugram, India to School of Management, IILM University, Gurugram, India.

This error was introduced during the article publication process, for which the publisher apologises.



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discussions within social networks. These mechanisms fully and parallelly mediate the relationship between PSI and the bandwagon effect.

Practical implications – This study offers various insights for brands, particularly those that operate online and/or are newly launched. The study showcases how the bandwagon effect for products and brands can be generated through the integrated influence of parasocial interactions with influencers, vicarious expression and eWOM.

Originality/value – This study uniquely identifies PSI, eWOM, vicarious expression and consumer attitude as key antecedents of the bandwagon effect, with vicarious expression and eWOM parallelly mediating the association between PSI and the bandwagon effect. It offers fresh insights into leveraging PSI with YouTube-based tech influencers to enhance vicarious product experiences and brand associations through engaging video content, highlighting its strategic potential for marketers.

Keywords Parasocial interaction, Bandwagon effect, Vicarious expression, Influencer marketing, EWOM

Paper type Research paper

Examinando el papel de las interacciones parasociales en la generación del efecto de arrastre: un análisis de mediación paralela y multigrupo

Resumen

Objetivo – El efecto de arrastre—un fenómeno psicológico en el que las personas adoptan determinados comportamientos, compran productos o apoyan tendencias simplemente porque muchos otros lo hacen—está emergiendo como un concepto relevante en la literatura de marketing. Este estudio tiene como objetivo investigar el papel de las interacciones parasociales (PSI) en la generación del efecto de arrastre, utilizando la mediación paralela de la expresión vicaria y el boca a boca electrónico (eWOM).

Diseño/metodología/enfoque – Enmarcado en la teoría de la relación parasocial, este estudio empleó un muestreo intencional para recopilar datos de 488 usuarios de redes sociales que seguían activamente al menos a un influencer tecnológico en YouTube y a una página de fans de marca en una plataforma social, con un enfoque específico en el sector minorista en línea. Los datos recolectados se analizaron mediante modelos de ecuaciones estructurales de mínimos cuadrados parciales (PLS-SEM) y un análisis multigrupo en función del género.

Resultados – Los resultados muestran que las PSI con influencers en redes sociales mejoran significativamente mecanismos como las experiencias de expresión vicaria y el eWOM, ambos identificados como impulsores clave del efecto de arrastre. La expresión vicaria influye positivamente en las actitudes de los consumidores, mientras que el eWOM amplifica las conversaciones sobre productos y marcas dentro de las redes sociales. Estos mecanismos median de manera completa y paralela la relación entre PSI y el efecto de arrastre.

Implicaciones prácticas – El estudio ofrece diversas recomendaciones para las marcas, en particular aquellas que operan en línea y/o que son de reciente lanzamiento. Se evidencia cómo el efecto de arrastre en productos y marcas puede generarse mediante la influencia integrada de las interacciones parasociales con influencers, la expresión vicaria y el eWOM.

Originalidad/valor – Este estudio identifica de forma única las PSI, el eWOM, la expresión vicaria y la actitud del consumidor como antecedentes clave del efecto de arrastre, mostrando cómo la expresión vicaria y el eWOM median paralelamente la asociación entre PSI y el efecto de arrastre. Aporta nuevas perspectivas sobre cómo aprovechar las PSI con influencers tecnológicos en YouTube para potenciar experiencias vicarias de productos y asociaciones de marca a través de contenidos en video atractivos, resaltando su potencial estratégico para los profesionales del marketing.

Palabras clave Interacción parasocial, Efecto de arrastre, Expresión vicaria, Marketing de influencers, eWOM

Tipo de artículo Trabajo de investigación

探究拟社会互动在从众效应生成中的作用：并行中介与多群体分析

摘要

研究目的 – 从众效应是一种心理现象，即人们仅仅因为“许多人都在这样做”而采纳特定行为、购买产品或支持趋势，正在成为营销文献中的一个重要概念。本研究旨在探讨拟社会互动（PSI）在产生从众效应中的作用，并引入替代性表达和电子口碑（eWOM）的并行中介机制。

研究设计/方法/路径 – 在拟社会关系理论的框架下, 本研究采用目的性抽样方法, 从488名社交媒体用户中收集数据。这些用户均至少活跃关注一名科技类YouTube意见领袖以及一个品牌粉丝主页, 研究重点聚焦于网络零售领域。收集的数据通过偏最小二乘结构方程模型 (PLS-SEM) 进行分析, 并基于性别进行了多群体分析。

研究结果 – 结果表明, 与社交媒体网红的PSI显著促进了替代性表达体验和电子口碑 (eWOM) 等机制, 这些机制成为驱动从众效应的关键因素。替代性表达积极塑造消费者态度, 而eWOM则放大了社交网络中关于产品和品牌的讨论。这些机制在PSI与从众效应之间起到完全且并行的中介作用。

实践启示 – 本研究为品牌, 尤其是在线运营或新进入市场的品牌, 提供了多方面的启示。研究展示了如何通过网红拟社会互动、替代性表达和eWOM的整合影响来生成产品与品牌的从众效应。

研究原创性 – 本研究独特地识别了PSI、eWOM、替代性表达以及消费者态度作为从众效应的重要前因, 揭示了替代性表达和eWOM在PSI与从众效应之间的并行中介作用。研究为如何利用基于YouTube的科技类网红, 通过生动的视频内容提升消费者替代性产品体验和品牌联想, 提供了新的战略性见解。

关键词 拟社会互动, 从众效应, 替代性表达, 网红营销, 电子口碑
文章类型 研究型论文

1. Introduction

The increasing popularity of brands and products among consumers plays a significant role in improving sales, enhancement of brand reputation and brand acceptance among potential customers (Zhang and Wang, 2024). In the online retail sector, marketers use various strategies to increase their popularity, which include celebrity endorsements (Shao *et al.*, 2024), online brand communities (Wang *et al.*, 2023) and influencer marketing (Ren *et al.*, 2023). However, the bandwagon effect, a phenomenon where the demand for a product, service or brand increases due to its perceived popularity, has emerged at the core of these efforts (Eastman and Iyer, 2023; Nadroo *et al.*, 2024). This effect has become a focal point for organisations, especially for newly launched brands and those operating online (Khelladi *et al.*, 2023).

Cognitive biases often shape the bandwagon effect, in which public opinion or behaviour is impacted by the actions or endorsements of trusted figures such as celebrities and influencers (Wang *et al.*, 2023). It captures the inclination of people to follow a trend or behaviour as it is widely accepted (Cho *et al.*, 2022; Eastman and Iyer, 2023). The positive bandwagon effect is heightened when people with a highly interdependent self-concept seek for social approval (Anantharaman *et al.*, 2022). The bandwagon effect can enhance consumer trust and purchase intentions, as individuals perceive popular products as more trustworthy, prestigious and of higher quality (Jin and Ryu, 2020). As such, marketers often leverage this effect by highlighting widespread adoption to attract new customers, creating a cycle where increased popularity begets further consumer interest (Nadroo *et al.*, 2024). Understanding the bandwagon effect enables marketers to craft strategies that capitalise on consumers' innate tendencies to follow the crowd and increase brand visibility and sales.

