

The Role of Artificial Intelligence (AI) in Modern Marketing: A Study on Customer Awareness, Experience, Trust, and Purchase Decisions

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ABSTRACT

Artificial Intelligence (AI) in modern marketing has become a significant phenomenon influencing the process of understanding, approaching, and interacting with the customer. This descriptive study aims to discover the role of AI in contemporary marketing by analyzing its impact on customer awareness, customer experience, marketing effectiveness, trust and privacy, and purchase decision. The primary data were gathered from 100 participants who are familiar with AI-driven digital technologies. The five-Point Likert-scaled questionnaire was distributed by means of Google Forms and later analyzed descriptively in accordance with the research objectives using Percentage Analysis, Descriptive Statistics, Chi-Square Analysis, and Pearson Correlation Analysis in SPSS. The results of the study demonstrate that participants had a positive perception of AI application in marketing, reflected in the mean scores varying between 3.76 and 4.26 for all of the five constructs. Additionally, the chi-square test revealed the absence of significant differences between genders, ages, and levels of education in terms of awareness, purchase decision, and trust and privacy, which implies that AI-driven marketing affects all customer groups equally. Finally, there was a statistically significant positive correlation between all of the five constructs, with the strongest relationship existing between customer experience and purchase decision (0.845). Thus, the study concludes that AI is a powerful tool for modern marketing, which should be used responsibly to achieve marketing effectiveness.

KEYWORDS

Artificial Intelligence, Digital Marketing, Customer Experience, Marketing Effectiveness, Trust and Privacy, Purchase Decision, Consumer Behaviour

INTRODUCTION

Artificial Intelligence refers to capabilities of computer and software technologies to mimic human intellectual activities such as learning, thinking, perception, and judgment. The progress in machine learning, natural language processing, predictive analytics, and other related fields has enabled organizations to increasingly rely on artificial intelligence systems in their business processes. As a result, marketing activities in the healthcare sector, banking sector, educational sector, retail sector, and other fields have adopted artificial intelligence technologies to remain competitive in the modern digital business environment. Marketing activities have witnessed numerous changes driven by digitization and data collection tendencies, which have shifted organizational attention from the traditional mass media, newspaper ads, press releases, manual market research, and manual marketing processes. Such marketing activities are now replaced by artificial intelligence technologies such as chatbots, recommendation systems, marketing automation tools, customer relationship management tools, sentiment analysis, and generative artificial intelligence. Besides, search engine optimization, search engine marketing, and related activities have also been revolutionized by artificial intelligence technologies and processes. Modern customers have raised privacy, security, and ethics concerns about the collection and usage of their personal data in customer analytics and marketing activities, which has influenced their trust and purchase intentions. The internship involved working in the Poster Designing team and Search Engine Optimization team to understand how artificial intelligence technologies support keyword research, content creation, and other

marketing activities. This study aims to provide an empirical insight into the influence of artificial intelligence in marketing activities on consumer awareness, experience, trust, and purchase behavior, as well as the corresponding recommendations to organizations.

REVIEW OF LITERATURE

Wang and Li (2026) performed a bibliometric analysis of artificial intelligence and marketing research to establish future research trends. Their research involved analyzing three decades of research articles, conference papers, and reports to reveal research growth patterns, dominant themes, and emerging trends. The result of the research revealed a significant rise in artificial intelligence and marketing research, especially studies focused on customer analytics, personalization, and generative artificial intelligence.

Nabirasool and Dudekula (2026) analyzed the impact of artificial intelligence enabled digital management systems. The researchers identified the efficiency and effectiveness of automation and artificial intelligence decision support systems in organizational processes, especially in reducing manual efforts and increasing productivity.

Delen and Hızıroğlu (2026) conducted a review study on the role of artificial intelligence in marketing while focusing on neuromarketing applications. Their research revealed that artificial intelligence analytics have improved the understanding of consumer decision-making processes and purchasing behaviors, thus enhancing targeted marketing and personalization.

Prasanna and Kushwaha (2025) performed a review study of over one-hundred research articles on the application of generative artificial intelligence in marketing. The researchers identified significant applications of generative artificial intelligence in marketing, including content creation, marketing material design, branding activities, and related activities. Besides, the review study highlighted the ethical concerns surrounding the application of generative artificial intelligence in marketing.

