Analysing the Correlation between Social Media Marketing and Consumer Purchase Behaviour

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Abstracts

This study analysis of social media marketing includes use of platforms to communicate with consumers, promote items, and influence their decisions. The process by which customers choose which products or services to purchase is known as consumer purchase behaviour. Data was provided for this study, which observed exactly how social media marketing distresses customer buying behaviour, by consuming 350 participants, 150 marketers, and 200 customers. It is understood that many social media marketing features distress and unfair customer decisions. Hypotheses remained established to observe the relationships between commitment to social media marketing content, frequency of commercials, influencer content, and various social media platforms with consumer purchase behavior. Using SPSS logistic and linear regression analyses remained engaged to evaluate these relationships. Results expose that arrangement with social media marketing comfortable and influencer content positively moves buying behaviour. Linear regression analysis verifies these outcomes, proving the power of these relationships and the importance the effect of standard buying behavior. As that, the study delivers proposals concerning the way to use social media marketing approaches to increase consumer appointment and sales. Based on these insights, the study recommends optimizing social media marketing techniques to maximize customer interaction and improve financial

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outcomes.

Keywords: customer satisfaction, online purchasing, linear regression, logistic regression, consumer purchasingbehaviour, social media marketing.

Introduction

Social media subgroups such as social networking sites (SNS) are crucial because they enable consumer interactions. The platforms have the capacity to grow into effective channels for customer and corporate involvement and communication [2]. Due to SNS's low cost, large user base, and seamless integration into daily life, businesses can leverage it to guarantee the success of marketing campaigns, increase consumer awareness, and establish virtual brand communities. Discovered that while most individuals use social media sites to offer goods and services, they prefer to use marketplace platforms to make purchases [5]. This suggests that even with the refined capabilities of the marketplace platform, social media might be able to convince individuals to make purchases on social media by offering relevant marketing content investigating the way companies sway consumers' purchasing decisions [7]. It draws attention to the connection between brand perception and loyalty and online commitment metrics such as likes, shares, and comments. User-generated content, influencer endorsements, and targeted advertising are examples of social media techniques that significantly influence consumers' interest in and confidence in businesses [8]. Social media marketing can change the way individuals behave. Guiding them through the entire purchasing process, from awareness to decision-making [9]. Numerous empirical studies have been carried out recently to investigate Social Media Marketing Agency (SMMA's) adoption in a range of settings and disciplines, as well as customer experience (CX). However, none of them cover all in a framework [10]. SMMA investigation has been showing extra technique products for the flight sector social media users, and the online shopping industry. In the meantime, studies on CX have been conducted in a variety of industries, including social media commerce, travel agencies, and blog settings. Therefore, to address the limitations of earlier research, it suggests a framework that combines SMMA and CX [13]. Any business or individual that uses the internet as a marketing medium might provide marketing services, plans, strategies, and designs that reflect the qualities of the community and show social involvement. In addition to focusing on commercial elements, marketing content on SNS should be socially conscious or encourage active user participation. It promotes strong relationships and in-depth conversations among customers. Because customers have to customize their material for each user's or community's thoughts on SNS, businesses frequently find it difficult to send out successful marketing content [6]. To foster enduring relationships with customers and encourage actions that guarantee continued prosperity, companies need to employ focused and pertinent advertising materials. Fig 1 depicts digital marketing purchasing.

Fig 1 Digital marketing purchasing

To find out the various social media marketing elements affect consumers' decision-making processes. It focuses on things such as brand interaction, platform preferences, and content engagement. It aims to determine the major factors influencing purchase decisions by examining consumer behavior on various social media platforms. In the end, the results shall provide thoughts on where to optimize social media techniques to increase consumer impact.

There are five sections to the paper. The first stage provides context for the introduction. Stage 2 is discussed in related works. Methods are explained in Stage 3. The result and discussion are shown in Stage 4. Stage 5 covers the conclusions and future scope.