In line with this, parasocial interactions, a one-sided imagined or illusionary relationship between media viewers and media figures such as social media influencers or celebrities (Sokolova and Kefi, 2020) have emerged as an important marketing instrument (Agnihotri *et al.*, 2023). These interactions often lead to electronic word of mouth (eWOM) and influence the decision-making of consumers by creating an illusion of mutual connection with the influencer (Cho *et al.*, 2022). The way influencers are portrayed in the media frequently makes viewers feel a personal connection to them, which encourages buyers to emulate their brand preferences and lifestyles (Agnihotri *et al.*, 2023; Chen *et al.*, 2019). This psychological phenomenon is a propellant for the bandwagon effect (Nadroo *et al.*, 2024). Thus, engagement based on these interactions is psychological action, whereby people feel an illusory mutual connection with the influencer and engage with the character as if they coexisted in a fictional reality (Cho *et al.*, 2022). Media depictions of celebrities often enable people to feel they know

them, even though they do not directly interact with them (Sokolova and Kefi, 2020; Eastman and Iyer, 2023). People feel like a part of the group to which the celebrity belongs and, as a result, start imitating their lifestyle and adopting their preferred or recommended brands, which may contribute to the generation of the bandwagon effect.

Similarly, vicarious expression plays a crucial role in influencing customers' intentions to make purchases, especially when they shop online and are unable to physically touch and feel brands and items (Lee and Lee, 2022). Marketers mitigate this limitation by strategically using influencers who showcase products and brands via detailed video reviews (vicarious expression) on social media platforms like YouTube, Instagram and Facebook. These platforms provide immersive, sensory-rich experiences that compensate for the lack of tactile engagement, enabling consumers to virtually experience the products (Peng *et al.*, 2024). Moreover, influencers' demonstrations often combine authenticity and relatability, creating strong trust and credibility among their audience (Breves *et al.*, 2021; Gvili and Levy, 2023). Simultaneously, the perceived impartiality of eWOM from fellow consumers further reinforces purchase decisions (Baykal and Hesapci Karaca, 2022; Yadav and Kar, 2025).

Nevertheless, consumers' perceived relationships with influencers can casually shape their interpretation of peer reviews, creating a feedback loop that amplifies the bandwagon effect (Anantharaman *et al.*, 2022; Nadroo *et al.*, 2024). Leveraging these dynamics, marketers can effectively bridge the gap between virtual and physical shopping experiences, ultimately pushing higher consumer engagement and promoting loyalty. This dual influence of vicarious expression and eWOM reflects their strategic significance in boosting online retail effectiveness. Thus, by leveraging the widespread accessibility of social media platforms, these mechanisms can effectively stimulate viewer engagement, enhancing the popularity of brands and products and ultimately stimulating the bandwagon effect. According to Chen (2024), YouTube's support for long-form video content makes it the most effective medium for increasing engagement and brand recall. By contrast, while Instagram also shows high levels of engagement, particularly with visual-centric content; however, it is more effective for quick and impactful consumer interactions (Sokolova and Kefi, 2020). Furthermore, YouTube influencers are perceived as credible sources of information, and their content significantly impacts consumer behaviour (Chen, 2024; Lee and Watkins, 2016; Lee and Lee, 2022; Penttinen *et al.*, 2022), thus making YouTube a uniquely effective medium for capitalising PSIs to generate the bandwagon effect through influencer-generated content.

The bandwagon effect has been previously studied as a driver of consumer trust, attitudes, corporate credibility and purchase intentions, particularly in contexts involving new-luxury goods (Anantharaman *et al.*, 2022; Cho *et al.*, 2022; Li *et al.*, 2020). However, scholarly attention has yet to fully unravel the mechanisms through which this phenomenon is systematically cultivated, particularly in digital environments where physical product interaction is absent (Li *et al.*, 2020). While prior research underscores the pivotal role of parasocial interactions in shaping consumer decisions, their specific influence on the bandwagon effect in online retail remains underexplored (Sheng *et al.*, 2025; Bindra *et al.*, 2022). This gap is compounded by a limited understanding of how vicarious expression experiences and eWOM jointly mediate consumer attitudes and herd behaviour, despite their theorised synergy in amplifying social influence. Addressing these shortcomings, this study aims to investigate how PSI with YouTube influencers catalyse the bandwagon effect in online retail, with a novel focus on the parallel mediating roles of vicarious expression and eWOM.

In the bargain, the research contributes to the expanding discussion by incorporating a gender-based multigroup analysis, revealing significant differences in how male and female consumers respond to PSIs, vicarious expression and eWOM. Again, this is important to demonstrate the wider generalisability of PSIs in driving consumer behaviour, which hence

requires demographic segmentation. This research develops an integrated framework to explain how influencers activate collective consumer endorsement of products or brands by examining the parallel mediation of vicarious expression and eWOM in the link between PSIs and the bandwagon effect. The study also identifies a special role of YouTube in narrowing the gap between physical and virtual shopping experiences. Framed within the parasocial relationship theory, this research seeks to answer the following questions:

- RQ1. How do parasocial interactions with YouTube influencers drive the bandwagon effect among consumers?
- RQ2. What is the mediating role of vicarious expression experiences and electronic word-of-mouth in the relationship between parasocial interactions and the bandwagon effect?
- RQ3. How do gender differences impact the relationships among parasocial interactions, vicarious expression experiences, eWOM, attitude and the bandwagon effect?

By addressing these questions, this study provides insights into how brands can leverage PSIs to boost product popularity and brand image. It also examines how PSIs on YouTube influence eWOM on social media platforms like Facebook, Instagram and X (previously named twitter), ultimately driving the bandwagon effect.

The paper's remaining sections are organised as follows. Section 2 presents the theoretical foundation through a critical literature review and outlines the hypotheses guiding this study. Section 3 details the materials and methods used, including the research design, data collection procedures and analytical frameworks. Section 4 subsequently reports the findings derived from data analysis, followed by Section 5, which offers a discussion of findings along with the theoretical and managerial implications. Finally, Section 6 concludes the study by synthesising key insights, acknowledging limitations and proposing directions for future research.

2. Literature review and hypothesis development

The bandwagon effect, a valuable psychological phenomenon for marketers, can be cultivated through a range of strategic efforts. This study examines the influence of various antecedents, including PSI, vicarious expression, eWOM and consumer attitudes, through the lens of parasocial relationship theory. This section explores the theoretical framework of parasocial relationship theory, its relevance to PSIs and its application in generating the bandwagon effect within the context of tech YouTubers. Moreover, it outlines the development of hypotheses based on this theoretical foundation.

