

Investigating Unified Payments Interface Linked Applications: Analyzing Preference of Generations

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A b s t r a c t

Mobile commerce has become the primary payment mode for online shopping and digital transaction in India. Technology survey generation is influenced by the Unified Payment Interface to make the transactions between peer-to-peer and peer-to-merchants. It is focused on stealing the market share of net banking. The researcher would like to examine the Unified Payment Interface preferred by generations and also investigate the factors influencing the generations in preferring particular applications for digital transactions. The study is descriptive in nature and used a structured questionnaire to collect the response from the respondents using snowball sampling techniques. The researcher used corresponding analysis and regression analysis to evaluate the relationship and impact level among the variables through the SPSS package. The study used the following factors to measure the impact level such as perceived security, ease of use, facilitating condition, behaviour intention, social influence and so on. Among these factors, security, facilitating conditions, and perceived ease of use have a positive impact on the consumers preferring the UPI-linked applications. Hence the service providers should improve the quality as well as the awareness level of the consumer to serve the generations equally.

Keywords: UPI, Digital Transaction, IMPS, VPA, Mobile Banking Applications.

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1.1 INTRODUCTION

There is rapid growth and development in the perspective of E-commerce in India. There is certainly a considerable span for the development from fundamental access to the internet to the advancement of online payment methods. Internet diffusion leaves three out of four Indians without access. In order to prop up and extend the scheme, the government promoted digital India and skill India to progress the habit of internet facilities. This, in turn, figured the growth of the Indian economy through digital transactions. The implementation and consciousness increased after the demonetization of currency notes in the year 2016. The level of responsiveness and the preference for paying and buying online increased rapidly. The folks were aware of various modes of digital transactions such as NEFT, RTGS, UPI and Mobile Banking Applications such as Google pay, phonepe, Paytm and other banking applications.

Technology survey generation, highly influenced by the Unified Payment Interface, has granted the citizens of India to transfer money from one bank account to another bank account on a regular basis. The Unified Payment Interface system was developed by NPCI and linked with the Government of India to develop the economy as a faceless, paperless and cashless payment system. In order to make banking services more accessible to wider spectators, the Unified Payment Interface provides services such as sending, receiving and requesting money through a Virtual Payment Address.

Early on, banking services required host details about the receiver bank accounts, whereas UPI transactions require only a VPA address or mobile number or debit card number if the receiver bank is linked with UPI. This will make ease of access and gather acceptance from the public. The UPI-enabled platform has limited its services upto one lakh rupee per day for ten UPI transactions per day. It is a real-time payment system basically done through IMPS and also allows the user to pay bills and recharge through various applications. In a few years, the economy will witness the development of UPI and moderate the generations' intention through offerings. Hence the researcher would like to investigate the most preferred UPI platform for Digital transactions focusing on generations.

1.2 OBJECTIVE OF THE STUDY

- To understand the preference of the generations in using UPI-linked applications.
- To analyze the factors influencing the consumer preference of choosing the applications.

1.3 HYPOTHESES

- UPI linked applications do not have an association with the age group of the consumers for digital transactions.
- UPI linked applications do not have a significant difference with the factors influencing the consumer in preferring the application for digital transactions.

1.4 REVIEW OF LITERATURE

Drew M. Anderson *et al.* (2017) studied the electronic payment systems considering the consumers vulnerable. The researcher aims to evaluate the characteristics of the population by the shift and administration data on social security in electronic payments. The study reveals that most of the consumers were unaware of electronic payments because they are small in number and have experienced only payment cards, and lack tech knows how. The shift from physical cash to electronic payments does not clearly explain the increasing value of banking. However, certain consumers updated to e-payments but still, but it is a slow process among the most valuable householders.

Abhipsa Pal *et al.* (2017) examined the security of mobile payment. The researcher analyzed the risk factor associated with the mobile phone payments system. The study identified that the confidentiality issue is the influencing factor in mobile payment systems except for USSD. However, risk factors high lights the user's adoption of new technology. The service providers concentrated on reducing the risk, but still, security is a concern. There are serious privacy concerns with the services, and the application demands the user for private data without providing clear information about why it is required. So certain concerns become a drawback for these technologies, which were unable to adopt by the users in a fully trusted form.

