E-ISSN: 2987-9329 P-ISSN: 2987-9337

➡https://review.e-siber.org/SIJDB

➡ siberpublisher.info@gmail.com

➡ +62 812-1046-7572

DOI: https://doi.org/10.38035/sijdb.v2i4 https://creativecommons.org/licenses/by/4.0/

Mapping Trend of Digital Marketing Shapes Consumer Behaviour Across Indonesia: A Literature Review and Integration of Artificial Intelligence on Research Design for Future Research

Hermansyah¹, Doni Sugianto Sihotang², Ridho Rafqi Ilhamilimy³, Mohamad Rizan⁴, Setyo Ferry Wibowo⁵

¹Universitas Negeri Jakarta, Jakarta, Indonesia, hermansyah@mhs.unj.ac.id

Corresponding Author: doni.sugianto.sihotang@mhs.unj.ac.id²

Abstract: This study presents a systematic literature review that maps the development of digital marketing research and its influence on consumer behavior across Indonesia, with an emphasis on the integration of Artificial Intelligence (AI) in future research design. Using content analysis on 60 journal articles published between 2012 and 2025, the study identifies five dominant variables—purchase decision, social media marketing, influencer marketing, brand trust, and brand image—alongside prevailing analytical methods, including Structural Equation Modeling (SEM) and Multiple Linear Regression. Bibliometric mapping through VOSviewer reveals clusters of thematic focus such as consumer engagement, digital branding, and e-commerce localization. The study also highlights trending topics over time, showing a shift from traditional marketing elements to AI-enhanced strategies. Furthermore, this paper proposes a conceptual framework linking AI applications with social media marketing, influencer marketing, and brand trust to guide future empirical studies. Findings underscore the growing academic and practical relevance of AI in digital marketing, and offer a foundation for predictive, data-driven approaches to understanding Indonesian consumer behavior.

Keywords: Systematic Literature Review, Brand Trust, Digital Marketing, Consumer Behaviuor, Artificial Intelligence

INTRODUCTION

The rapid evolution of Artificial Intelligence (AI) has significantly transformed digital marketing, reshaping strategies through automation, personalization, and data-driven decision-making (Ziakis & Vlachopoulou, 2023). AI-powered technologies enable businesses to analyze vast consumer data, optimizing marketing campaigns with precision and efficiency (Saleh & Zeebaree, 2025). One of the most crucial aspects of AI in digital marketing is

²Universitas Negeri Jakarta, Jakarta, Indonesia, <u>doni.sugianto.sihotang@mhs.unj.ac.id</u>

³Universitas Negeri Jakarta, Jakarta, Indonesia, <u>ridho.rafqi@mhs.unj.ac.id</u>

⁴Universitas Negeri Jakarta, Jakarta, Indonesia, mohamadrizan72@unj.ac.id

⁵Universitas Negeri Jakarta, Jakarta, Indonesia, setyoferry@unj.ac.id

itsability to enhance customer segmentation and predictive analytics, allowing brands to tailor their marketing strategies according to consumer preferences (Gökerik & Aktaş, 2024). Furthermore, AI-driven automation reduces manual efforts in content creation and campaign management, improving overall marketing effectiveness and user experience (Efendioğlu, 2023).

AI has also played a transformative role in social media marketing and influencer marketing, where it enhances customer engagement and refines brand strategies. AI-based sentiment analysis allows businesses to assess consumer feedback, leading to more targeted and effective marketing approaches (Kharis et al., 2024). The rise of AI-generated influencers further revolutionizes influencer marketing by providing brands with reliable and controlled promotional tools that enhance brand authenticity (Fu et al., 2023). However, ethical considerations regarding AI implementation, such as data privacy and algorithmic biases, remain critical challenges that businesses must address to maintain trust in AI-driven marketing (Gökerik & Aktaş, 2024).

Brand trust is another essential component influenced by AI in digital marketing. AI-powered virtual assistants and recommendation systems improve brand-consumer interactions, fostering stronger relationships through personalized experiences and seamless interactions (Pillarisetty & Mishra, 2022). Consumers, particularly younger generations, are increasingly inclined to trust AI-driven recommendations, leading to higher engagement and purchase intentions (Guerra-Tamez et al., 2024). However, concerns related to AI transparency and privacy require businesses to ensure responsible AI usage, emphasizing security and ethical data management (Sun et al., 2022). Despite these challenges, AI continues to play a pivotal role in shaping digital branding and consumer behavior.

This study aims to achieve two main objectives: (1) Using content analysis on several digital marketing journals, this research collects information about key factors influencing consumer behavior in digital marketing; and (2) Identifying how consumer buying behavior is influenced by AI integration in digital marketing and how this supports better marketing decisions. Unlike previous studies that primarily focus on evaluating consumer behavior in AI-driven marketing, this research extends its scope by proposing a new research design for future studies. This approach ensures a more comprehensive understanding of AI's impact on digital marketing and provides a framework for further academic exploration and practical implementation.

METHODS

Research design

This study used was a systematic analysis of the literature. Google Scholar databases were used to compile article journal over ten years from 2012 to 2025. The research method used was similar to those used by Fauzi & Pradipta (2018).

Data sources

The data utilized in this study were collected from journal articles that are publicly accessible via Google Scholar. The search process employed specific search queries focusing on purchase behavior in the context of digital marketing. From hundreds of retrieved articles, a total of 60 journal articles were selected and analyzed for this research.

Research instrument

The research instrument employed in this study was a content analysis guideline encompassing several observed aspects. The observed aspects include: (1) main input, (2) author and affiliations, (3) keyword analysis, (4) variables, (5) data analysis methods. These

categories were adapted and modified from the studies conducted by Fauzi & Pradipta (2018).