2.1 Parasocial relationship theory

Parasocial relationship theory, introduced by [Horton and Richard Wohl \(1956\)](#), describes the one-sided relationships ([Chen, 2024](#); [Eastman and Iyer, 2023](#)) that media consumers form with performers like celebrities and influencers, perceiving them as intimate conversational partners despite the lack of real-life interaction ([Dibble et al., 2016](#)). This phenomenon, as a result of PSI, involves audiences engaging with media figures as if in a reciprocal relationship, even though the interaction is non-reciprocal ([Chen, 2024](#)). In the digital age, platforms like YouTube and Instagram have intensified these interactions ([Milaković and Ahmad, 2023](#)), allowing users to engage with media personalities similarly to how they interact with friends. This blurring of lines between social and parasocial activities is evident as individuals follow and engage with both personal acquaintances and influencers, fostering a sense of intimacy and connection ([Milaković and Ahmad, 2023](#)).

Parasocial relationship theory is significant in media psychology for two primary reasons. First, it elucidates why individuals form bonds with celebrities or fictional characters without real-life interactions, highlighting the human tendency to seek connections beyond immediate social circles (Lee and Lee, 2022; Agnihotri *et al.*, 2023). Second, it aids in predicting audience behaviour, media consumption patterns, fan engagement and brand loyalty, offering valuable insights for content creators and marketers (Zhang and Wang, 2024). Understanding parasocial relationships is crucial for comprehending how media influences perceptions and behaviors, especially as social media continues to integrate into daily life, enhancing the depth and frequency of these one-sided connections (Milaković and Ahmad, 2023).

The study relied on parasocial relationship theory over alternative frameworks like social influence theory (SIT) or uses and gratifications theory (UGT) (Katz *et al.*, 1973) due to its unique capacity to explain non-reciprocal, mediated bonds central to influencer-consumer dynamics (Davlembayeva *et al.*, 2025). While SIT emphasises peer-driven conformity (Agag *et al.*, 2024) and UGT focuses on audience motivations (Xu *et al.*, 2025), parasocial relationship theory specifically captures the illusion of intimacy cultivated through repeated, one-sided interactions with influencers – a critical mechanism in online contexts where herd behaviour is driven by perceived (rather than actual) relational closeness (Chen, 2024). By foregrounding the asymmetrical yet affectively charged nature of these relationships, parasocial relationship theory better elucidates how consumers vicariously adopt influencers' preferences as social cues, a nuance less central to SIT or UGT.

2.2 *The vicarious expression experiences (VE)*

Vicarious expression experiences refer to the emotional and perceptual engagement viewers experience when exposed to online content (Lee and Lee, 2022). It allows audiences to visualise products through detailed demonstrations and emotional cues provided by media personalities (Song *et al.*, 2024; Peng *et al.*, 2024). The vicarious experiences usually consist of “content diagnosed”, i.e. the evaluation of the product's attributes and suitability, and “vicarious expression”, i.e. the associated emotional experience reflected by the person while making the viewers visualise the product through online content (Song *et al.*, 2024). Tech YouTube influencers, with their engaging and informative content, provide detailed reviews of gadgets and electronics (Penttinen *et al.*, 2022), making them reliable sources for virtual product evaluations (Lee and Lee, 2022). Through PSIs, viewers not only gain technical insights but also emotionally engage with the influencer's expertise and persona, enriching their vicarious experiences (Honka *et al.*, 2024).

Prior research demonstrates that PSI fosters identification and emotional connection with media personalities, enabling audiences to experience events vicariously (Chung and Cho, 2017; Lee and Lee, 2022). Tech YouTubers enhance this process by combining informative content with visually appealing and emotionally resonant narratives, creating immersive vicarious expression experiences (Wang *et al.*, 2023; Zhang and Lee, 2023). As audiences feel a sense of familiarity and trust towards these influencers, they are more likely to internalise the emotions and perceptions conveyed in the content, such as excitement during unboxings or satisfaction during product demonstration (Zhang and Lee, 2023). As the sense of connection heightens viewers' engagement with the content and their emotional visualisation of the product, we propose the following hypothesis:

- H1. Parasocial interaction with tech YouTubers is expected to positively impact the vicarious expression experienced by viewers via YouTube content.

2.3 *Electronic word of mouth*

eWOM is a critical mechanism by which customers express their thoughts, experiences and recommendations about products and brands on social networking platforms (Tsai and Men, 2013). eWOM a digital exchange significantly influences viewers' attitudes, perceptions and motivations, fostering positive purchase intentions (Novak et al., 2000). Social networking-based eWOM amplifies brand engagement and loyalty, as influencers and online communities encourage advocacy for endorsed brands and products (Dibble et al., 2016). In the context of tech YouTubers, the content they share often inspires followers, who trust them due to PSI, to endorse the brands through their own social media platforms (Nadroo et al., 2024). This endorsement further strengthens the visibility of brands within local communities, creating a ripple effect of positive recommendations (Xu et al., 2020).

PSI with influencers can be central in driving eWOM by building trust and shaping consumer confidence in products and brands (Sokolova and Kefi, 2020; Xu et al., 2020). These interactions foster a sense of closeness, encouraging viewers to share their opinions and participate in discussions within social media circles, brand communities or among peers (Yoo et al., 2024; Tsai and Men, 2017). This dissemination of product information often leads to social conformity and emulation, further influencing consumer buying behaviours and preferences (Noor et al., 2022). The research underscores that parasocial bonds enhance the persuasiveness of eWOM, as viewers perceive recommendations from influencers as credible and relatable (Dibble et al., 2016; Nadroo et al., 2024); thus, a positive relationship between PSIs and eWOM can both contribute to the spread of brand advocacy and the bandwagon effect, as such the following hypothesis is proposed:

- H2. Parasocial interactions with tech YouTubers and SNS-based eWOM are positively related.

2.4 *Vicarious experiences, electronic word of mouth and consumer attitude*

Consumer attitudes are the emotional response or evaluation of a product, service or brand that significantly impact purchase decisions and behaviours (Novak et al., 2000; Kudeshia and Kumar, 2017). These attitudes are shaped by an individual's beliefs, feelings and behaviours and are critical drivers of consumer decision-making (Lee and Lee, 2022; Xu et al., 2020). Vicarious expression provides valuable opportunities for observational learning, reduces uncertainty and evokes emotional responses that significantly influence consumer attitudes (Sokolova and Kefi, 2020). When consumers feel personally connected to YouTubers, their perception of the influencer's content becomes more meaningful and relatable, strengthening their connection to the endorsed products (Rao et al., 2021).

Based on this, we propose the following hypothesis:

- H3. Vicarious expression experiences with YouTube tech influencers positively influence consumer attitudes.