Related works

Increased knowledge of social media marketing's past behavior, [4] evaluated the social media selling affects customers' feelings to purchase and discussed the function of interactions. It confirmed the suggested model by analyzing data from 343 social media users. It uses structural equation modeling (SEM). The results emphasize that social media marketing influences purchase intentions significantly and how its impacts vary depending on the sort of business. The effects of social networking, perceived value, and electronics advertising on consumer purchasing behaviors using customer trust products business [1]. It used the SEM technique for data analysis to achieve the primary research objective. A survey was used to gather data, and 223 respondents in total answered the questions. The findings supported the concept that perceived value significantly influences both consumer trust and purchasing behaviors. It discussed four aspects of social media marketing that affect customers' decisions to buy. It also sought to ascertain whether brand trust acts as a mediator in their connection [3]. To gather the information needed, a survey was given to customers. The outcomes confirmed the significance brand trust has on influencing consumer behavior social media influences what people decide to

purchase. Used a quantitative methodology, primary data from 250 participants were gathered using questionnaires [11]. 190 of the surveys were found to be legitimate. The findings demonstrated that consumers' purchasing intentions are highly influenced by social media influence and trust. Analysed the interactions through the use of a questionnaire survey, [17] it was found that buy intentions were greatly increased by favorable attitudes, subjective models, and perceived behavioral control. It helped to better understand customers' attitudes and intentions toward making purchases using social media.

 Customer evaluation to examine customers' behavior has changed over time concerning different items. A minimum of three main parts to the analysis [18] determining the quality of the customer evaluations, determining the consumer behavior quality, and comparing the evaluations. That aids in the study and comprehension of human behavioral analysis. Examined the fundamental [16] factors that, despite the shortage of financial protections against deception, influence consumers' willingness to buy lifestyle products on Instagram stores. The results validated the idea of motivated reasoning by demonstrating that perceived barriers can reduce the possessions of significant variables manipulating trust and purchase intentions to purchase through other channels. Customers feel they have unconventional control over where to purchase, only linking perceived convenience and security of transactions on social media businesses with trust [12]. To effectively engage consumers, retailers need to make use of new social media methods. Additionally, it makes research directions for the future, especially in light of social media trends changing as they affect consumer behavior. To provide professionals and scholars understanding of how social media marketing influences customer dynamics in retail businesses. It investigated [14] customers' intentions to buy sustainable products were impacted by social media usage and marketing. It unveiled a brand-new approach that combined advertising strategies, social media usage, and attitudes. Examined consumer-to-customer (C2C) interactions on social media affect the intents and actions of consumers, paying particular attention to elements such as content quality, source homophile as original, and credibility [15]. The results showed that homophile, purchase intention, perceived source credibility, and content quality have all been highly influenced by social media influencers (SMIs).

Hypothesis development

H1: Engagement with social media marketing content (ESMC) positively correlates with consumer purchase behaviour (CPB).

A positive association has been shown between ESMC and CPB, suggesting that a greater degree of engagement with marketing content is linked to a higher probability of making a purchase. It means that successful social media marketing initiatives might encourage customer involvement and influence purchasing decisions. Consequently, spending money on interesting marketing content can be a calculated move to increase sales.

H2: Frequency of social media advertisements (FSMA) positively correlated with consumer purchase decisions (CPD),

The FSMA and CPD show a positive association, indicating that increased chances of buying are associated with more frequent advertisements. It indicates that more advertisements effectively influence consumers' purchasing decisions.

H3: Positive correlation between engagements with influencer content (EIC) and consumer purchase intention (CPI)

Customers are more inclined to plan to make a purchase when they interact with influencer material more, according to a positive association found between EIC and CPI. It demonstrates how well influencer marketing works to pique consumers' interests and influence their decisions to buy.

H4: Social media platforms (SMP) positively correlated with consumer market purchase behaviour (CMPB),

SMP and CMPB have a positive correlation, indicating that more activity on both platforms frequently translates into more likely purchases. This association implies that social media marketing done right can greatly influence consumers' purchasing decisions.

H5: Social media marketing strategies (PSMC) positively correlated with CPB

PSMC and CPB have a positive correlation, suggesting that marketing initiatives that are successful increase the probability of sales. This connection demonstrates how strategically using social media can influence how consumers make decisions. Fig 2 shows the conceptual framework.
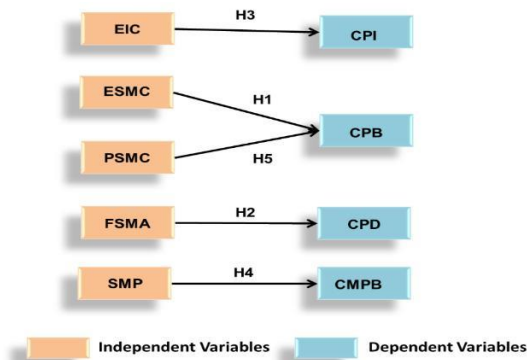