Data analysis

The collected data will be analyzed using mapping and statistical analysis to determine the trajectory of digital marketing research and how it interrelates with similar studies in Indonesia. The findings will be presented in the form of tables, figures, and bar charts using SPSS and VOSviewer.

RESULT AND DISCUSSION

Main input

The evolution of academic literature related to digital marketing and consumer behavior across Indonesia has shown a steady increase over the past decade, as presented in Figure 1 and Table 1. Figure 1 displays the number of articles published per year from 2012 to 2025, highlighting a visible surge in scholarly interest beginning in 2020. The highest output was recorded in 2021 with 16 documents, followed by a consistent stream of publications in subsequent years. The regression line, despite a low R² value (-0.0606), suggests a general upward trend in publication activity, albeit with some fluctuations over time.

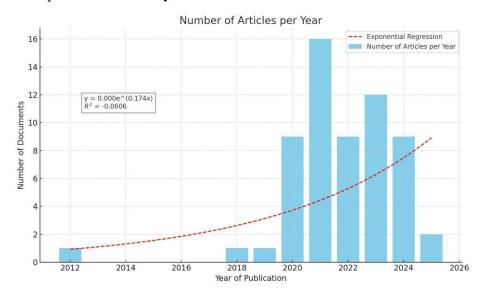


Figure 1 Growth of articles related digital marketing and cosumer behaviour in Indonesia from 2012 to 2025

Complementing this, Table 1 summarizes the main bibliometric indicators derived from the 60 selected documents. The annual growth rate of 5.48% signals a sustainable increase in research activity. With an average of 17 citations per document, the field demonstrates moderate scholarly influence and engagement. The total reference count of 1,869 reveals the wide-ranging intellectual foundation supporting these studies, while the 255 keywords indicate a diverse thematic exploration within the literature—ranging from consumer psychology, online platforms, to artificial intelligence applications. The research also showcases strong collaborative dynamics, with 176 authors contributing to the body of work, although only three documents were authored individually.

Table 1 Main bibliometric information on digital marketing and consumer behaviour in Indonesia

Description	Information
Document	60
Annual Growth Rate (%)	5.48
Average citation per doc	17
References	1869
Keywords	255
Number of Authors	176
Authors of single-authored docs	3

These patterns underline a promising yet evolving research landscape. The increasing output and multidimensional focus emphasize the need for a more integrated and intelligent approach in future studies—particularly by leveraging AI to better capture, predict, and shape Indonesian consumer behavior in digital spaces. The current bibliometric profile supports the argument that an AI-driven research design can offer a robust framework for advancing theoretical and practical insights in digital marketing.

Authors and affiliations

The data from Table 2 presents the distribution of sources and their corresponding frequencies. The "Journal of Distribution Science" and "Jurnal Ilmiah Manajemen dan Bisnis(JIMBI)" both rank first with 4 occurrences each, indicating a notable presence in the dataset. Following them are "Cogent Business & Management" with 3 occurrences, reflecting a significant but slightly lesser frequency. The "Journal of Accounting, Finance and Management" and "Jurnal Manajemen dan Sains (J-MAS)" both appear twice, suggesting they are somewhat less prominent compared to the top sources. This distribution highlights the varying levels of influence and representation of these journals in the dataset, with the top two sources standing out more clearly in terms of frequency.

Table 2 The Journal's number of publications ranked from the largest to the smallest.

Rank	Sources	\mathbf{N}
1	Journal of Distribution Science	4
2	Jurnal Ilmiah Manajemen dan Bisnis (JIMBI)	4
3	Cogent Business & Management	3
4	Journal of Accounting, Finance and Management	2
5	Jurnal Manajemen dan Sains (J-MAS)	2

Table 3 shows the top five authors ranked by the number of their publications, with all five authors: Agus Purwanto, Gandhi Gumelar, Titi Rapini, Naning Kristiyana, and A. Afriansyah, each contributing two publications. This equal distribution indicates that no single author dominates the dataset, and instead, there is a balanced contribution among these researchers. The uniformity in publication count suggests a diverse authorship landscape, where multiple individuals have made comparable impacts in terms of publication output within the analyzed sources.

Table 3 Top 5 Authors Ranked by their number of publiction

Rank	Sources	N
1	Agus Purwanto	2
2	Gandhi Gumelar	2
3	Titi Rapini	2
4	Naning Kristiyana	2
5	A. Afriansyah	2

Table 4 presents the most relevant affiliations based on the number of documents contributed. Universitas Pembangunan Nasional "Veteran" Jawa Timur ranks first with three publications, indicating its relatively higher research output in the dataset. The remaining four institutions—Universitas Negeri Jakarta, Universitas Muhammadiyah Ponorogo, Universitas Dian Nuswantoro, and Bina Darma University—each contributed two documents. This distribution suggests a competitive academic environment, with multiple institutions showing consistent engagement in research, while Universitas Pembangunan Nasional "Veteran" Jawa Timur stands out as the most prolific among them.

Table 4 Most Relevant Affiliations based on Number of Documents

Rank	Affiliations	\mathbf{N}
4	Universitas Pembangunan Nasional	"Veter an"
1	Jawa Timur	3
2	Universitas Negeri Jakarta	2
3	Universitas Muhammadiyah Ponorogo	2
4	Universitas Dian Nuswantoro	2
5	Bina Darma University	2

Keywords analysis

Table 5 highlights the most frequent keywords found in the dataset, with "Purchase Decision" emerging as the most dominant term, appearing 60 times—nearly three times more than the second-ranked keyword. This indicates a strong research focus on consumer behavior and decision-making processes. "Social media marketing" ranks second with 22 occurrences, followed closely by both "Influencer marketing" and "Brand trust," each with 20 mentions, suggesting growing academic interest in digital marketing strategies and consumer-brand relationships. "Brand image," appearing 17 times, also reflects its relevance in influencing consumer perceptions. Overall, the data illustrates that marketing-related themes, particularly those related to consumer decisions and digital influence, are central topics in the analyzed literature.