2.5 *Vicarious experiences, electronic word of mouth and consumer attitude*

Consumer attitudes are the emotional response or evaluation of a product, service or brand that significantly impact purchase decisions and behaviours (Novak et al., 2000; Kudeshia and Kumar, 2017). These attitudes are shaped by an individual's beliefs, feelings and behaviours and are critical drivers of consumer decision-making (Lee and Lee, 2022; Xu et al., 2020). Vicarious expression provides valuable opportunities for observational learning, reduces uncertainty and evokes emotional responses that significantly influence

consumer attitudes (Sokolova and Kefi, 2020). When consumers feel personally connected to YouTubers, their perception of the influencer’s content becomes more meaningful and relatable, strengthening their connection to the endorsed products (Rao et al., 2021). Based on this, we propose the following hypothesis:

H3. Vicarious expression experiences with YouTube tech influencers positively influence consumer attitudes.

Similarly, empirical studies show that social networks-based eWOM significantly influences brand attitudes and purchase intentions, especially in the context of consumer electronics (Kudeshia and Kumar, 2017). Consumer engagement with eWOM can be both passive (e.g. reading product reviews) or active (e.g. creating and sharing product-related content) (Muntinga et al., 2011). Both types of engagement contribute to shaping consumer attitudes by enabling value co-creation, either directly through consumer–brand interactions or indirectly via consumer–consumer exchanges (France et al., 2015). Positive user-generated eWOM facilitates informed decision-making and fosters a bandwagon effect, where favourable opinions increase product visibility and desirability. Thus, the following hypotheses are proposed:

H4. eWOM positively influences attitudes towards consumer electronic gadgets.

H5a,b,c. Vicarious experiences, eWOM and consumer brand attitude on online purchase of consumer electronics positively generate the bandwagon effect.

H6a,b. Vicarious expression experiences and eWOM mediates the relationship between parasocial interaction and bandwagon effect.

This leads to the formation of the conceptual framework as follows (refer to Figure 1).

The next section discusses the research methodology adopted in this study as follows.

3. Materials and methods

3.1 Sample

This study adopted a cross-sectional survey design conducted offline with the assistance of three trained enumerators to ensure close monitoring of respondents’ behaviour. Data were collected using a non-probability purposive sampling technique, targeting participants from India who met the following criteria:

- Individuals who follow a tech influencer with whom they have a parasocial relationship on both YouTube and another social media platform.
- Individuals who follow at least one “consumer electronics brand fan page” on platforms such as Instagram, Facebook, X (formerly Twitter) or other social media platforms.

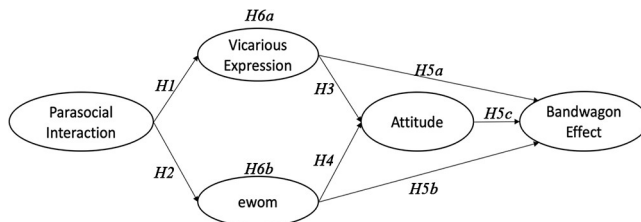


Figure 1. A proposed conceptual model

These criteria were based on prior research (e.g. [Lee and Lee, 2022](#)).

The sample size was determined using the 1:10 rule recommended by [Hair et al. \(2019\)](#), which suggests a minimum of ten participants per observed indicator. The research model for this study included 25 observed indicators across six latent constructs, necessitating a minimum sample size of 250 participants. This also satisfies the minimum threshold of 200 participants as recommended by [Kline \(2023\)](#). To ensure adequate representation, 600 questionnaires were distributed, of which 488 were deemed usable for the final analysis.

3.1.1 Participant profile. The participants comprised 266 males, 219 females and three respondents belonging to other genders. Most respondents fell within the age groups of 20–25 years ($n = 356$) and 26–41 years ($n = 128$), while three participants were between 42 and 57 years, and only one participant was in the 58 years and above age bracket ([Table 1](#)). All the participants were academically qualified, with 143 being undergraduate, 65 graduate and 187 having postgraduate degrees, while 93 participants reported having “other” education qualifications. The monthly household income reported was less than 30,000 in 127 participants, INR 30,000–INR 49,999 by 113, INR 50,000–INR 1,00,000 by 151 and above INR 1,00,000 by 97 participants (US\$1 = 86 INR) as of 2025.

3.2 Common method bias

To assess common method bias (CMB), the single-factor test proposed by [Harman \(1976\)](#) was used for the assumed relationships in the model. Principal axis factoring was used to obtain the initial factor without rotation. However, only 39.9% of the variance in the data as a whole, which is less than half, was explained by the first factor. Thus, no universal factor was evident, and no indication of CMB was found ([Kastanakis and Balabanis, 2014](#); [Lee and Lee, 2022](#)). Our analysis was further strengthened against CMB by doing a thorough collinearity test. To achieve this, a dependent variable made out of random integers was regressed against every other variable in the conceptual model. All of the variance inflation factors (VIFs) ([Table 2](#)) in the inner model did not surpass the crucial value of 3.3 ([Kock, 2015](#)). As such, no significant issue with common method variance was noted in this study ([Kastanakis and Balabanis, 2014](#); [Lee and Lee, 2022](#)).

3.3 Measurement development

A structured questionnaire as a measurement tool was used in this study, and it was designed in two parts. Participants’ age, gender and income were among the demographic details requested in the first part. At the same time, the second part of the questionnaire addressed the constructs of the study ([Kastanakis and Balabanis, 2014](#); [Lee and Lee, 2022](#)). Opening questions included: Do you watch YouTube? Do you subscribe to any tech YouTuber’s

Table 1. Demographics of the participants ($n = 488$)

| Demographic variable | Category | No. (%) | Demographic variable | Category | No. (%) |
|----------------------|-------------|-------------|--------------------------------|-----------------|-------------|
| Gender | Male | 266 (54.50) | Education level | Undergraduate | 143 (29.30) |
| | Female | 219 (44.87) | | Graduate | 65 (13.31) |
| | Other | 3 (0.61) | | Postgraduate | 187 (38.31) |
| Age group | 20–25 years | 356 (72.7) | Monthly household income (INR) | Other | 93 (19.05) |
| | 26–41 years | 128 (26.1) | | <30,000 | 127 (26.02) |
| | 42–57 years | 3 (0.61) | | 30,000–49,999 | 113 (23.15) |
| | 58+ years | 1 (0.20) | | 50,000–1,00,000 | 151 (30.94) |
| | | | >1,00,000 | 97 (19.87) | |