Fig 2 Conceptual framework

Methodology

Data was gathered from 200 customers and 150 digital marketers among the 350 participants that were used in the study. In responses to a structured questionnaire about variables, using Google Forms, information about focused social media marketing affects purchasing decisions

was acquired. Through the use of logistic and linear regression in data analysis, SPSS 29 evaluated whether various marketing techniques impacted consumer behaviour and increased engagement. Fig 3 shows the suggested method.
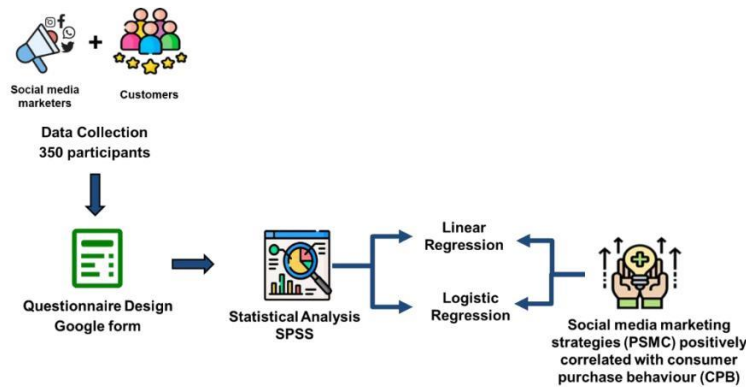

Fig 3 Suggested method

I.   Data collection

To collect data from 350 participants, including 150 marketers and 200 customers, to research the relationship between consumer purchasing behaviour and social media marketers. The dataset determination helps analyse how marketing strategies impact purchasing decisions and engagement. To identify effective approaches for enhancing consumer interactions and driving conversions. Table I depicts the demographic dataset for digital marketers. Table II shows the demographic dataset for customers.

Table I Demographic dataset for digital marketers

Category		Frequencies
Gender	Male	50
	Female	100
Age	15-18	20
	18-25	50
	25-40	80
Income Level	low	50
	medium	50
	high	50
Social Media Platforms Used	Instagram	20
	Facebook	30
	Pinterest	50
	Youtube	50
Education level	Undergraduate	100
	Postgraduate	50

Table II Demographic dataset for customers

Category		Frequencies
Gender	Male	100
	Female	100
Age	15-18	30
	18-25	70
	25-40	100
Income Level	low	30
	medium	50
	high	120
Social Media Platforms Used	Instagram	20
	Facebook	50
	Pinterest	40
	YouTube	100
Frequency of Online Purchases	1-5	100
	5-6	50
	6-7	50

II. Questionnaire design

To develop an 18-question to get feedback from customers on the way social media marketing affects their internet buying habits. Google Forms can be used to distribute the questionnaire to the customer. To comprehend their influence on purchasing decisions, it will examine important factors including cost considerations, product quality, and customer happiness. To assess the efficiency of altered social media advertising strategies as they affect consumer behaviour by analysing responses. The knowledge acquired determination service in the identification of effective marketing strategies, the enhancement of consumer interaction, and the optimization of techniques to increase conversion rates and overall marketing efficacy.

III. Statistical analysis

It explains the various statistical analyses that SPSS 29 can assume. Each section contains the normally condensed SPSS 29 output, a summary of the results, a brief explanation of the statistical test's importance, and an example showing ways to utilize the relevant SPSS 29 commands. It specifically addresses logistic regression and linear regression.

⬜ Logistic Regression

It is used to determine the probability of a dual result, such as pass or fail. Logistic regression models establish a connection between independent variables and a dependent variable that ranges from 0 to 1, in contrast to linear regression, which predicts continuous outcomes. The model assumes that there is no correlation between the residuals and the predictors and that the residuals have a normal distribution with a zero mean and constant variance. This approach is frequently used in a variety of fields, such as industry and education. In social media marketing and consumer purchase behaviour, logistic regression is a useful tool for assessing how various social media marketing approaches influence the likelihood that a customer would make a purchase. The objective is to recognize and measure the impact of marketing initiatives.

⬜   Linear Regression

It is valuable for investigating social media advertising methods and consumer purchasing behaviour. It calculates the effect of each marketing plan by examining the ways in which various marketing campaigns affect decisions to buy. It simulates the relationship between changes in consumer purchase patterns and differences in marketing efforts. It offers insights into the social media marketing elements that most successfully encourage sales. The findings can help marketers optimize their techniques to increase customer engagement and revenue.

