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## “THE STUDY ON DIGITAL PAYMENT IT’S ISSUES AND SECURITY”

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### Abstract:

A country needs money supply for economic activities to be carrying out, trade and commerce to quench demand and supply of goods and services. For such exchanges to continue payments of money and settlements of dues and charges need to be carried out. The better, more convenient and reliable the payment and settlement of a country or an economy is, the better is the economic efficiency of that country. The payment and settlement system comprises of various arrangements that is used to systematically, efficiently and securely transfer money/currency, cheques, demand drafts, and money through various electronic channels. In most countries the Central Bank is generally the regulatory authority and is responsible for development of the National Payment System. In India, Reserve Bank of India is the regulatory authority and is in charge of driving the development of our National Payment and Settlement System. The highest policy making body on payment System in our country is the Board for Regulation and Supervision of Payment and Settlement Systems (BPSS), a sub-committee of RBI and the regulation is done in accordance with the Payment and Settlement Systems Act, 2007 (PSS Act). In the research paper critical issues about e-payment systems are discussed ranging from the preferred mode of payment, mobile payments and security measures used in e-payment systems to cash payments.

**Keywords:** e-payment systems, mode of payment, mobile payments, cash payment, national payments system

## Introduction:

Reserve Bank of India took an initiative in the early 90's and focused on technology-based solutions for the improvement of the payment and settlement system in India. It does its best to encourage alternative and modern system of payments, thus bring security and efficiency to the payments system and making the whole process easier for banks.

The successful growth of Indian banking sector calls for innovation and adoption of electronic payments to enhance the banking system. Introduction of e-payments in India has brought in an era of unprecedented growth in the banking sector.

Reserve Bank of India is playing a decisive role in mainstreaming e-payments in India by making it compulsory for the banks to route their high value transactions through Real Time Gross Settlement (RTGS) and also by introducing National Electronic Funds Transfer (NEFT) and National Electronic Clearing Services (NECS), thus encouraging individuals and businesses to switch to electronic methods of payment. E-payments in India have been growing at over 60% for the last few years.

The usage of Paper Based systems/instruments such as cheques, demand drafts, etc. account for almost 60% of the total non-cash transaction in India by volume. But when compared in terms of value, it only accounts for around 11%. The share of paper-based transactions has steadily been decreasing with time, whereas the electronic and other modes keep gaining popularity due to their obvious advantages. The Indian government (like most other governments in developed and developing nations) is also promoting online and electronic means of payments in favour of paper-based ones, as the process there is conducted in real time, easy to track and there is very little delay.

The Reserve Bank of India continually strives towards providing more secure, convenient and efficient payments systems in the country. Reserve Bank of India continuously works towards upgradation of the existing systems and pushes for innovation and development new ones, thus slowly and steadily revamping the payment and settlement facilities in India.

## LITRETURE REVIEW:-

[A study on digital payments system with perspective of customer's adoption by Dr.M.Kavitha, Dr.k.Sampath Kumar](#)

This article presents a study which focuses on customer preference towards payment gateways with respect to charges and risks and effectively analyzed the impact of demographic variables on the usage of payment gateways. The paper highlighted that in India there's a major risk of the emergence of a digital split as the poor are excluded from the internet and so from the financial system. Here we analyzed that customer preference was falling well on Paytm. Moreover, as customers are merely looking for more number of offers and less no. of obstacles while using the payment gateways, the service providers have to look upon the same and they need to update themselves in order to seek more attention from customers and merchants.

## Effects of Demonetization on Digital Payment System in India by Tanaya Santani

According to the article, she found the impact of demonetization on the digital payment system in India. There were many payment methods rising after demonetization in India. She studied that growth of payment method before and after of demonetization. The transactions of e-wallet are rapidly increasing in India. It also includes the many payment method which were used after demonetization.

## FraudJudger: Real world data oriented fraud detection in digital payment platform by Ruoyu Deng and Na Ruan

According to that it includes fraud users detection model Fraud Judger on real world digital payment platforms. Fraud Judger can learn features of users from original features and classify users based on learned features. They experimented with the real word dataset and gave the result of fraud judge has good performance in fraud detection. It includes broad prospects of deep learning in fraud detection.