Aditya Samant and Mukesh Kumar (2016) emphasized cashless transactions enabled by technology and improvement in the quality of services. The researcher found that while people are getting contented with cashless payments, some attitude issues are holding back many from the implementation of the newer platforms. The findings also suggest that the usage behaviours of those who have taken to cashless modes could be sensational towards security threats.

Deepak Mathue (2016) studied the awareness about security in the E-Payment system. The researcher would like to explain the awareness about the security provided in EPS. The result reveals that it is impossible to suggest which payment systems are best in security and privacy policy. Some EPS modes are similar and different in the same minor details. The consumer should have technological knowledge before updating the use of any electronic payment system.

Elisa Tauilla (2015) studied the challenges faced while adopting mobile payment in Thailand. The researcher evaluates the key drivers of mobile payment adoption along with the challenges faced in the technology in Thailand. The researcher reveals that advertising technology will increase the usage of electronic and mobile payments. It also involves the trustworthiness of users and industry stakeholder who plays a major role in collaborating on infrastructure development and policy modification to facilitate acceptance of the mobile payment system. An increase in security and privacy policy will definitely increase the trust and confidence level and using mobile payment and electronic systems.

Akhavan Saffar and H. Mohammad Zadeh Moghadam (2012) examined the quality of the services provided through online portals of electronic banks in the country. The researcher found that factors such as trustworthiness, accessibility, security, accountability, and cash performance positively influence the satisfaction level of the consumers, whereas they are non-user-friendly due to technological changes and lack of information influence the negative aspects in adoption as well as the quality of the service rendered through electronic banking.

1.5 ANALYSIS AND INTERPRETATION OF DATA

1.5.1 CORRESPONDENCE ANALYSIS

H_0 : There is no association between the UPI-linked applications and the age group of the consumers for digital transactions.

Correspondence Table						
UPI link applications	Age Group					Active Margin
	Below 18	18-25 Yrs	25 -32 Yrs	32-40	Above 41	
Phonepe	0	0	4	0	0	4
Paytm	0	1	0	3	0	4
Bhim	0	0	0	0	1	1
Googlepay	3	0	10	4	1	18
Sbi Pay	0	0	2	1	0	3
Active Margin	3	1	16	8	2	30

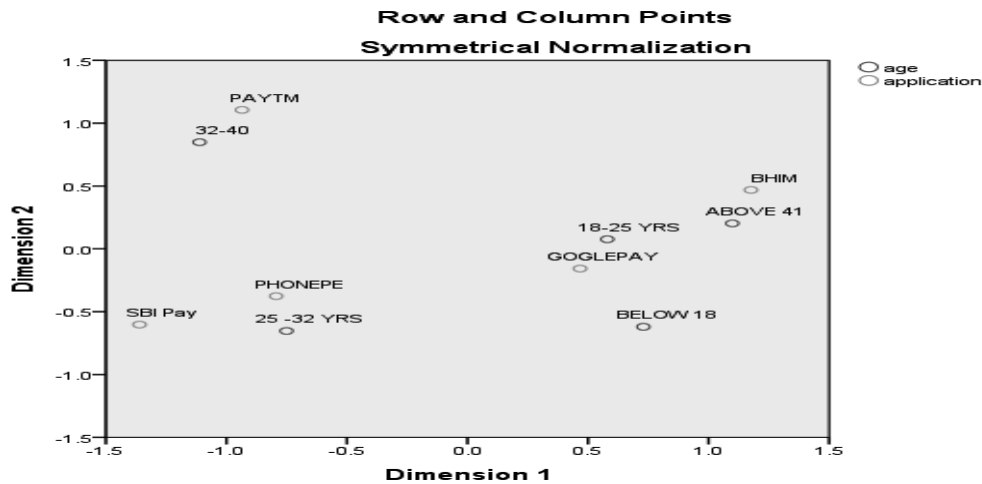
Sources: Primary Data

Correspondence analysis is a descriptive technique intended to examine two-way frequency cross-tabulation. The tables contain measures of correspondence between rows (Age Group) and columns (UPI link applications). The above table shows the preference of UPI link applications among the generations for digital transactions.