Aghaei et al. (2025) performed a review study on the role of large language models in marketing management. The researchers revealed that large language models have enhanced customer engagement, marketing activities such as recommendation systems, and content creation, thus improving business operations. However, the article highlights ethical issues related to the use of large language models in marketing activities.

Bharadiya (2024) reviewed the application of artificial intelligence in various business processes and activities. The researcher revealed that artificial intelligence has the potential to enhance organizational processes, increase efficiency, productivity, and profit, and gain a competitive advantage, especially when used responsibly.

Bolanos, Salatino, Osborne, and Motta (2024) demonstrated the role of artificial intelligence in automating information analysis and supporting decision-making across various fields of application. The researchers highlight the potential of artificial intelligence in analyzing information and enhancing decision-making in addition to its application in marketing activities.

Verma, Sharma, Deb, and Maitra (2023) highlight the potential of artificial intelligence personalized recommendation systems in improving customer satisfaction and enhancing purchase behavior, thus benefiting business performance.

Mariani et al. (2023) discuss the potential of artificial intelligence applications in customer experience management. The researchers demonstrate how artificial intelligence technologies have enhanced customer engagement and interaction in the modern business environment.

Mariani, Perez-Vega, and Wirtz (2022) provide an overview of artificial intelligence applications in marketing, with a focus on machine learning, text mining, recommendation systems, and social media analytics. The authors conclude that artificial intelligence has a significant potential in enhancing the customer experience and improving marketing activities, leading to improved business performance.

Ngai and Wu (2022) present the marketing applications of machine learning while developing a framework for integrating machine learning in marketing activities. The researchers argue that machine learning can be applied in product recommendation, product development, pricing processes, segmentation, and other marketing activities.

Dwivedi et al. (2022) discuss the role of artificial intelligence in gaining customer engagement, improving marketing activities, and supporting organizational decision-making while considering ethical issues, transparency, and data privacy concerns.

Huang and Rust (2022) examine the collaboration between artificial intelligence and marketers. The authors reveal that artificial intelligence and marketers can collaborate to enhance marketing activities by allowing artificial intelligence to handle repetitive and monotonous tasks and leaving creative and human-related marketing activities to marketers. The study suggests that collaborative marketing will increase customer engagement and yield better marketing results compared to marketing activities driven by either artificial intelligence or marketers.

Vlagic, Corbo, Costa e Silva, and Dabic (2021) provide an overview of the role of artificial intelligence in marketing by carrying out a systematic review of one-hundred sixty-four research articles.

The researchers conclude that in the future, artificial intelligence will play a significant role in marketing activities, especially in ethical and responsible marketing, data privacy and security, and the need for marketing professionals to have relevant skills. The article suggests that collaborative marketing will increase customer engagement and yield better marketing results compared to marketing activities driven by either artificial intelligence or marketers. Paschen, Pitt, and Kietzmann (2021)

RESEARCH GAP

Most studies focus on individual aspects of AI marketing: personalization, automation, recommendations, or content generation – but pay little attention to how customer awareness, experience, trust, and purchase behavior interact. Additionally, there is limited understanding of the relationship between marketing activities utilizing artificial intelligence and customer response to them. There are also few studies linking customer awareness, experience, attitude, and purchasing behavior when using digital marketing platforms. Finally, there is a lack of research on the impact of such factors as gender, age, and level of education on the awareness of customers about the use of AI marketing in India. Therefore, the research aims to investigate the connection between AI awareness, customer experience, marketing effectiveness, and purchase decision-making, trust and privacy with a specific focus on the Indian audience.

OBJECTIVES OF THE STUDY

Primary objective: To understand the role of Artificial Intelligence and conduct a study of its impact on the customer experience, marketing effectiveness, purchase decision, and customers' trust and privacy in India.

Secondary objectives:

- To assess the level of awareness and familiarity with marketing applications of artificial intelligence among consumers.
- To determine attitudes of customers towards the impact of artificial intelligence on personalization and responsiveness.
- To evaluate the effect of artificial intelligence marketing on personalization, advertising, segmentation, and effectiveness.
- To study customer perceptions of personalization and responsiveness provided via AI.

HYPOTHESES

Hypothesis 1

H₀: There is no significant association between gender and artificial intelligence awareness. H₁: There is a significant association between gender and artificial intelligence awareness.

Hypothesis 2

H₀: There is no significant association between age and purchase decision. H₁: There is a significant association between age and purchase decision.

Hypothesis 3

H₀: There is no significant association between educational qualification and trust & privacy. H₁: There is a significant association between educational qualification and trust & privacy.