Result and Discussion

The logistic regression analysis demonstrates that an extensive variety of social media components, some having favourable and others adverse implications, can significantly influence a range of results and consumer purchasing decisions. These results are linked to the linear regression analysis, which demonstrates the importance and strength of these correlations. It also illustrates the baseline level of consumer purchase behaviour is impacted by the negative intercept.

I.   Linear regression

The outcomes of a regression analysis by numerous self-governing variables are shown in Table III. The expected impact of every factor on the dependent variable is shown in the coefficient column. The standard error illustrates the coefficient estimates' variability. The p value indicates the statistical significance of the effect, whereas the $t-$value determines if the coefficient is substantially different from zero. Higher coefficients and significant $p-$values (< 0.001) indicate a strong and statistically significant influence on the dependent variable for variables including CPB (0.68), CPI (0.54), and ESMC (0.45). Statistical significance $(p < 0.05)$ is shown for each listed variable, suggesting that it has an impact on the model.

Table III Outcome of linear regression

Variables	Standard Error	p-Value	Coefficient	t-Value
ESMC	0.10	<0.001	0.45	4.50
FSMA	0.09	0.001	0.32	3.56
EIC	0.12	0.021	0.28	2.33
SMP	0.11	0.001	0.39	3.54
PSMC	0.14	0.004	0.41	2.93
CPB	0.08	<0.001	0.68	8.50
CPI	0.09	<0.001	0.54	6.00
CPD	0.10	<0.001	0.47	4.70
CMPB	0.12	<0.001	0.50	4.17

II.   Logistic regression

The findings of a logistic regression study, which looks at how different factors impact an outcome's likelihood, are displayed in Table IV. When the predictor variable is increased by a single value, the coefficient shows how the log odds of the result change. A straightforward explanation is given by the Odds Ratio, where values larger than 1 denote a higher probability and values smaller than 1 denote a decreased probability. The probability of the result is greatly

increased by SMP (odd Ratio = 2.66) and decreased by PSMC (Odds Ratio = 0.30). The following variables are significant($p < 0.05$): ESMC, FSMA, EIC, SMP, PSMC, CPB, CPD, and CMPB.

Table IV logistic regression

Variable	Coefficient (Estimate)	Standard Error (SE)	Z-Value	P-Value	Odds Ratio
ESMC	-0.63	0.18	-3.50	0.005	0.53
FSMA	0.45	0.22	2.05	0.04	1.57
EIC	-0.32	0.15	-2.13	0.03	0.72
SMP	0.98	0.27	3.63	0.003	2.66
PSMC	-1.20	0.40	-3.00	0.003	0.30
CPB	0.67	0.33	2.03	0.04	1.96
CPI	-0.15	0.10	-1.50	0.13	0.86
CPD	0.85	0.28	3.04	0.002	2.34
CMPB	-0.54	0.25	-2.16	0.03	0.58

III.   Discussion

The experimental findings demonstrate the significance, that social media has on the decisions made by consumers. The logistic regression study's findings show that although customer purchasing intention affects the result, variables similar to interaction with social media marketing material and influencer content have significant positive effects on purchase behaviour. The results are verified by linear regression analysis, which shows the strength of these associations through coefficients. Stronger correlations are indicated by higher coefficients, and it shows how much variance is explained by each predictor. The linear regression model's negative intercept indicates that even in the absence of predictors, projected purchasing outcomes are still influenced by baseline levels of customer purchase behaviour.

Conclusion

Based on the study, social media marketing significantly influences customers' buying decisions. Data gathered from 350 participants, 150 marketers and 200 customers indicates key areas where marketing strategies may be optimized and shows how important social media is in influencing consumer choices. The findings of the logistic regression analysis suggest that, although consumer buy intention is detrimental to these results, engagement with social media marketing and influencer content has the greatest positive impact on consumer purchase behaviour. These conclusions are corroborated by linear regression analysis, which also shows how the negative intercept influences baseline purchase behaviour and describes the direction and strength of these correlations. The results suggest that sales and consumer engagement can be greatly increased by using social media marketing methods that are effective, especially when influencers and interesting material are included. The report emphasizes in crucial it is used to social media platforms to enhance consumer connections, maximize marketing efforts, and eventually boost sales. Marketers should produce engaging social media content and work with influencers to increase favourable customer reactions and improve sales results.

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