



An Analysis Of Digital Payment Methods And Fintech Innovations In Raipur And Durg Cities Of Chhattisgarh

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ABSTRACT

The study examined consumers from Raipur City and Durg City who prioritize cash on delivery the most, despite the growing online payment options, still prefer cash on delivery.. Digital payments and fintech innovations are the new systems of today's era. They are the Jockeys of presenting financial transactions to people in a faster, safer and more convenient way. Digital payments have made their presence felt everywhere today. This means that payment and receiving of money happens electronically without using cash. In today's era, there is no need to carry cash in our pocket. If we have our mobile phone with us, we can easily make QR code payments using it. UPI, mobile wallet, debit and credit cards, internet and mobile banking, QR code payments, buy now pay later services play a big role in digital payment methods. When fintech innovations stand with digital payments, it completely develops the entire technology. Financial services have also improved significantly in today's era through digital innovation, which includes UPI, instant payments, digital wallets and super apps, blockchain and cryptocurrency, AI-based fraud detection, robo-advisors for investment, peer-to-peer lending platforms, digital insurance platforms, etc. It has also been seen many times that people shop online and order goods and also make digital payments, due to which there is a growing sense that there is still no complete trust in digital payments, hence people prefer cash on delivery in response. Thus we may conclude that lower trust in digital payments significantly increase reliance on Cash on Delivery...

1. INTRODUCTION

E-commerce is growing rapidly in India but payment preference differs for various reasons which are seen demographically in Raipur and Durg city . The survey has revealed evidence that there is a strong preference for cash on delivery in Raipur and Durg cities. To understand this point, an attempt has been made to compare cash on delivery and digital payment to find out why people of Raipur and Durg city still give so much importance to cash on delivery while digital payment helps e-commerce, promotes innovations and e-commerce helps companies improve trust, reduce costs or expand digital payment adoption.

2. OBJECTIVES

1. Measure the proportion of online purchases paid by cash on delivery versus online payment methods in Raipur and Durg cities.
2. Identify socio-demographic factors associated with preferring cash on delivery.
3. Test whether trust in delivery and perceived security of online payments significantly predict cash on delivery preference.
4. Provide recommendations to increase secure online payment adoption based on findings

3. LITERATURE REVIEW

According to G Bandi (2019) , using transaction-level data from a large Indian online fashion retailer and exploiting the 2016 demonetization shock, the authors show that customers who switched from cash-on-delivery to digital payments continued to buy at the same frequency but spent more per order and returned fewer items. The paper frames COD as both.

a facilitator of online adoption in low-digital-penetration settings and an operational cost for sellers. This study is a strong empirical piece demonstrating that payment mode affects basket size and return behaviour — a useful benchmark when discussing COD’s demand-side and supply-side implications.

Using US consumer payment diary data, Stavins examines how price incentives (discounts or surcharges) influence consumers’ payment choices. The study finds that consumer payment preferences are strong, but price incentives can shift behaviour in some settings. For an India-focused COD discussion, the paper supplies useful theory and evidence on merchant-side levers (discounts, surcharges) that could be used to steer customers from COD to prepaid methods.

The authors Chawla and Kumar (2022) highlight that COD remains a widely used option in India because it reduces perceived transaction risk for buyers and functions as an inclusion mechanism where digital payment trust and access are low. This paper helps situate COD not only as a payment choice but as a response to regulatory and trust gaps in the market.

Gupta analyses COD’s role in building early trust for Indian e-commerce, while also detailing its operational and cost challenges for sellers: higher return and failed-delivery rates, cash handling, and reconciliation costs. The article is concise and practical; it is useful when we want an Indian-perspective review of the trade-offs between consumer adoption benefits and merchant-side burdens.

Based on a survey (n ≈ 310) and literature synthesis, Kandepu finds that time and convenience are strong predictors of COD preference and that COD positively affects initial adoption of online shopping among hesitant buyers. The paper also emphasizes practical operational issues for platforms and logistics partners.

As per stated, V. S. Vandiny applying the Technology Acceptance Model and PLS-SEM, this conference paper finds that personal factors, perceived usefulness, perceived ease of use, promotion, and social factors all drive COD choice, with personal factors being dominant. The study gives a structured model it can adapt when building survey constructs (trust, perceived ease, promotion effects) for Raipur–Durg study.

R. Chakravorti analysis this recent India-specific empirical paper uses a multinomial logit model on primary survey data to show demographic differences in payment choice, and that consumers are more hesitant to use digital payments on domestic platforms compared with established international marketplaces. This piece is directly relevant to your region-level study because it shows how platform trust and perceived platform reliability condition payment preferences.

3. Hypothesis

Ho1 : There is no considerable difference between to find out the proportion of online purchases paid by cash on delivery versus online payment methods in Raipur and Durg city

Ho2 : There is no considerable difference between lower educational level is associated with higher likelihood of choosing cash on delivery.

Ho3 : There is no considerable difference between Lower trust in online payments is associated with cash on delivery preference.

Research Methodology

In the research methodology, the total respondents sample size is 200 where 100 is taken each from Raipur City and Durg City. In measurement, payment preference is measured using a binary scale categorizing COD =1 and online payment =0. Education level is categorized and converted into a mean COD preference score and trust in online payment is measured using a likert scale and converted into mean trust scores. The statistical tools used here are Chi-square test for regional comparison and independent sample t-test for comparing educational level and trust level and level of significance is taken as 0.05% . These findings are further contextualized through reviewing secondary data collection reports from general or online resources.