METHODOLOGY

Research design

For this study, the descriptive research design will be used. Descriptive research aims to describe certain aspects of particular phenomena without attempting to control or manipulate variables. This type of research will allow studying customer responses to the use of artificial intelligence in marketing.

Sample size and technique

It is planned to study 100 customers. The convenience sampling method will be used since it allows obtaining results quickly and easily. This method suits the current situation, where time and resources are limited. A sample of 100 customers who have experience with artificial intelligence technologies will be invited to participate. The population will consist of people of different ages, education levels, and professions.

Questionnaire design

A questionnaire will be developed and distributed among participants to collect data. Google Forms will be used to create the questionnaire. The questionnaire will have two sections – personal information and assessment of artificial intelligence in marketing. In the personal information section, respondents will be asked to provide information about their gender, age, educational qualification, profession, and online shopping frequency. The five-point Likert scale will be used to measure participants' perception of technology in terms of Awareness, Customer Experience, Marketing Effectiveness, Trust & Privacy, and Purchase Decision.

Data collection

The data collection process will be carried out by distributing a questionnaire to participants via WhatsApp, email, and social networks. Additionally, secondary data will be extracted from books, scientific articles, research journals, company reports, and the Internet.

Statistical tools

Percentage analysis, descriptive statistics, chi-square analysis, and Pearson correlation analysis will be calculated in Statistical Package for the Social Sciences (SPSS). Questionnaire results will be entered into the program and analyzed.

Limitations

Since the convenience sampling method will be used, the study results will not be fully representative of the entire population. The influence of artificial intelligence in marketing will only be studied; other areas of business will not be considered. The study will be conducted among 100 participants, and the current situation in which the study is being conducted must be taken into account.

ANALYSIS AND INTERPRETATION

This section presents the results of the percentage analysis, descriptive statistics, chi-square tests, and Pearson correlation analysis conducted on responses from 100 participants.

Table 1: Demographic Profile of Respondents

Demographic Variable	Category	Frequency	Percent (%)
Age	Below 20 years	34	34.0
	21–30 years	43	43.0
	31–40 years	19	19.0
	Above 40 years	4	4.0
Gender	Category A	47	47.0
	Category B	53	53.0
Education	Higher Secondary	5	5.0
	Undergraduate	36	36.0
	Postgraduate	35	35.0
	Others	24	24.0
Occupation	Student	48	48.0
	Private Employee	22	22.0
	Government Employee	6	6.0
	Self-employed	4	4.0
	Others	20	20.0
Online Shopping Frequency	Category 1	4	4.0
	Category 2	19	19.0
	Category 3	28	28.0
	Category 4	49	49.0

Interpretation: The statistics show that the majority of respondents (43%) are in the age category 21–30, which demonstrates that the survey covers a considerable amount of younger, tech-savvy customers. In addition, the representation of both genders is relatively balanced. Most respondents have completed their bachelor's or master's degree, and the dominant group among them is students, followed by private employees. Overall, the respondents are highly likely to shop online on a regular basis.

Table 2: Descriptive Statistics by Construct

Construct	Items	Mean Range	Std. Deviation Range
Awareness	A1–A5	3.85 – 4.26	0.809 – 0.939
Customer Experience	B1–B5	3.82 – 4.26	0.787 – 0.914
Marketing Effectiveness	C1–C5	3.85 – 4.21	0.689 – 0.880
Trust & Privacy	D1–D5	3.84 – 4.06	0.813 – 0.977
Purchase Decision	E1–E5	3.76 – 4.25	0.790 – 0.876

Interpretation: The mean scores across all items are between 3.76 and 4.26, which is relatively high on a 5-point Likert scale, and each construct's mean is considerably higher than the neutral point of 3.5. This suggests that the participants have a positive perception of AI across all five constructs. Additionally, the standard deviations are relatively low (between 0.69 and 0.98), which implies that the variation between participants' responses was relatively low as well.

Table 3: Chi-Square Test Results

Association Tested	Pearson Square	Chi-df	p-value	Result
Gender × Awareness	18.888	13	0.127	Not significant
Age × Purchase Decision	37.202	39	0.552	Not significant
Education × Trust & Privacy	37.397	45	0.782	Not significant

Interpretation: For all three tests, $p > 0.05$, meaning that the null hypothesis was accepted for all three tests. Thus, there is no significant difference in the perception of AI's awareness, purchase decision, and trust and privacy across the groups with different genders, ages, and educational levels. In other words, all three factors have a relatively limited effect on the studied variables compared to the within-group variance.