Table 2. Reliability and validity test for the multigroup data; consisting of overall, male and female data

| Measurement item description | Factor loadings | | | VIF |
|--|-----------------|-------|--------|---------|
| | Overall | Male | Female | Overall |
| <i>Para social interaction (PSI) – adapted from Lee and Watkins (2016) Overall $\alpha = 0.769$; CR = 0.852; AVE = 0.590; Male $\alpha = 0.803$; CR = 0.863; AVE = 0.560; Female $\alpha = 0.768$; CR = 0.842; AVE = 0.519</i> | | | | |
| I look forward to watching the product review videos of YouTube influencers | 0.715 | 0.785 | 0.620 | 1.360 |
| I feel as if I am part of influencer's group | 0.643 | 0.626 | 0.670 | 1.369 |
| I think the influencer is trustworthy | 0.738 | 0.759 | 0.704 | 1.561 |
| The influencer helps me to decide what to buy as if I am his/her friend | 0.784 | 0.785 | 0.780 | 1.802 |
| When the influencer shows me how he/she feels about a brand, it helps me make up my mind | 0.790 | 0.776 | 0.810 | 1.650 |
| <i>Vicarious expression – adapted from Li et al. (2013) Overall $\alpha = 0.817$; CR = 0.880; AVE = 0.648; Male $\alpha = 0.834$; CR = 0.889; AVE = 0.669; Female $\alpha = 0.804$; CR = 0.870; AVE = 0.628</i> | | | | |
| Using YouTube review videos, I can feel the YouTuber's user experience with the product | 0.738 | 0.772 | 0.734 | 1.373 |
| The contents of the YouTube review videos help me in evaluating the product | 0.874 | 0.879 | 0.862 | 2.396 |
| in understanding the performance of the product | 0.852 | 0.866 | 0.825 | 2.441 |
| in familiarising myself with the products | 0.745 | 0.746 | 0.739 | 1.665 |
| <i>Bandwagon effect – adapted from Anantharaman et al. (2022) Overall $\alpha = 0.739$; CR = 0.836; AVE = 0.561; Male $\alpha = 0.722$; CR = 0.826; AVE = 0.544; Female $\alpha = 0.756$; CR = 0.846; AVE = 0.580</i> | | | | |
| The following parameters are undertaken by me, when I get exposed with detailed product information | | | | |
| I rate the products on SNS (i.e. rating size/stars) | 0.798 | 0.795 | 0.803 | 2.019 |
| I reviews the products on SNS (i.e. review size) | 0.757 | 0.727 | 0.782 | 1.974 |
| I indulge in commenting and liking of a product on social media brand fan pages | 0.755 | 0.711 | 0.800 | 1.394 |
| Disseminate the product information through personal channels | 0.683 | 0.713 | 0.653 | 1.218 |
| <i>Attitude – adapted from Ajzen (2002) Overall $\alpha = 0.879$; CR = 0.914; AVE = 0.728; Male $\alpha = 0.873$; CR = 0.911; AVE = 0.719; Female $\alpha = 0.887$; CR = 0.920; AVE = 0.742</i> | | | | |
| Buying electronic gadgets on the online marketplace (Flipkart/Amazon, etc.) would be | | | | |
| Bad idea – good idea | 0.887 | 0.870 | 0.899 | 2.225 |
| Disliked – liked | 0.892 | 0.862 | 0.895 | 2.484 |
| Worthless – valuable | 0.845 | 0.869 | 0.837 | 2.482 |
| Unenjoyable – enjoyable | 0.785 | 0.788 | 0.812 | 2.055 |
| <i>Electronic word of mouth (eWOM) – adapted from Carroll and Ahuvia (2006) Overall $\alpha = 0.889$; CR = 0.923; AVE = 0.751; Male $\alpha = 0.884$; CR = 0.920; AVE = 0.741; Female $\alpha = 0.896$; CR = 0.928; AVE = 0.762</i> | | | | |
| I recommend the virtually experienced products to lots of people | 0.870 | 0.871 | 0.864 | 2.463 |
| I usually “talk up” about virtually experienced brand to my friends | 0.874 | 0.872 | 0.884 | 2.338 |
| I try to spread the good-word about the virtually experienced products that I like | 0.867 | 0.867 | 0.866 | 2.451 |
| I give virtually experienced brand tons of positive word-of-mouth advertising | 0.855 | 0.833 | 0.879 | 2.277 |

channel?. The five items for parasocial interactions were adapted from Lee and Watkins (2016), four items for vicarious experiences were adapted from Li et al. (2013), the four items for the bandwagon effect scale were adapted from Anantharaman et al. (2022), the four-item of eWOM were adapted from Carroll and Ahuvia (2006) and four-item attitude scale was adapted from Ajzen (2002) (Table 2).

4. Data analysis and results

The relationships between the constructs in the hypothetical model were analysed using partial least squares structural equation modelling (PLS-SEM). It is important to know that, in contrast to covariance-based (CB) SEM, PLS-SEM is well-suited for complex model analysis and provides strong predictive capabilities. It is also appropriate for complex models with a large number of constructs and does not impose strict requirements for data to follow a

normal distribution (Hair *et al.*, 2019; Li *et al.*, 2013). These factors led us to use PLS-SEM. Furthermore, because of its flexibility in testing across groups, PLS-SEM was required for the multigroup analysis (MGA) to compare results across male and female participants (Ringle *et al.*, 2015).

Using SmartPLS V4, the analysis was conducted in two stages: The measurement model's reliability and validity were initially reviewed, followed by an assessment of the structural model to test the research hypotheses. Construct validity for the measurement model was examined through tests of convergent and discriminant validity (Hair *et al.*, 2019). For convergent validity, three criteria were evaluated:

- (1) outer loadings should be equal to or exceed 0.7;
- (2) the average variance extracted (AVE) for each construct should be 0.5 or higher; and
- (3) composite reliability (CR) should meet or exceed a threshold of 0.7.

Discriminant validity was assessed using the heterotrait-monotrait (HTMT) ratio (Table 4), where values below 0.85 indicate sufficient discriminant validity (Henseler *et al.*, 2016). This rigorous analytical approach ensured both the robustness of the measurement model and the validity of the structural model, providing a strong foundation for hypothesis testing.

4.1 Measurement model assessment

The robust measurement model was used in this study, as suggested by the psychometric properties. Specifically, Cronbach's α (0.722–0.875) and composite reliability (0.826–0.920) exceeded the minimal threshold of 0.70. The AVE (0.544–0.741) was above the threshold of 0.5 (Hair *et al.*, 2019), reflecting a strong internal consistency and convergent validity (Table 2). The loadings (0.683–0.892) exceed the minimum requirement of 0.50, and VIF (1.218–2.559) values were below the recommended maximum of 3 (Table 2), showcasing convergent validity and absence of multicollinearity (Hair *et al.*, 2019). Moreover, the square root of AVE for each construct is higher than the other corresponding inter-construct correlations (Table 3), while HTMT ratios were also found to be lower than 0.90 (Table 4), providing evidence of discriminant validity (Podsakoff and Organ, 1986).