Table 5 Most frequent keyword

Rank	Keywords	N
1	Purchase Decision	60
2	Social media marketing	22
3	Influencer marketing	20
4	Brand trust	20
5	Brand image	17

The visual representation in Figure 2 illustrates a co-occurrence network of keywords that highlights the interconnectedness and thematic clustering of digital marketing and

consumer behavior studies across Indonesia. Central keywords such as *social media* marketing, purchase decision, brand trust, and consumer behavior occupy prominent positions, indicating their frequent appearance and pivotal role in shaping the discourse within the field. The network reveals distinct clusters, each representing thematic concentrations: one focuses on consumer engagement and trust, another on service and product quality, while others delve into influencer marketing, perceived ease of use, and digital content strategies. Notably, terms like *Shopee*, *Indonesia*, and *SMEs* suggest a growing localization of research, underlining the unique challenges and opportunities in Indonesia's digital commerce landscape. This structured relationship among keywords presents valuable potential for artificial intelligence applications, particularly in training models to automatically classify literature, detect thematic shifts, or forecast emerging research trends.

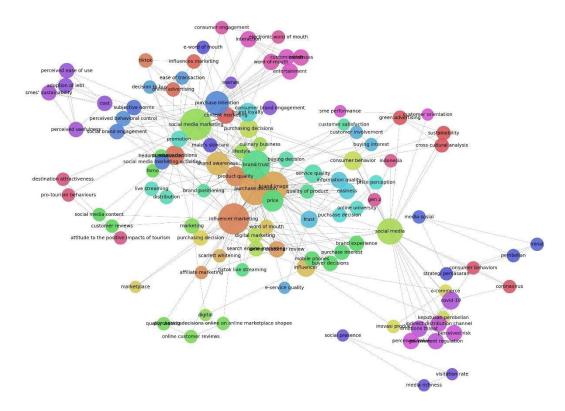


Figure 2 Network of all keywords

Figure 3 offers a temporal dimension by mapping trending topics by year from 2012 to 2024. The data indicates a sustained and growing interest in core topics such as *purchase decision*, *social media marketing*, *product quality*, and *brand trust*, especially from 2019 onwards. Emerging concepts like *influencer marketing* and *brand loyalty* have gained traction more recently, reflecting evolving digital consumption patterns and marketing strategies. These patterns align with external factors such as the rise of e-commerce platforms, increased internet penetration, and socio-economic shifts prompted by the COVID-19 pandemic. The consistency and rise of these topics over time present a clear opportunity to integrate AI- driven methods, such as natural language processing, to capture dynamic trends and automate literature synthesis. Together, these figures demonstrate not only the maturity and direction of digital marketing research in Indonesia but also provide a foundation for designing future studies that leverage artificial intelligence for deeper analytical insights and predictive capabilities.

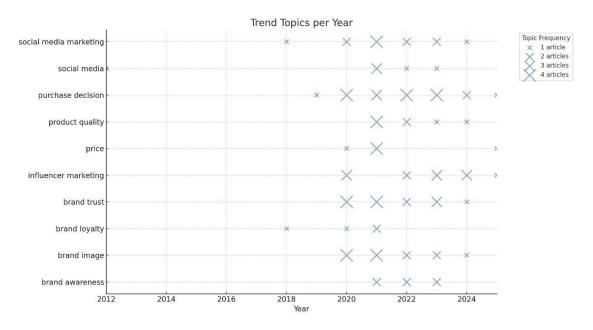


Figure 3 Top 10 Trending topics based on keyword frequency

Variables Analysis

The frequency analysis of the most investigated variables in recent studies reveals that Purchase Decision dominates as the most frequently examined variable, appearing in 60 studies—almost three times more than the second-ranked variable. This significant focus reflects the central role of consumer decision-making in digital marketing research, especially within the Indonesian context where online platforms are rapidly influencing buying behavior. Social Media Marketing follows with 22 occurrences, highlighting its position as a primary marketing strategy that impacts consumer engagement and brand interaction. Close behind are *Influencer Marketing* and *Brand Trust*, each with 20 instances, suggesting a growing interest in the persuasive power of online influencers and the importance of building consumer confidence in digital environments. Finally, *Brand Image* appears in 17 studies, underlining its relevance in shaping customer perception and loyalty. The distribution of these variables suggests that current research is heavily centered on understanding how digital marketing tools influence consumer behavior, particularly in terms of decision- making, trustbuilding, and branding strategies. These insights also serve as a foundation for integrating artificial intelligence models to predict consumer responses and optimize marketing efforts in future research.

Table 5 Most frequent variables Rank Variables N 60 **Purchase Decision** 2 Social media marketing 22 3 Influencer marketing 20 4 Brand trust 20 5 Brand image 17

Data analysis method

The methodological landscape of studies related to digital marketing and consumer behavior is predominantly quantitative, with a strong preference for advanced statistical modeling. Structural Equation Modeling (SEM) is the most widely employed analysis method, used in

30 studies, indicating its importance in examining complex relationships between multiple latent variables such as brand trust, influencer marketing, and purchase decisions. SEM's ability to test theoretical models makes it highly suitable for consumer behavior research, where mediating and moderating effects are common. *Multiple Linear Regression* follows closely with 25 uses, reflecting its continued relevance in identifying the influence of independent variables—such as digital marketing strategies—on consumer outcomes. Meanwhile, traditional statistical techniques like *ANOVA* appear less frequently, with only 3 instances, and more specialized tools such as *Multivariate Analysis* and *Importance Performance Analysis* (*IPA*) are each used just once. This distribution reveals a clear trend: researchers are favoring robust, model-based approaches that offer deeper insights into variable interrelations over simpler comparative techniques. The prominence of SEM and regression also suggests a fertile ground for integrating AI and machine learning algorithms in future research to complement or even enhance these analytical methods through predictive modeling and automated pattern detection.