## A study on usage of e-payment for sustainable growth of online business by Prof. Sana khan and Ms.Shreya Jain

According to the article they found the many respondents who are using e payment for purchasing products online on the basis of age purpose of usage and various problems faced by them in which it affects on business growth. They are trying to take advantage of various digital platforms to expand the business growth. At the same time companies get the necessary development in their business and tracking the customer's feedback, perceptions. It also includes the biometric along with internet of thing and artificial intelligence.

### **Problem statement of the study**

The study about the use of E-payments methods and their security among users

### **Objectives of the study**

1. To find out the preferred mode of payment.
2. To understand how often mobile payments were used.
3. To understand the security measures that can be used in E-payment methods.
4. To find out whether E-payment system is better than cash payment?

### **Research methodology**

#### **Research design**

- ❖ Descriptive research design

#### **Sources of data**

- ❖ Primary and secondary data was used. Primary data was collected from university students. Secondary data was collected from websites and scholarly articles.

### Data collection method

- ❖ Google sheets

### Sample size

- ❖ 153 responses from all the age group within Gujarat

### Sampling method

- ❖ Systematic and Cluster sampling method

### Sampling frame

- ❖ University students
- ❖ Working professionals

### Data collection instrument

- ❖ Questionnaire

### Hypothesis

Null Hypothesis (Ho):

The proportion of e-payment system adoption in Gujarat state is same as in India.

Alternative Hypothesis (Ha):

The proportion of e-payment system adoption in India is more than that of Gujarat.

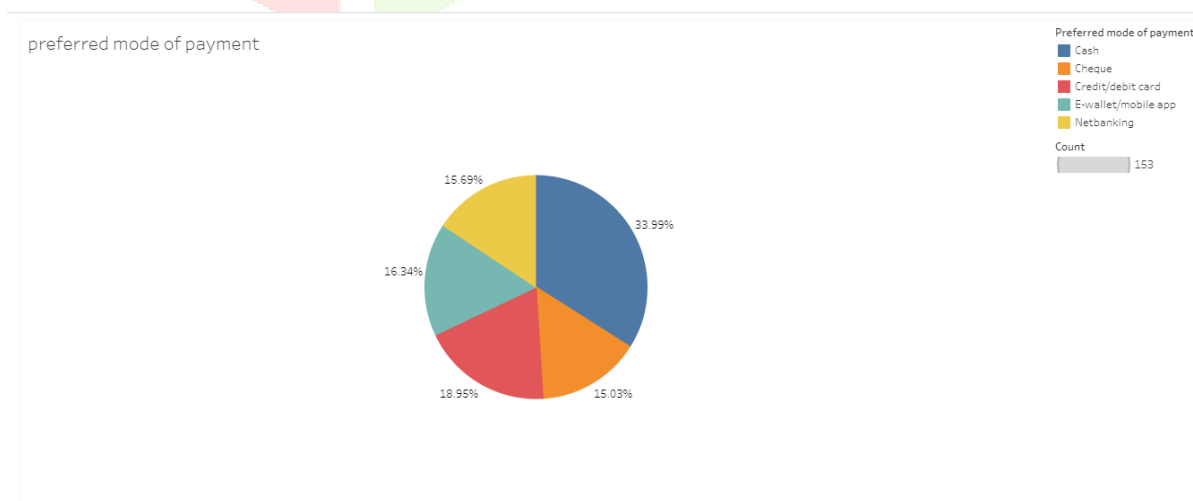
Null Hypothesis is rejected

The inference is adoption of e-payment in India is higher than Gujarat.