4.2 Structural model

The required statistics to test the hypothesis are provided by the structural model (Table 5); for the complete overall sample, the study findings indicate PSI positively impacts vicarious expression ($b = 0.625, p < 0.000$) and eWOM ($b = 0.338, p < 0.000$), thus supporting *H1* and *H2*, respectively. Similarly, vicarious expression experiences are found to influence both attitudes ($b = 0.182, p < 0.000$) and the bandwagon effect ($b = 0.347, p < 0.000$) positively, supporting *H3* and *H5a*, respectively. eWOM facilitates the

Table 3. Discriminant validity: Fornell–Larcker criterion

| | Male | | | | | Female | | | | | Overall | | | | |
|------|-------|-------|-------|-------|-------|--------|-------|-------|-------|-------|---------|-------|-------|-------|-------|
| | AT | BWE | PSI | VE | eWOM | AT | BWE | PSI | VE | eWOM | AT | BWE | PSI | VE | eWOM |
| AT | 0.848 | | | | | 0.861 | | | | | 0.853 | | | | |
| BWE | 0.232 | 0.737 | | | | 0.153 | 0.762 | | | | 0.185 | 0.749 | | | |
| PSI | 0.121 | 0.339 | 0.748 | | | 0.248 | 0.341 | 0.720 | | | 0.183 | 0.333 | 0.768 | | |
| VE | 0.188 | 0.382 | 0.641 | 0.818 | | 0.191 | 0.482 | 0.613 | 0.792 | | 0.196 | 0.41 | 0.638 | 0.805 | |
| eWOM | 0.180 | 0.228 | 0.354 | 0.372 | 0.861 | 0.015 | 0.296 | 0.324 | 0.305 | 0.873 | 0.103 | 0.255 | 0.326 | 0.339 | 0.866 |

Table 4. The HTMT matrix

| | AT | BWE | PSI | VE | EWOM |
|------|-------|-------|-------|-------|------|
| AT | | | | | |
| BWE | 0.212 | | | | |
| PSI | 0.212 | 0.429 | | | |
| VE | 0.216 | 0.519 | 0.783 | | |
| EWOM | 0.113 | 0.307 | 0.389 | 0.389 | |

bandwagon effect ($b = 0.127, p < 0$), supporting *H5b*. However, eWOM does not significantly influence attitudes towards consumer electronic gadgets ($b = 0.042, p < 0.201$), indicating that *H4* is not supported. Finally, the findings show that attitude positively impacts the bandwagon effect ($b = 0.105, p < 0.012$), providing support for *H5c* (Table 5).

When comparing gender groups with the overall sample, the results reveal notable differences. For the male group, eWOM significantly influences attitude ($b = 0.126, p < 0.04$), supporting *H4*, but does not facilitate the bandwagon effect ($b = 0.079, p < 0.109$), suggesting *H5b* is not supported. By contrast, for the female group, attitude does not significantly impact the bandwagon effect ($b = 0.074, p < 0.132$), indicating that *H5c* is not supported. These findings highlight gender-specific relationship variations compared to the overall mixed sample results.

4.3 Mediation analysis

Mediation analysis was conducted to examine the direct and indirect effects of PSIs on the bandwagon effect. The analysis used a bootstrapping procedure with 5,000 samples (Hair et al., 2019). The mediation outcomes were evaluated based on the criteria proposed by Zhao et al. (2010), determining whether the mediation is full, partial or absent. The results, summarised in Table 6, investigated the mediating roles of eWOM and vicarious expression in the relationship between PSI and the bandwagon effect. The results demonstrate that both vicarious expression experiences ($\beta = 0.191, p < 0.01$) and eWOM ($\beta = 0.039, p < 0.05$) parallelly and fully mediate the relationship between PSIs and the bandwagon effect. The confidence intervals for the indirect effects did not cross zero, confirming the statistical significance of the mediating pathways. Thus, the mediators collectively play a critical role in the PSIs on the bandwagon effect.

4.4 Multigroup analysis

MGA was conducted in two phases, following the recommendations of Picón-Berjoyo et al. (2016) and Henseler et al. (2016). The first phase involved the calculation of invariances through the MICOM procedure, which ensures that any observed differences arise from the moderating variable (in this case, gender) rather than discrepancies in the measurement models of the groups. The second phase comprised the PLS-MGA, which assessed the moderating effect of gender on the structural relationships within the model. Table 7 summarises the results of the measurement model assessment for the male ($n = 266$) and female ($n = 219$) data sets.

The MICOM procedure followed a systematic three-step approach to assess measurement invariance. In the first step, configural invariance was established, confirming that constructs were equally parameterised and estimated across the male and female groups, as outlined by Henseler et al. (2016). The second step assessed compositional invariance by verifying that composite scores between the groups were perfectly correlated. With p -values exceeding 0.05 for all constructs, this step demonstrated the comparability of the measurement models

Table 5. Hypothesis testing

| Hypothesis | Relationship | Male | | | Female | | | Overall | | | | | |
|------------|--------------|-------|--------------|----------|---------------|-------|--------------|----------|---------------|-------|--------------|----------|---------------|
| | | Beta | T-statistics | p-values | Decision | Beta | T-statistics | p-values | Decision | Beta | T-statistics | p-values | Decision |
| H1 | PSI → VE | 0.641 | 14.835 | 0.000 | Supported | 0.613 | 13.505 | 0.000 | Supported | 0.625 | 19.205 | 0.000 | Supported |
| H2 | PSI → eWOM | 0.354 | 5.502 | 0.000 | Supported | 0.324 | 4.482 | 0.000 | Supported | 0.338 | 7.008 | 0.000 | Supported |
| H3 | VE → AT | 0.143 | 1.868 | 0.031 | Supported | 0.206 | 2.623 | 0.004 | Supported | 0.182 | 3.368 | 0.000 | Supported |
| H4 | eWOM → AT | 0.126 | 1.755 | 0.04 | Supported | -0.05 | 0.631 | 0.264 | Not supported | 0.042 | 0.839 | 0.201 | Not supported |
| H5a | VE → BWE | 0.322 | 5.056 | 0.000 | Supported | 0.419 | 6.476 | 0.000 | Supported | 0.347 | 7.553 | 0.000 | Supported |
| H5b | eWOM → BWE | 0.079 | 1.233 | 0.109 | Not supported | 0.164 | 2.25 | 0.012 | Supported | 0.125 | 2.668 | 0.004 | Supported |
| H5c | AT → BWE | 0.162 | 2.497 | 0.006 | Supported | 0.074 | 1.117 | 0.132 | Not supported | 0.105 | 2.249 | 0.012 | Supported |

Table 6. Mediation analysis

| Paths | Direct effect | Significance | | | Confidence intervals | | Effect size <i>f</i> ² | Outcome | Decision |
|-------------------|---------------|-----------------|--------------|-------|----------------------|-------|--------------------------------------|-----------|----------|
| | | Indirect effect | Total effect | 5% LL | 95% UL | | | | |
| PSI → VE → BWE | <i>0.138</i> | 0.191** | 0.324*** | 0.125 | 0.259 | 0.004 | Fully mediated | Supported | |
| PSI → ePWOM → BWE | <i>0.138</i> | 0.039* | 0.324*** | 0.011 | 0.069 | 0.004 | Fully mediated | Supported | |

Note(s): ***p* < 0.01; **p* < 0.05; LL = Lower level; UL = Upper level; Italic = insignificant