Table 6 Most frequent analysis methods

Rank	Analysis method	N
1	SEM (Structural Equation Modeling)	30
2	Multiple Linear Regression	25
3	ANOVA	3
4	Multivariate analysis	1
5	Importance Performance Analysis (IPA)	1

Discussion

The role of Social Media Marketing in Digital Marketing

Social Media Marketing (SMM) has emerged as a pivotal construct in contemporary digital marketing discourse, particularly in the Indonesian context where consumer engagement through digital platforms continues to rise. SMM is broadly defined as a form of internet marketing that utilizes social networking platforms to deliver marketing messages and promote brands, services, or products directly to targeted consumers (Dahnil et al., 2014; Kim & Ko, 2012).

In the reviewed articles, SMM is predominantly framed as a strategic tool for brand communication and customer relationship building. It encompasses various activities such as content sharing, customer interaction, word-of-mouth facilitation, and real-time feedback (Moslehpour et al., 2022; Tatar & Eren-Erdoğmuş, 2016). The interactivity, accessibility, and personalization of social media platforms make SMM distinct from traditional marketing techniques (Yaday & Rahman, 2017).

Social Media Marketing (SMM) plays a central role in the broader architecture of digital marketing strategies, particularly in the Indonesian market, where internet and mobile adoption rates continue to climb. Within the selected literature, SMM consistently appears as a dominant subcomponent of digital marketing, often being the primary channel for brand communication, consumer engagement, and purchase persuasion (Moslehpour et al., 2022). Unlike traditional advertising formats, SMM offers interactive, cost-effective, and real-time engagement mechanisms, making it highly effective in building brand equity and consumerloyalty in digital ecosystems (Ginting et al., 2017; Tatar & Eren-Erdoğmuş, 2016; Yadav & Rahman, 2017).

Several Indonesian case studies highlight how businesses—from global brands like Starbucks Indonesia to local cafes and SMEs—have integrated SMM into their digital

marketing frameworks to boost customer engagement and strengthen market positioning. For example, Yuma Cafe Bandung utilized SMM tactics such as Instagram promotions and content curation to increase brand visibility and influence purchasing decisions. Similarly, GO-JEK's digital marketing strategy heavily relied on social media platforms to cultivate trust, create emotional connections with users, and amplify its services' reach, especially through word- of-mouth and user-generated content (Moslehpour et al., 2022).

The reviewed literature reveals that SMM supports digital marketing by fulfilling multiple roles: (1) as a platform for storytelling and brand humanization, (2) as a real-time feedback loop where brands can adapt messaging based on consumer sentiment, and (3) as a funnel - driving tool that transforms awareness into consideration and eventually into purchase behavior (Godey et al., 2016; Seo & Park, 2018). Importantly, SMM also serves as a data- rich environment where digital marketers can track engagement metrics, analyze consumer behavior, and implement AI-driven personalization for future campaigns (Dahnil et al.,2014).

Furthermore, the integration of SMM into overall digital marketing strategies has proven especially vital in the Indonesian context, where consumers are highly active on platforms like Instagram, Facebook, TikTok, and WhatsApp. This landscape provides brands with an opportunity to localize content, foster community interaction, and elevate perceived value—key determinants in shaping consumer preferences (Nylander, 2017). Thus, the literature strongly supports the notion that SMM is not merely a promotional add-on but a core pillar of digital marketing that drives customer acquisition, retention, and advocacy.

The role of Influencer Marketing in Digital Marketing

Influencer Marketing is commonly defined as a strategic marketing approach that leverages the reach, credibility, and persuasion of individuals—often known as influencers—who have built substantial followings on social media platforms. These influencers actively promote brands or products through content that resonates emotionally and cognitively with their audience (Cepeda-Carrión et al., 2015; Harbor & Hunt, 2021).

Influencer marketing has emerged as a dominant force within the digital marketing ecosystem, particularly in Indonesia, where social media usage is exceptionally high among the younger demographic. In essence, influencer marketing refers to a strategic promotion technique that involves leveraging individuals with substantial online followings—commonly

referred to as influencers—to deliver persuasive brand messages and influence consumer behavior. Rather than focusing solely on celebrities, this approach emphasizes authenticity, expertise, and emotional connection. Influencers can be anyone with the ability to affect the opinions and decisions of others through their content, which is often perceived as more relatable and trustworthy compared to traditional advertising (Cepeda-Carrión et al., 2015; Kharis et al., 2024).

The reviewed literature consistently highlights three core dimensions of influencer marketing:

credibility, attractiveness, and power. Credibility involves the influencer's perceived expertise and trustworthiness, attractiveness encompasses personality traits and lifestyle alignment with the audience, and power refers to the influencer's capacity to mobilize consumer actions through their authority or charisma (Amalanathan & Reddy-Best, 2024; Lütjen et al., 2019). These elements are central to understanding how influencers build persuasive relationships with their followers and how these relationships translate into consumer engagement and, ultimately, purchase behavior. Across the studies examined in this systematic literature review, influencer marketing is shown to be both a standalone promotional strategy and a complementary component of broader digital marketing campaigns. For instance, Martynenko and Demchenko (2023) investigated the impact of influencer marketing, content

marketing, and online advertising on TikTok users in Palembang and found that while influencer marketing had a positive but statistically insignificant direct effect on purchase decisions, its combined effect with other digital strategies was substantial—accounting for 84.1% of purchase decision variance. This suggests that the role of influencer marketing may be more synergistic, amplifying the effectiveness of digital content and advertising when integrated within a holistic strategy.