### Data analysis and interpretation

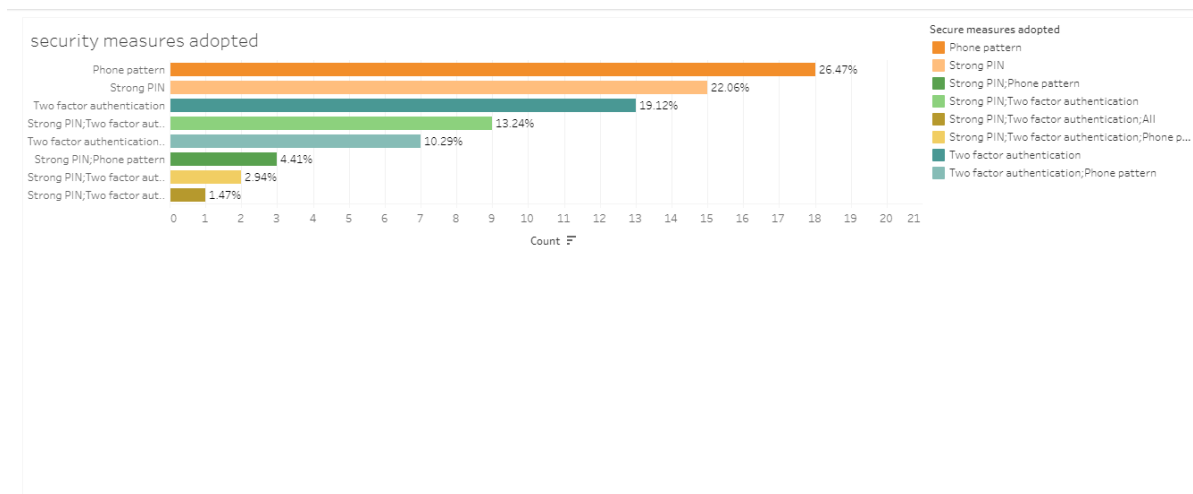
According to the objectives these are the data analysis and its interpretation:

When it comes to finding out the preferred mode of payment mode of payment,



**Figure 1:** E- payment Preference

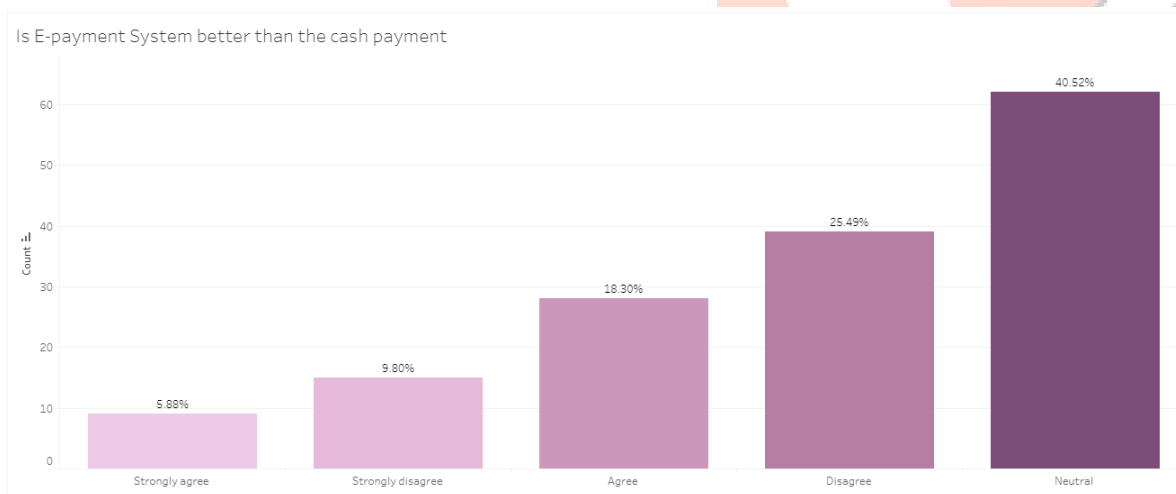
33.99% were in favour of cash payment, 15.03% chose payment by cheque, 18.95% chose credit/debit card payment, 16.34% preferred E- wallet/mobile app payment and 15.69% chose net banking, as shown in figure 1.