Summary								
Dimension	Singular Value	Inertia	Chi Square	Sig.	Proportion of Inertia		Confidence Singular Value	
					Accounted for	Cumulative	Standard Deviation	Correlation 2
1	.718	.516			.522	.522	.149	.955
2	.672	.452			.458	.981	.115	
3	.138	.019			.019	1.000		
Total		.987	29.600	.020 ^a	1.000	1.000		

a. 16 degrees of freedom

Correspondence Analysis is used to test for the total variance explained, along with the associated probability through chi-square statistic. Hereby the summary table shows whether the model is fit. In that case, the model is significant at .020 which is lesser than the alpha of 0.05 and a chi-square value of 29.600.



A biplot displaying the dimensions score for both age group and UPI linked application.

The score compares the dimensions across the variables. Correspondence analysis is a standardized measure of the relationship between the variables. Here we see that the age group between 18 years to 25 years and below 18 years prefer to use google pay UPI linked applications, 25 years to 32 years prefer SBI pay and phonepe. Whereasthe age group between 32 and 40 years prefer Paytm for transactions.

1.5.2 REGRESSION ANALYSIS:

H_0 : There is no significant difference between UPI linked applications with the factors influencing the consumer in preferring the application for digital transactions.

Model Summary									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.742 ^a	.550	.347	1.00256	.550	2.715	9	20	.030

a. Predictors: (Constant), FC, SI, Trust, BI, TC, PE, EE, EA, PS

The above table shows the overall model fit for the analysis of data. R-value is .742 which shows the correlation between the factors and UPI linked applications.

ANOVA ^a						
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	24.564	9	2.729	2.715	.030 ^b
	Residual	20.103	20	1.005		
	Total	44.667	29			
a. Dependent Variable: application						
b. Predictors: (Constant), FC, SI, Trust, BI, TC, PE, EE, EA, PS						

The result of the ANOVA test reveals that $f(20, 9) = 2.715$, $p = 0.030$ which is less than the significant value of 0.05. Hence it shows the applications and the influencing factors have a positive impact on generations to prefer the application for digital transactions.

Coefficients						
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	17.923	7.030		2.549	.019
	Trust	-3.923	2.568	-1.286	-1.528	.142
	PS	4.462	1.581	2.180	2.823	.011
	PE	-2.769	.777	-1.330	-3.564	.002
	TC	.769	.385	.634	1.998	.059
	EA	1.026	1.659	.412	.618	.543
	EE	.538	1.373	.267	.392	.699
	SI	-.795	.636	-.432	-1.250	.226
	BI	.769	.615	.388	1.250	.226
	FC	-3.000	.868	-1.441	-3.455	.003
a. Dependent Variable: application						

The coefficient tables explain the impact level of the variables. The result shows that perceived security, ease of use and facilitating conditions influence the preference of choosing the application linked with the Unified Payment Interface for digital transactions.

1.6 FINDINGS OF THE STUDY

- The majority (70%) of the respondents were male.
- Most (56.7 %) of the respondents belong to the age group of 25 years to 32 years and their monthly income lies between 20001 to 30000.
- The correspondence analysis test reveals that UPI linked applications have a positive association with the age group of the consumers for digital transactions.
- Regression analysis estimates the relationship between UPI linked applications and factors. Among them, perceived security, ease of use and facilitating conditions have a significant impact on the applications used for digital transactions.

1.7 SUGGESTIONS

The Government of India and NPCI have to develop an awareness programme for the adoption of digital transactions among all generations. The providers should focus on upgrading the system of safe and security in order to gain acceptance from generation X.

1.8 CONCLUSION

Unified Payment Interface provides features such as sending, receiving and requesting money, helping to create own Virtual Payment Address and providing a quick response Code to scan for payments. The National Payments Corporation of India (NPCI) and the Government of India jointly created this system in order to develop the economy to digitalize all the activity and the system to be a competitor for former countries. The researcher investigated, and the result reveals that security and simplicity factors influence the preference of using particular UPI inked applications. Among the applications, the google pay app is preferred most by the consumer for digital transactions. Hence the service providers have to consider the factors that will motivate the users to process their transactions easily and conveniently.

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