The study, conducted using SEM analysis, showed that influencer marketing significantly shaped buying intentions among Gen Z consumers who are highly active on platforms like TikTok. These findings align with the broader consensus in the literature that younger consumers are more likely to trust and be persuaded by influencers who reflect their identities and values (Nawastuti, 2023).

Influencer marketing serves multiple strategic functions within digital marketing frameworks. It enhances brand visibility, facilitates emotional branding through storytelling, and provides social proof that reduces perceived purchase risks. Moreover, influencers often act as bridges between brands and online communities, enabling more organic and trustworthy communication than corporate messaging alone. In the Indonesian context, where digital culture is tightly woven into daily life, influencer-driven campaigns often outperform traditional advertisements in generating engagement, particularly in visual-driven platforms like TikTok and Instagram.

Thus, the role of influencer marketing in digital marketing is both dynamic and foundational. It is not only an engagement tactic but also a behavioral trigger that drives purchasing decisions by shaping perceptions, building trust, and creating aspirational brand associations. The literature reviewed confirms that influencer marketing, when effectively aligned with brand values and audience expectations, becomes a critical driver of digital campaign success in Indonesia's rapidly evolving online marketplace.

The role of Brand Trust in Digital Marketing

Brand trust is defined as the consumer's confidence in a brand's reliability and integrity. It refers to a consumer's belief that a brand will deliver on its promises, behave consistently, and act in the customer's best interests, especially in situations of uncertainty (Chaudhuri & Holbrook, 2001; Delgado-Ballester et al., 2003). According to Cuong (2020), brand trust emerges when consumers feel secure interacting with a brand, believing that the brand will remain dependable and responsive to their needs. Trust in a brand plays a vital role in reducing perceived risk and increasing customer confidence, which is essential for influencing purchase intentions.

In digital contexts, brand trust becomes even more critical due to the intangibility of online interactions and the high level of uncertainty involved. Hasan and Sohail (2021) emphasized that digital consumers often base their trust not just on the product itself, but on the entire digital experience—including consistency in messaging, customer service responsiveness, data protection, and perceived brand integrity.

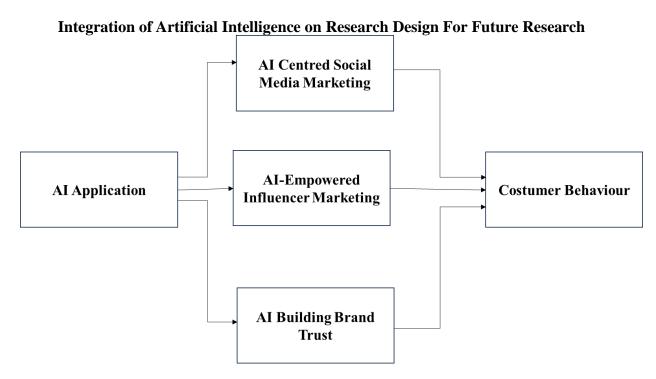
Brand trust is widely acknowledged as a fundamental component in building strong consumer-brand relationships, particularly in digital environments. It is generally defined as the confidence a consumer places in a brand's reliability, integrity, and ability to fulfill its promises (Chaudhuri & Holbrook, 2001). According to Delgado-Ballester et al. (2003), brand trust reflects a psychological state in which consumers feel secure relying on a brand, even in uncertain or competitive situations. This perception of reliability reduces perceived risk and fosters long-term brand loyalty. Cuong (2020) elaborates that brand trust is shaped by aconsumer's belief that the brand will act in their best interest, maintaining consistent quality

and behavior across multiple interactions.

In the context of digital marketing, trust takes on an even more critical role due to the absence of physical interaction and the increasing reliance on online interfaces. Hasan and Sohail (2021) assert that digital brand trust emerges from consistent communication, transparency, personalization, and responsiveness. Brands that maintain ethical behavior, protect customer data, and engage meaningfully through digital platforms can earn a higher degree of consumer trust, which directly influences purchase intentions.

Systematic literature reviews further support the vital role of brand trust in shaping consumer behavior. Cuong's (2020) empirical study confirms that brand trust mediates the relationship between brand satisfaction and purchase intention. Using structural equation modeling, the study demonstrated that trust significantly strengthens the effect of satisfaction on consumer intent to repurchase. This reinforces the idea that trust functions not only as an outcome of positive brand experiences but also as a driving force behind consumer decision-making.

The rise of artificial intelligence (AI) in digital marketing has added a new dimension to brand trust. Guerra-Tamez et al. (2024) highlight that AI-driven personalization and predictive services enhance perceived brand competence and credibility. Patrizi et al. (2024) further suggest that AI features like voice assistants humanize brand interactions, increasing emotional resonance and deepening trust. These technologies allow brands to communicate consistently, respond empathetically, and deliver tailored experiences—all of which contribute to greater consumer confidence.



Artificial Intelligence Centred Social Media Marketing

 H_1 : Artificial intelligence can provide superior social media marketing and influence consumer behaviour to purchase goods and services

Social Media Marketing (SMM) has evolved into a critical pillar of digital marketing strategies, enabling real-time, bidirectional communication between brands and consumers. However, its true transformational power is unleashed when integrated with ArtificialIntelligence (AI), which brings personalization, automation, and predictive capabilities into marketing practice (Ali Abbasi et al., 2022; Basha, 2023). AI-enhanced SMM

allows businesses to deliver tailored content, dynamically respond to user interactions, and analyze massive datasets to understand consumer preferences and predict future behaviors (Ziakis & Vlachopoulou, 2023).