Table 7. Measurement invariance assessment (MICOM)

| | Step 2 | | | | Step 3a(Mean) | | | | | Step 3b(Variance) | | | | |
|------|--------|-------|-------|-----------------|---------------|--------|--------|--------|-----------------|-------------------|--------|--------|--------|-----------------|
| | OD | CPM | 5.00% | <i>p</i> -value | OD | PMD | 5.00% | 95.00% | <i>p</i> -value | OD | PMD | 5.00% | 95.00% | <i>p</i> -value |
| ATT | 0.999 | 0.990 | 0.972 | 0.903 | 0.073 | -0.003 | -0.158 | 0.143 | 0.202 | -0.059 | 0.005 | -0.194 | 0.199 | 0.299 |
| BWE | 1.000 | 0.993 | 0.981 | 0.962 | 0.030 | 0.003 | -0.159 | 0.162 | 0.393 | -0.143 | -0.009 | -0.252 | 0.250 | 0.189 |
| PSI | 0.998 | 0.998 | 0.996 | 0.318 | 0.038 | -0.001 | -0.156 | 0.142 | 0.339 | 0.142 | -0.004 | -0.199 | 0.191 | 0.108 |
| VE | 0.999 | 0.999 | 0.997 | 0.422 | -0.097 | 0.001 | -0.153 | 0.146 | 0.150 | 0.237 | 0.002 | -0.232 | 0.258 | 0.064 |
| eWOM | 0.999 | 0.999 | 0.997 | 0.580 | 0.009 | -0.001 | -0.148 | 0.144 | 0.448 | 0.051 | 0.000 | -0.213 | 0.221 | 0.346 |

Note(s): OD = Original correlation, CPM = Correlation permutation mean, PMD = Permutation mean difference

for the two groups. In the third step, the equality of composite means and variances was evaluated through permutation-based confidence intervals. This step revealed whether the composite means and variances differed significantly between the groups, determining whether partial or total invariance had been achieved. The results confirmed that full measurement invariance was established, a critical prerequisite for conducting the MGA.

Following the completion of the MICOM procedure, the second phase of the analysis was carried out using the bootstrap MGA option in SmartPLS. Path coefficients (β) were estimated, and the differences between these coefficients were analysed. The results revealed a statistically significant difference in the relationship between eWOM and attitude (β *diff* = 0.172, *p* = 0.048). However, apart from this exception, the analysis demonstrated no statistically significant differences between the male and female groups, indicating a general consistency in the structural relationships across genders. These findings suggest that, overall, the relationships between constructs are comparable for both male and female participants, as summarised in Table 8.

The analysis highlights the potential gender-specific effects within the model, offering valuable insights into how eWOM impacts attitudes differently among males and females in online shopping of consumer electronic gadgets. This analysis highlights that eWOM is more persuasive for females than males, offering managers insights to use specific promotional strategies to attract female consumers to shop online. The results revealed a difference between the male and female participants regarding the role of PSIs in generating the bandwagon effect.

5. Discussion of the findings

The bandwagon effect is a vital strategic goal for brands seeking to enhance visibility, build identity and increase consumer acceptance. This study focuses on how PSIs between

Table 8. Multigroup analysis

| Relationships | Difference (male–female) | p-value |
|---------------|--------------------------|---------|
| AT → BWE | 0.088 | 0.172 |
| PSI → VE | 0.028 | 0.328 |
| PSI → eWOM | 0.030 | 0.379 |
| VE → AT | -0.063 | 0.281 |
| VE → BWE | -0.097 | 0.142 |
| eWOM → AT | 0.172 | 0.048* |
| eWOM → BWE | -0.086 | 0.188 |

Note(s): *The differences are significant in the relationships between the two genders ($p < 0.05$)

consumers and social media influencers can be harnessed to drive the bandwagon effect. The findings demonstrate that PSI significantly enhances both vicarious expression and eWOM, positioning it as a central mechanism in shaping consumer engagement and trend adoption.

PSI contributes to more persuasive virtual product experiences by simulating “touch and feel” through vivid demonstrations and personal narratives (Chen *et al.*, 2019). This emotional connection fosters trust, encouraging consumers to rely on influencer-led content for product evaluation (vicarious expression) and to share their opinions and endorsements with others via eWOM. In high-involvement, information-rich categories like consumer electronics, vicarious expression often outweighs peer commentary in shaping attitudes. For instance, YouTubers address the lack of physical interaction in online shopping by offering relatable narratives and demonstrations via vicarious expression experiences, which enhance the perceived value and credibility of their recommendations. Thus, this, in turn, encourages consumers to adopt and advocate for these products using eWOM, therefore amplifying the bandwagon effect (Penttinen *et al.*, 2022; Moisesescu *et al.*, 2022).

Interestingly, while eWOM enhances awareness and facilitates engagement, it did not significantly influence attitudes towards tech gadgets in the overall model. This outcome may stem from credibility concerns or the oversaturation of influencer-generated content, which can dilute its persuasive impact. In categories like consumer electronics, which have technical features and require expert opinions, users may place greater trust in vicarious experiences and detailed product demonstrations rather than peer opinions. This finding underscores the limited attitudinal influence of eWOM in information-intensive decision-making contexts, even though it remains effective in enhancing awareness and engagement (Sokolova and Kefi, 2020; Dibble *et al.*, 2016). Conversely, vicarious expression had a more substantial impact on attitudes, suggesting that emotionally resonant demonstrations are more influential than peer opinions in these product categories.

This study also reveals a parallel mediation of vicarious expression and eWOM in the relationship between PSI and the bandwagon effect. Vicarious expression enhances consumers’ emotional resonance with the product (Sokolova and Perez, 2021) by simplifying complex information and simulating real-world usage, particularly in scenarios where direct product interaction is unavailable (Jin and Ryu, 2020), particularly in the case of online retailing. These experiences align consumers with emerging trends, shape attitude formation and foster decision-making. Tech YouTubers, in particular, excel at simplifying complex product attributes through relatable narratives, positioning their content as a key driver of consumer engagement. Meanwhile, eWOM supports social proof through peer validation and shared endorsements. Together, they form a dual pathway that strengthens

consumer alignment with emerging trends and increases the likelihood of product adoption and advocacy, leading to a bandwagon effect (Penttinen *et al.*, 2022; Moisescu *et al.*, 2022).

The combined influence of PSI, vicarious expression and eWOM creates a synergistic ecosystem where influencers and consumers collectively endorse products that enhance brand interaction and accelerate the diffusion of brand messages, thus further reinforcing the bandwagon effect. Influencers – especially tech YouTubers – play a pivotal role in directing traffic to brand-specific platforms, amplifying the scope and speed of brand awareness across digital environments (Sokolova and Perez, 2021). Gender dynamics further enrich this narrative. MGA revealed significant differences in the relationship between eWOM and attitude, with females exhibiting a stronger attitudinal response to eWOM. This suggests that female consumers may be more responsive to socially driven cues and peer validation, whereas males might prioritise fact-based demonstrations offered through vicarious expression. These insights underline the importance of tailoring influencer marketing strategies to gender-specific processing styles, particularly in tech-driven domains where product complexity and digital engagement are high.