Primary Data is collected from online surveys using tools like google forms whatsapp etc whereas secondary data is collected through research journals articles, textbooks , government publications and reports from institutions and organizations.

4 Data Analysis and Discussion

Table 4.1

Binary Classification of Respondents by Education Level, Trust, and Payment Method (n=200)

| Variable Category | Group | COD (1) | Online Payment (0) | Total | Mean COD Score | Mean Online payment score |
|-------------------|-------|---------|--------------------|-------|----------------|---------------------------|
|-------------------|-------|---------|--------------------|-------|----------------|---------------------------|



| | | | | | | |
|---------------------------------|-----------------------------|-----------|-----------|------------|-------------|-------------|
| Education Level | Lower Education (1) | 42 | 58 | 100 | 0.42 | 0.52 |
| | Higher Education (0) | 26 | 74 | 100 | 0.26 | 0.74 |
| Trust in Online Payments | Low Trust (1) | 48 | 52 | 100 | 0.48 | 0.52 |
| | High Trust (0) | 21 | 79 | 100 | 0.21 | 0.79 |

Here, Binary scale method has been used to measure payment preference where cash on delivery is coded as one and online payment is coded as zero accordingly COD score represents proportion of respondents preparing cash on delivery while online payment score obtains complementary of the COD mean both payment modes are easily visible and transparent binary coding logic is clearly explained here table aligned head test interpretation so that there are no missing values and no confusion is created

Table- 4.2 :

Hypotheses Testing and Result

| Hypothesis No. | Null Hypothesis Statement | Test Applied | Key Statistics | p-value | Result |
|-----------------------|--|----------------------------|-------------------------|----------------|-----------------|
| H₀₁ | There is no significant difference in the proportion of online purchases paid through Cash on Delivery and online payment methods between Raipur and Durg cities | Chi-Square Test | $\chi^2 = 1.38, df = 1$ | 0.239 | Accepted |
| H₀₂ | There is no significant difference in Cash on Delivery preference between | Independent Samples t-Test | $t = 2.87, df = 198$ | 0.005 | Rejected |



| | | | | | |
|-----------------------|---|----------------------------|--------------------|---------|-----------------|
| | lower and higher educational level consumers. | | | | |
| H₀₃ | There is no significant difference in Cash on Delivery preference between consumers with low and high trust in online payments. | Independent Samples t-Test | t = 4.16, df = 198 | < 0.001 | Rejected |

Reasons,

H₀₁

Accepted

Because the two tail p-value (0.239) which is greater than 0.05% level of significant, indicating no statistically significant regional difference. Payment preferences in Raipur and Durg are statistically similar; regional location does not significantly influence choice of COD or online payment.

H₀₂

Rejected

Because the two tail p-value (0.005) which is less than 0.05 % level of significant, showing education level significantly influences COD preference. Lower-educated consumers show a significantly higher mean COD score (0.42) than higher-educated consumers (0.26), indicating education affects payment choice.

H₀₃

Rejected

Because the two tail p-value is (0.001) which is less than 0.05 % level of significant confirming that trust in online payments strongly affects payment choice. Consumers with lower trust in online payments have a much higher COD preference (mean = 0.48) compared to high-trust consumers (mean = 0.21).

4. CONCLUSION :

This hypothesis testing result indicates that regional difference does not significantly affect online payment preference in Raipur and Durg cities, however education level or trust in online payment system plays a decisive role in determining cash on delivery usage. Lower educational attainment and lower trust in digital payment significantly increase Reliance on cash on delivery and leading to rejection of COD. It is found that people do make online payments but are not doing it till the stage where it should be done in out side countries because there is a trust issue in this Education attainment is happening people do not have much awareness, people do not have much trust in digital payments, hence even if they shop online, they choose cash on delivery option. It has also been seen many times that people shop online and order goods and also make digital payments, due to which there is a growing sense that there is still no complete trust in digital payments, hence people prefer cash on delivery in response. Thus we may conclude that lower trust in digital payments significantly increase reliance on Cash on Delivery, leading to rejection of H₀₂ and H₀₃.

Contribution of the Study for the Society

This study contributes to society in the following ways:

Improves Digital Financial Literacy Planning

The results help governments and financial institutions design education-based digital payment awareness programs.

Strengthens Consumer Trust Frameworks

By identifying trust as a decisive factor, the study encourages fintech firms to improve security transparency and customer assurance.

Supports Inclusive Digital Growth

Understanding COD dependence helps integrate hesitant consumers into the formal digital economy.

Regional Policy Relevance

Provides evidence from non-metro cities, supporting balanced digital development across regions.

Academic Value

Demonstrates the combined use of chi-square and t-test in consumer payment behavior research.

Scope for Future Research

Include income and age variables Income influences access to smartphones, bank accounts, and digital infrastructure, while age affects technological familiarity and risk perception. Use longitudinal data where the same respondents are observed over an extended period. Expand to other cities Future research can be expanded to include **other cities, districts, or states**, including both metro and non-metro regions.

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