Previous studies identified five core SMM components—interactivity, entertainment, trendiness, customization, and word-of-mouth—that shape consumer attitudes and behavior. AI amplifies these components by enabling real-time content customization, emotion recognition, and conversational engagement via chatbots and virtual agents (Ameen et al.,

2022). For instance, sentiment analysis tools empowered by AI can dissect customer responses on social platforms and adapt brand messaging accordingly, thus fostering deeper engagement and trust (Ziakis & Vlachopoulou, 2023).

Basha (2023) emphasizes that AI facilitates a hyper-personalized marketing environment,

where platforms such as Facebook, Instagram, and YouTube deliver individually curated messages to millions simultaneously. This capability is rooted in AI's ability to synthesize structured and unstructured data, enabling marketers to assess customer preferences, behaviors, and even emotional states, thereby creating more resonant experiences. Moreover, AI-driven SMM systems can recommend products, automate ad targeting, and track consumer journeys with far greater accuracy than traditional methods (Sterne, 2017).

The literature also highlights AI's role in improving marketing productivity and decision-making. For example, Abbasi et al. (Ali Abbasi et al., 2022) employed a deep artificial neural network (ANN) model to predict the success of SMM adoption among SMEs, demonstrating AI's value in optimizing strategic execution. Furthermore, studies have shown that AI-enabled social media systems not only reduce marketing costs but also improve ROI through better targeting and engagement metrics (Ibrahim et al., 2020; Ziakis & Vlachopoulou, 2023). Therefore, the integration of AI into SMM is not merely a technological enhancement; it represents a fundamental shift in how brands interact with consumers, increasing message relevance, fostering emotional connection, and ultimately, influencing purchasing behavior.

Artificial Intelligence Empowered Influencer Marketing

 H_2 : Artificial intelligence in digital marketing improves influencer marketing and influence consumer behaviour to purchase goods and services

Influencer marketing has become a key strategy within digital marketing, particularly on platforms like Instagram, TikTok, and YouTube, where influencers leverage their perceived authenticity and credibility to promote products to highly engaged audiences (Belanche et al.,

2022; Koay et al., 2021). The effectiveness of influencer marketing often hinges on psychological congruence between the influencer, the product, and the consumer—when these elements align, consumers demonstrate more favorable attitudes and increased purchasing intentions (Belanche et al., 2022).

Artificial Intelligence (AI) now plays a transformative role in this domain. AI technologies, including sentiment analysis, facial recognition, and predictive analytics, allow marketers to enhance influencer selection, audience targeting, and content personalization. For instance, AI-generated virtual influencers, such as Lil Miquela and Shudu, have shown the ability to

trigger emotional engagement comparable to real influencers through well-calibrated facial expressions and narrative consistency. These AI-driven personas operate under the Computers Are Social Actors (CASA) framework, where users interact with them as if they were human, leading to increased emotional resonance and behavioural impact (Martynenko

& Demchenko, 2023).

Furthermore, AI enables dynamic content optimization and audience segmentation, allowing influencers and brands to deliver hyper-personalized messages at scale. According to Jhawaret al. (2023), the use of virtual influencers—designed and managed entirely through AI— enhances brand safety, ensures consistency in messaging, and boosts consumer trust through parasocial interactions. This elevates the influencer's perceived credibility, a key driver of consumer engagement and conversion (Koay et al., 2021).

The integration of AI in influencer marketing also aligns with the Stimulus-Organism-Response (S-O-R) theory, where AI-enhanced stimuli (e.g., personalized, emotionally engaging content) affect consumers' internal evaluations, resulting in measurable behavioural responses such as impulse buying or brand advocacy (Koay et al., 2021).

Findings suggest that the strategic use of AI in influencer marketing enhances congruence, improves targeting precision, and amplifies emotional impact, which in turn positively shapes consumer attitudes and increases the likelihood of purchase.

Artificial Intelligence Built Brand Trust

*H*₃ : Artificial intelligence helps to build brand trust in digital platforms

In the evolving landscape of digital commerce, trust has become a critical factor for brand survival and growth. With the exponential rise in virtual interactions and AI-powered services, building and maintaining brand trust requires more than traditional strategies. Artificial Intelligence (AI), through its capacity to enable personalized, responsive, and consistent consumer engagement, has emerged as a transformative tool in fostering consumer trust (Guerra-Tamez et al., 2024).

Brand trust encompasses a consumer's willingness to rely on a brand's ability to perform its stated functions, fulfill promises, and protect personal data. AI contributes to this by enhancing the cognitive (through accurate recommendations), emotional (via conversational chatbots), social (by enabling brand anthropomorphism), and sensory (via voice-based interactions) dimensions of customer experience (Patrizi et al., 2024; Pillarisetty & Mishra, 2022).

For instance, the use of voice-based AI assistants like Google Assistant or Siri introduces anthropomorphic traits into brand identity—where consumers perceive AI agents as extensions of the brand with human-like characteristics. This "brand vocal physique" strengthens emotional and behavioral engagement and increases brand trust, particularly under conditions of perceived privacy risk (Patrizi et al., 2024). Similarly, AI systems that provide real-time, tailored recommendations signal competence and reliability, which enhances trustworthiness in consumer perception (Guerra-Tamez et al., 2024).

Moreover, AI's ability to analyze behavior, predict needs, and communicate proactively across digital platforms contributes to a feeling of security and confidence among users. When customers perceive the AI interface as accurate, intelligent, and ethically aligned, this perception directly translates into brand trust and ultimately affects purchase decisions (R. Hasan et al., 2021; Sun et al., 2022).