6. Theoretical implications

This study contributes to theory by using parasocial relationship theory to explore how PSIs with influencers can generate the bandwagon effect, particularly in social media contexts like YouTube. It distinguishes PSI from long-term parasocial relationships and socio-emotional ties, which have often been conflated in previous research. By doing so, the study offers a clearer understanding of how parasocial relationships with influencers impact consumer behaviour, especially in the online retail sector (Liao *et al.*, 2024; Nadroo *et al.*, 2024). This framework provides valuable insights for researchers in online retail and consumer studies to explore how PSIs and parasocial relationships lead to brand popularity by generating a bandwagon effect. These findings can enrich marketing strategies that leverage parasocial relationships to enhance consumer engagement and adoption, which is crucial in an environment where consumers cannot physically interact with products before purchase (Milaković and Ahmad, 2023; Honka *et al.*, 2024).

The study underscores emerging research areas, such as understanding consumer virtual buying decision-making (Hsieh, 2023). The findings demonstrate that vicarious expression positively influences consumer attitudes (Moisescu *et al.*, 2022). As a result, consumers are more likely to engage in social networking activities and remain loyal to online retailers after experiencing the shopping process vicariously through parasocial relationships. This heightened engagement and loyalty can amplify the bandwagon effect, driving increased product and brand recommendations via eWOM (Moisescu *et al.*, 2022). PSI fosters trust and credibility, encouraging consumers to share positive experiences about products or brands. This enhanced eWOM further strengthens the bandwagon effect, as consumers are more inclined to endorse products recommended by influencers they perceive as relatable and authentic. Such a strategy is particularly advantageous for new brands entering the market through business-to-consumer online retail channels, as it helps overcome initial challenges related to customer trust and brand recognition. Additionally, the study contributes to the theory by revealing the full parallel mediation of vicarious expression and eWOM between PSI and the bandwagon effect. Furthermore, the MGA comparing male and female consumers offers additional insights, enriching the literature on this subject.

7. Managerial implications

This study underscores the strategic potential of leveraging PSI to enhance brand popularity, especially through tech YouTubers and social media influencers. By recognising the dual role

of PSI in facilitating vicarious expression and eWOM, managers can amplify the bandwagon effect, creating customer hype and driving increased demand. PSI not only makes virtual product experiences more impactful but also motivates the audience to engage in eWOM, encouraging further brand discussions within social networks. This creates a self-sustaining cycle that propels consumers closer to making a purchase decision.

Managers should prioritise collaborating with influencers who can authentically demonstrate both the tangible and intangible aspects of their products. These partnerships not only enhance product visibility but also align brands with influencers who have cultivated genuine trust with their audience, thus strengthening the brand's credibility. In the online retail environment, where consumers lack the ability to physically interact with products, leveraging PSI to provide vicarious product experiences helps build stronger brand identities, reduces return rates and mitigates logistical losses. Consumers who experience products virtually are more likely to make informed purchase decisions, ultimately reducing returns and improving profitability (Jena, 2023).

Moreover, advertisers should acknowledge that PSI provides a more objective and measurable indicator of influence than traditional celebrity endorsements. High-PSI influencers offer stronger emotional connections with their audience, motivating them to share their experiences through eWOM, thereby amplifying the bandwagon effect. By aligning with influencers who cultivate authentic relationships, brands can tap into highly engaged communities, driving sustained consumer engagement and loyalty while also reducing operational inefficiencies.

8. Conclusion, limitations and future research direction

The study highlights how brands can strategically leverage PSIs between viewers and YouTube-based tech influencers to cultivate the bandwagon effect. Drawing on parasocial relationship theory, it demonstrates how endorsements by tech influencers can shape consumer attitudes towards specific product categories, thereby boosting product and brand popularity (Fu and Sim, 2011). The research also underscores the role of PSI-driven engagement in enhancing the effectiveness of eWOM and vicarious expression. These elements fully and parallelly mediate the PSI and the bandwagon effect relationship. By driving traffic to platforms like Instagram, Facebook and X (formerly Twitter), PSIs not only strengthen brand identification but also expand communication reach. They encourage consumers to share company-generated content, thereby further amplifying the bandwagon effect (Dibble *et al.*, 2016). Table 9 provides a concise overview of the study's conclusions as well as its theoretical and managerial implications.

Despite its novel contributions, the study acknowledges several limitations that open avenues for future research. The reliance on a survey-based methodology restricts causal interpretations; adopting experimental designs in future studies could validate and expand upon these findings (Rao *et al.*, 2021). Moreover, the potential self-selection bias, as individuals highly engaged with tech influencers may already exhibit a stronger predisposition to the bandwagon effect, should be acknowledged. Future studies could use randomised sampling or control for prior engagement levels to mitigate this limitation. Furthermore, while eWOM played a significant role, it did not consistently lead to positive attitudes towards certain product categories, suggesting the need for refined strategies to enhance its impact (Rao *et al.*, 2021). Future research could explore moderating variables, such as the role of advertising recognition, in strengthening the link between PSIs and the bandwagon effect. Additionally, investigating these dynamics within the contexts of luxury fashion or virtual influencers presents opportunities to deepen understanding in less-explored areas.

Table 9. Conclusions and theoretical and managerial implications

| Key conclusions | Theoretical and managerial implications |
|--|--|
| PSI significantly enhances both vicarious expression and eWOM, which act as primary mechanisms in triggering the bandwagon effect | The research contributes to parasocial relationship theory by distinguishing PSI from long-term parasocial relationships and socio-emotional ties, clarifying its role in online consumer behaviour The study provides an integrated framework for how influencers activate collective consumer endorsement, aiding future research in influencer marketing and online retail |
| Vicarious expression experiences positively influence consumer attitudes, making influencer-driven product demonstrations more persuasive Vicarious expression and eWOM fully and parallelly mediate the relationship between PSI and the bandwagon effect, strengthening consumer engagement Gender differences significantly impact how PSIs influence vicarious expression, with female audiences being particularly responsive to this relationship, highlighting opportunities for gender-specific marketing strategies The synergy between PSI, vicarious expression and eWOM fosters the bandwagon effect, driving widespread consumer endorsement | The study enriches literature by conducting multigroup analysis to highlight gender-based differences in PSI-driven consumer engagement Brands should collaborate with high-PSI influencers to enhance brand credibility and leverage authentic engagement to drive consumer behaviour Online retailers can use PSI-driven product demonstrations to improve consumer confidence, reducing return rates and logistical losses Cross-platform strategies can enhance brand reach, encouraging consumers to share company-generated content, thereby amplifying brand recognition |

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