**Figure 2: Security Measure Taken**

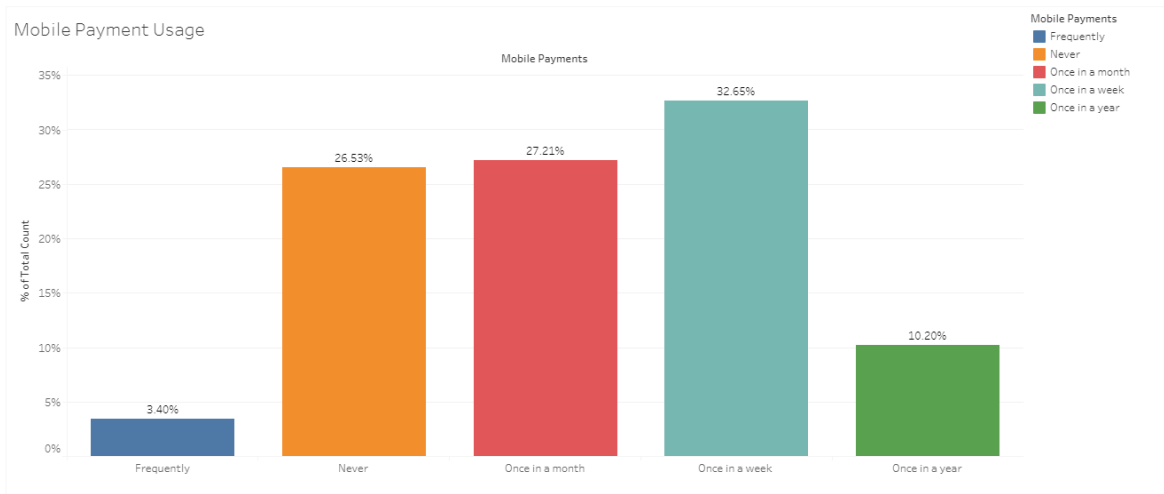
The following are the security measures adopted for E-payment,

26.47% were in favour of phone pattern, 22.06% preferred strong PIN, 19.12% chose two factor authentication, 13.24% chose strong PIN and two factor authentication, 10.29% favoured two factor authentication and phone pattern, 4.41% chose strong PIN and phone pattern, 2.94% chose strong PIN, two factor authentication and phone pattern, 1.47% chose strong PIN and two authentication, as shown in figure 2.



**Figure 3: E- Payment versus Cash Payment**

When it comes to whether E- payment system is better than the cash payment, 5.88% strongly agreed that e-payment is better, 9.80% strongly disagreed that e-payment is better, 18.30% agreed that e-payment is better, 25.49% disagreed that e-payment is better ,40.52% were neutral, as shown in figure 3.



**Figure 4: Mobile Payments**

When it comes to how often mobile payments were used, 3.40% frequently used mobile payments, 26.53% never used mobile payments, 27.21% used mobile payment once a month, 32.65% used mobile payments once in a week and 10.20% used mobile payments once in a year, as shown in figure 4.

### Findings

- The preferred mode of payment is cash.
- Phone pattern was the mostly used security measure adopted for E- payment.
- The respondents remained neutral as to which mode of payment was better between E-payment system and cash payment system.
- Strong PIN, two factor authentication and phone pattern were the security measures commonly used by the students.
- Mobile payments were often used once in a week.

### Conclusion

Despite the use of cash payment as the preferred mode of payment among the people, the use of e-payment systems and methods will continue to grow gradually in the foreseeable future. The use of strong PIN, two factor authentication and phone pattern remain the most popular and secure security measures among the people.

### Reference

<https://www.bankexamstoday.com>

[https://en.wikipedia.org/wiki/Payment\\_and\\_settlement\\_systems\\_in\\_India](https://en.wikipedia.org/wiki/Payment_and_settlement_systems_in_India)

<https://www.grandviewresearch.com/industry-analysis/digital-payment-solutions-market>

<https://www.bankbazaar.com/>