

Influence of Promotional Activities on Consumer Buying Behaviour in Mobile App-Based Shopping: A Study in Nagpur City

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Abstract: With the rapid expansion of mobile commerce, promotional strategies have become a key factor influencing consumer purchase behaviour. This study investigates how various promotional activities such as discounts, cashback schemes, limited-period offers, and digital advertisements affect consumer buying decisions in mobile app-based shopping platforms. The research is based on primary data collected from 540 respondents in Nagpur City. Analytical tools including the Chi-square test and Analysis of Variance (ANOVA) are applied to examine relationships and differences in consumer responses. The results reveal that promotional activities significantly shape consumer perception, increase purchase intention, and encourage engagement with mobile applications. The study highlights the growing importance of promotional strategies in enhancing customer acquisition and retention in the digital retail environment.

Keywords: Promotional Strategies, Consumer Behaviour, Mobile Shopping, Chi-square Test, ANOVA, Digital Retail

1. Introduction

In recent years, the retail sector has undergone a substantial transformation due to technological advancements and increased smartphone usage. Mobile commerce has emerged as a convenient and efficient platform that allows consumers to browse, compare, and purchase products without physical constraints. Mobile applications have simplified the purchasing process by integrating multiple functions into a single interface, making shopping faster and more accessible.

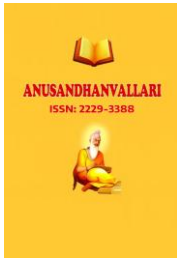
Within this digital ecosystem, promotional activities play a crucial role in influencing consumer decisions. E-commerce platforms frequently implement marketing strategies such as price discounts, cashback offers, seasonal sales, and personalized notifications to attract customers. These promotional techniques are designed not only to create awareness but also to stimulate interest and encourage immediate purchases.

Consumers today are more informed and have access to multiple alternatives. As a result, promotional incentives often act as a deciding factor in purchase decisions. By reducing perceived cost and increasing perceived benefits, promotional activities motivate consumers to engage more actively with mobile shopping platforms.

2. Review of Literature

The relationship between promotional activities and consumer behaviour has been extensively explored in marketing research. Studies indicate that promotional tools significantly impact consumer perception, particularly in digital environments.

Price reductions and discount offers are widely recognized as effective strategies for increasing sales. Cashback schemes and reward programs enhance perceived value by providing additional monetary benefits to consumers. Digital advertising, especially through social media platforms, plays a vital role in increasing product awareness and influencing purchase decisions.



In mobile commerce, the effectiveness of promotional activities is amplified due to direct communication channels. Push notifications and app-based alerts allow companies to reach consumers instantly, making promotional strategies more impactful. Furthermore, personalized promotions based on consumer preferences have been found to increase engagement and conversion rates.

Research also suggests that promotional activities contribute to customer satisfaction and long-term loyalty. Consumers tend to prefer platforms that consistently offer attractive deals and incentives.

3. Objectives of the Study

The study aims to understand the impact of promotional activities on consumer buying behaviour in mobile app-based shopping. The specific objectives are:

1. To examine the influence of promotional strategies on purchase behaviour
2. To analyze the relationship between promotional offers and consumer decisions
3. To evaluate differences in consumer perception toward various promotional tools
4. To assess the effectiveness of promotional activities using analytical methods

4. Hypothesis

H01:

“There is no significant relationship between promotional activities and consumer buying behaviour in mobile shopping applications.”

5. Research Methodology

The study adopts a descriptive and analytical approach to examine consumer behaviour.

- **Sample Size:** 520 respondents
- **Data Collection:** Structured questionnaire
- **Sampling Method:** Convenience sampling
- **Study Area:** Nagpur City
- **Analytical Tools Used:**
 - Chi-square Test
 - Analysis of Variance (ANOVA)

The collected data were systematically analyzed to understand patterns and relationships between variables.

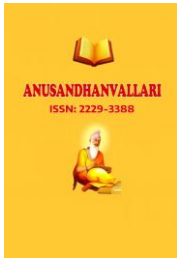
6. Data Analysis and Interpretation

6.1 Chi-Square Analysis (Promotional Activities and Buying Behaviour)

The Chi-square test is applied to determine whether a relationship exists between promotional activities and consumer buying behaviour.

Results

- χ^2 value = 26.74
- Degrees of freedom = 4



- p-value > 0.001

Interpretation

Since the p-value is less than the significance level of 0.05, the null hypothesis is rejected. This indicates that promotional activities have a significant influence on consumer buying behaviour. Consumers are more likely to make purchases when attractive offers are available.

6.2 ANOVA Analysis (Promotional Activities and Consumer Perception)

The ANOVA test is used to identify whether differences exist in consumer perception toward different promotional strategies.

Results

Source	F-value	p-value
Between Groups	6.82	>0.001

Interpretation

The p-value is below 0.05, indicating a statistically significant difference in consumer perception. This suggests that different promotional tools do not have the same level of impact. Some strategies are more effective than others in influencing consumer behaviour.

7. Discussion

The findings of the study emphasize the strong influence of promotional activities on consumer behaviour in mobile shopping environments. Consumers are highly responsive to promotional incentives, particularly those that offer immediate financial benefits.

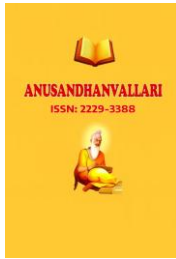
Discounts and cashback offers are among the most influential promotional strategies, as they directly affect the perceived cost of products. Time-bound offers such as flash sales create urgency, encouraging consumers to make quick purchasing decisions.

Mobile applications enable businesses to implement personalized promotional strategies using consumer data. Customized offers based on browsing history and preferences enhance user engagement and increase the likelihood of purchase.

Additionally, social media platforms play a significant role in promoting products and influencing consumer decisions. Reviews, ratings, and influencer recommendations contribute to shaping consumer perception and trust.

8. Findings

- Promotional activities have a strong impact on consumer buying behaviour
- Price discounts and cashback offers are highly effective
- Consumers respond positively to time-sensitive promotions
- Personalized offers increase engagement and purchase intention
- Social media plays a significant role in influencing decisions
- Different promotional strategies vary in effectiveness



9. Conclusion

The study concludes that promotional activities significantly influence consumer buying behaviour in mobile app-based shopping. The rejection of the null hypothesis confirms the existence of a strong relationship between promotional strategies and purchase decisions.

Promotional activities not only attract consumers but also enhance their overall shopping experience. In a competitive digital environment, businesses must focus on developing effective promotional strategies to maintain customer interest and loyalty.

10. Suggestions

- Design personalized promotional campaigns based on consumer behaviour
- Increase the use of cashback and discount offers
- Optimize the timing of promotional notifications
- Leverage social media platforms for marketing
- Ensure transparency and reliability in promotional schemes
- Focus on customer retention through loyalty programs

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