Findings indicate that AI can create trustworthy brand-consumer relationships by enhancing personalization, facilitating secure and seamless communication, and humanizing digital brand interactions. This results in increased customer confidence and loyalty in digital platforms

CONCLUSION

This study has mapped the evolving landscape of digital marketing research and its impact on consumer behavior in Indonesia by conducting a systematic literature review of 60 relevant journal articles. The findings indicate that *purchase decision* is the most frequently studied variable, while *social media marketing*, *influencer marketing*, and *brand trust* emerge

as central themes shaping digital engagement. Advanced statistical methods, particularlyStructural Equation Modeling (SEM) and Multiple Linear Regression, are the preferred analytical tools used by researchers, demonstrating the field's emphasis on quantitative rigor. Through bibliometric and co-occurrence analyses, this study highlights the increasing integration of Artificial Intelligence (AI) in digital marketing strategies, including the use of AI-powered personalization, sentiment analysis, and virtual influencers. These innovations not only enhance marketing effectiveness but also contribute to building brand trust and influencing consumer decisions. The temporal analysis of trending topics shows a clear trajectory toward more AI-driven, consumer-centric research themes.

The proposed conceptual framework offers a future research direction that integrates AI into social media marketing, influencer marketing, and brand trust mechanisms. This AI-centered approach is expected to enrich the methodological landscape by enabling predictive modeling, automated engagement strategies, and dynamic personalization.

In conclusion, the intersection of AI and digital marketing presents a critical opportunity for advancing both academic inquiry and practical application. Future research should focus on refining AI-based models, addressing ethical concerns, and contextualizing AI applications within the unique behavioral patterns of Indonesian consumers. By embracing intelligent systems, researchers and practitioners can better understand, anticipate, and influence consumer behavior in the digital era.

REFERENCES

Ali Abbasi, G., Abdul Rahim, N. F., Wu, H., Iranmanesh, M., & Keong, B. N. C. (2022). Determinants of SME's social media marketing adoption: competitive industry as a moderator. *Sage Open*, *12*(1), 21582440211067220.

Amalanathan, S., & Reddy-Best, K. L. (2024). Modesty in business, bold in fashion: entrepreneurial experiences of U.S. Muslim women in niche fashion markets. *Journal of Innovation and Entrepreneurship*, *13*(1). https://doi.org/10.1186/s13731-024-00420-5

Ameen, N., Sharma, G. D., Tarba, S., Rao, A., & Chopra, R. (2022). Toward advancing theory on creativity in marketing and artificial intelligence. *Psychology & Marketing*, 39(9), 1802–1825.

Basha, M. (2023). Impact of artificial intelligence on marketing. *East Asian Journal of Multidisciplinary Research*, 2(3), 993–1004.

Belanche, D., Guinalíu, M., & Albás, P. (2022). Customer adoption of p2p mobile payment systems: The role of perceived risk. *Telematics and Informatics*, 72. https://doi.org/10.1016/j.tele.2022.101851

Cepeda-Carrión, I., Leal-Millán, A. G., Ortega-Gutierrez, J., & Leal-Rodriguez, A. L. (2015). Linking unlearning with service quality through learning processes in the Spanish banking industry. *Journal of Business Research*, 68(7), 1450–1457.

- Chaudhuri, A., & Holbrook, M. B. (2001). The chain of effects from brand trust and brand affect to brand performance: the role of brand loyalty. *Journal of Marketing*, 65(2), 81–93.
- Cuong, D. T. (2020). The role of brand trust as a mediator in the relationship between brand satisfaction and purchase intention. *International Journal of Psychosocial Rehabilitation*, 24(6), 14726–14735. Dahnil, M. I., Marzuki, K. M., Langgat, J., & Fabeil, N. F. (2014). Factors influencing SMEs adoption of social media marketing. *Procedia-Social and Behavioral Sciences*, 148,119–126.
- Delgado-Ballester, E., Munuera-Aleman, J. L., & Yague-Guillen, M. J. (2003). Development and validation of a brand trust scale. *International Journal of Market Research*, 45(1), 35–54.