Table 4: Pearson Correlation Matrix

Construct	Awareness	Customer Experience	Marketing Effectiveness	Trust & Privacy	Purchase Decision
Awareness	1	0.461**	0.304**	0.392**	0.271**
Customer Experience	0.461**	1	0.575**	0.617**	0.621**
Marketing Effectiveness	0.304**	0.575**	1	0.612**	0.375**
Trust & Privacy	0.392**	0.617**	0.612**	1	0.476**
Purchase Decision	0.271**	0.621**	0.375**	0.476**	1

Correlation is significant at the 0.01 level (2-tailed).

Interpretation: All constructs were positively correlated with each other at a statistically significant level. Notably, Customer Experience had the strongest positive correlation with Purchase Decision ($r = 0.621$). Trust and Privacy also had a strong positive correlation with Purchase Decision ($r = 0.476$). In addition, Marketing Effectiveness had a strong positive correlation with Trust and Privacy ($r = 0.612$). Finally, Awareness had the strongest positive correlation with Customer Experience ($r = 0.461$). Overall, this means that positive changes in one factor lead to positive changes in others, which in turn lead to an increase in Purchase Decisions.

FINDINGS OF THE STUDY

Demographic Findings

- More respondents belong to the 21-30 years age group
- Gender distribution is almost equal
- Most of the respondents have completed their undergraduation and post-graduation
- Majority are students and working professionals who use online services

Findings obtained through descriptive statistics

- All the constructs had a mean score above the midpoint indicating a positive perception towards the role of AI in marketing
- Customer Experience had the highest level of agreement among the respondents
- Scores for Trust and Privacy were comparatively lower than the other constructs

Findings obtained through Chi-Square and correlation analysis

- Gender, age, and qualification have no significant influence on awareness, purchase decision, and Trust & Privacy
- All the five constructs were positively and significantly correlated with each other
- Customer Experience had the maximum influence on the Purchase Decision among the other constructs
- Marketing Effectiveness was significantly related to Customer Experience and Trust & Privacy

SUGGESTIONS

Improving Customer Awareness

- Organizations must conduct customer awareness campaigns through webinars, blog posts, and social media posts to educate them on the use cases of AI in marketing
- Customer awareness of the AI functions provided by the organization can be improved

Enhancing Customer Experience

- Continuous developments and improvements should be made on chatbots and recommenders to enhance customer experience
- Developers should make the recommenders more accurate and customer-centric
- The feedback of the customers should be used to further improve the effectiveness of AI technologies

Increasing Marketing Effectiveness

- Applications of AI should be integrated into all aspects of marketing activities in an organization
- Predictive analytics should be used to understand the market needs and trends better ahead of the competitors

Strengthening Trust and Privacy

- An organization should invest in robust cybersecurity to protect the personal data of its customers
- Data privacy policies should be made public to assure customers that their data is safe and secure within the organization

Improving Purchase Decisions

- Organizations should leverage AI technologies to offer more relevant recommendations to their customers instead of traditional marketing promotions
- AI recommenders should be developed to be free from biases and provide fair recommendations to improve the purchase decision of customers

Other suggestions

- Organizations should conduct AI training programs for their marketing employees on a continuous basis
- Small and Medium-sized Enterprises (SMEs) should consider adopting low-cost AI technologies to improve their marketing activities
- Marketers can combine AI technologies with human skills to create a balanced marketing strategy focused on satisfying customers

CONCLUSION

A conclusion can be made that this research aimed to reveal the role of Artificial Intelligence in customer marketing through the mediation of awareness, experience, effectiveness, trust & privacy, and purchase decision. From the findings, it can be concluded that customers have a positive perception of the role of AI technologies in marketing activities. Most of the participants agreed that artificial intelligence can help in providing recommendation and chatbot services, increasing customization, and improving purchase decision-making. It can be concluded from the study that there is a positive correlation between awareness, experience, effectiveness, and trust & privacy. The study also found that these variables have a combined significant effect on the purchase decision of customers. From the Chi-Square analysis, it can be concluded that there is no significant difference in the perception of participants with different genders, ages, and education levels. Artificial intelligence has become an inevitable aspect of marketing activities, and therefore, organizations can capitalize on their marketing strategies by leveraging these technologies while being ethical with consumer data.

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