- Efendioğlu, İ. (2023). The change of digital marketing with artificial intelligence. The 7th International Conference on Applied Research in Management, Economics and Accounting—2023. DOI, 10.
- Fauzi, A., & Pradipta, I. W. (2018). Research methods and data analysis techniques in education articles published by Indonesian biology educational journals. *JPBI (Jurnal Pendidikan Biologi Indonesia)*, 4(2), 123–134.
- Fu, Y., Wang, Y., Ye, X., Wu, W., & Wu, J. (2023). Satisfaction with and Continuous Usage Intention towards Mobile Health Services: Translating Users' Feedback into Measurement. *Sustainability* (*Switzerland*), 15(2). https://doi.org/10.3390/su15021101
- Ginting, N., Rahman, N. V., & Sembiring, G. (2017). Tourism development based on geopark in Bakkara Caldera Toba, Indonesia. *IOP Conference Series: Materials Science and Engineering*, 180(1), 12086.
- Godey, B., Manthiou, A., Pederzoli, D., Rokka, J., Aiello, G., Donvito, R., & Singh, R. (2016). Social media marketing efforts of luxury brands: Influence on brand equity and consumer behavior. *Journal of Business Research*, 69(12), 5833–5841.
- Gökerik, M., & Aktaş, Ö. (2024). Digital marketing trends reshaped by artificial intelligence: A bibliometric approach. *JOEEP: Journal of Emerging Economies and Policy*, *9*(1), 75–90.
- Guerra-Tamez, C. R., Kraul Flores, K., Serna-Mendiburu, G. M., Chavelas Robles, D., & Ibarra Cortés, J. (2024). Decoding Gen Z: AI's influence on brand trust and purchasing behavior. *Frontiers in Artificial Intelligence*, 7, 1323512.
- Harbor, L. C., & Hunt, C. A. (2021). Indigenous tourism and cultural justice in a Tz'utujil Maya community, Guatemala. *Journal of Sustainable Tourism*, 29(2–3), 214–233. https://doi.org/10.1080/09669582.2020.1770771
- Hasan, M., & Sohail, M. S. (2021). The influence of social media marketing on consumers' purchase decision: investigating the effects of local and nonlocal brands. *Journal of International Consumer Marketing*, 33(3), 350–367.
- Hasan, R., Shams, R., & Rahman, M. (2021). Consumer trust and perceived risk for voice-controlled artificial intelligence: The case of Siri. *Journal of Business Research*, 131
- 591–597. https://doi.org/10.1016/j.jbusres.2020.12.012
- Ibrahim, B., Aljarah, A., & Ababneh, B. (2020). Do Social Media Marketing Activities Enhance Consumer Perception of Brands? A Meta-Analytic Examination. *Journal of Promotion Management*, 26(4), 544–568. https://doi.org/10.1080/10496491.2020.1719956
- Jhawar, A., Kumar, P., & Varshney, S. (2023). The emergence of virtual influencers: a shift in the influencer marketing paradigm. *Young Consumers*, 24(4), 468–484.
- Kharis, S. A. A., Zili, A. H. A., Putri, A., & Robiansyah, A. (2024). Unveiling the Potential of Artificial Intelligence in Digital Marketing for Universitas Terbuka. *E3S Web of Conferences*, 483, 3014.
- Kim, A. J., & Ko, E. (2012). Do social media marketing activities enhance customer equity? An empirical study of luxury fashion brand. *Journal of Business Research*, 65(10), 1480–1486.
- Koay, K. Y., Teoh, C. W., & Soh, P. C. H. (2021). Instagram influencer marketing: Perceived social media marketing activities and online impulse buying. *First Monday*, 26(9).Liu, Z. (n.d.). A Study on English Translation of Tourism Publicity in Coastal Cities from the
- Perspective of Cross-cultural Communication. *Source: Journal of Coastal Research*, 2020(115), 87–89. https://doi.org/10.2307/48640396

- Lütjen, H., Schultz, C., Tietze, F., & Urmetzer, F. (2019). Managing ecosystems for service innovation: A dynamic capability view. *Journal of Business Research*, 104, 506–519.
- Martynenko, M., & Demchenko, H. (2023). Developing and implementing digital marketing strategies of the future: toward improving product quality and competitiveness. *Futurity Economics & Law*, *3*, 63–84. https://doi.org/10.57125/fel.2023.03.25.07
- Moslehpour, M., Ismail, T., Purba, B., & Wong, W. K. (2022). What makes go-jek go in indonesia? The influences of social media marketing activities on purchase intention. *Journal of Theoretical and Applied Electronic Commerce Research*, *17*(1), 89–103. https://doi.org/10.3390/jtaer17010005
- Nawastuti, N. (2023). Pengaruh Influencer dan E-WOM terhadap Loyalitas Pelanggan Melalui Kepuasan Pelanggan sebagai Variabel Mediasi Pada Pelanggan TikTok Shop. *Jurnal Informatika Ekonomi Bisnis*, 1415–1421.
- Nirwana, A., Kusuma, R. P., & Pradana, A. P. (2023). Implementation of artificial intelligence in digital marketing development: A thematic review and practical exploration. *Jurnal Manajemen Bisnis, Akuntansi Dan Keuangan*, 2(1), 85–112.
- Nylander, J. (2017). Indonesia just became the fastest-growing m-commerce market. *Retrieved June*, 11, 2018.
- Patrizi, M., Šerić, M., & Vernuccio, M. (2024). Hey Google, I trust you! The consequences of brand anthropomorphism in voice-based artificial intelligence contexts. *Journal of Retailing and Consumer Services*, 77, 103659.
- Pillarisetty, R., & Mishra, P. (2022). A review of AI (artificial intelligence) tools and customer experience in online fashion retail. *International Journal of E-Business Research (IJEBR)*, 18(2), 1–12.
- Rabby, F., Chimhundu, R., & Hassan, R. (2021). Artificial Intelligence in Digital Marketing Influences Consumer Behaviour: a Review and Theoretical Foundation for Future Research. *Academy of Marketing Studies Journal*, 25(5), 1–7.
- Saleh, R. A., & Zeebaree, S. R. M. (2025). Artificial Intelligence in E-commerce and Digital Marketing: A Systematic Review of Opportunities, Challenges, and Ethical Implications. *Asian Journal of Research in Computer Science*, 18, 395–410.
- Seo, E.-J., & Park, J.-W. (2018). A study on the effects of social media marketing activities on brand equity and customer response in the airline industry. *Journal of Air Transport Management*, 66, 36–41.
- Sterne, J. (2017). Artificial intelligence for marketing: practical applications. John Wiley & Sons.
- Sun, Y., Huang, Y., Fang, X., & Yan, F. (2022). The purchase intention for agricultural products of regional public brands: examining the influences of awareness, perceived quality, and brand trust. *Mathematical Problems in Engineering*, 2022(1), 4991059.
- Tatar, Ş. B., & Eren-Erdoğmuş, İ. (2016). The effect of social media marketing on brand trust and brand loyalty for hotels. *Information Technology & Tourism*, 16, 249–263.
- Yadav, M., & Rahman, Z. (2017). Measuring consumer perception of social media marketing activities in e-commerce industry: Scale development & validation. *Telematics and Informatics*, 34(7), 1294–1307.
- Ziakis, C., & Vlachopoulou, M. (2023). Artificial intelligence in digital marketing: Insights from a comprehensive review. *Information*, 14(12), 664.