

A Study on Tourist Perception Towards Usage of Mobile Wallet

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Abstract: The digital revolution changed the way this world functions in more ways that anyone could imagine. From being able to buy a small chocolate to paying for cars, almost anything can be bought using a mobile phone, thanks to Mobile Wallets. We are living in extraordinary times where revolution and evolution is rampant. Survival of businesses no longer depends on meeting demand but meeting the demand ensuring its customer's utmost ease. Coming to talk of ease, one of the most revolutionary technologies that has made lives easier is Mobile Wallets and thus, they've become a large part of our daily lives. The proposed research aims to study the perception of tourists towards the usage of mobile wallets or Mobile Wallets. The industry of tourism is one of the largest in India, which has contributed more than \$247 billion U.S.D to the country's GDP in 2018-19 (a study by Statista) and is expected to top a whopping \$500 billion U.S.D by as close as 2029. Though the recent times have shown signs of a slow economy and post the pandemic, many countries have also declared recession, the tourism industry has shown positive signs and there are no signs of slowing down which means that for the people, it has been creating jobs and thus providing indirect and direct employment. In 2016, post demonetization, usage of Mobile Wallets saw a huge demand. With a cash crunch for 1.3 Billion people, Mobile Wallets & card payments seemed to be the most viable option. Companies like Paytm saw this is an opportunity and cashed in on it. A report by economic times suggested that Mobile Wallet transactions saw 40 times increase in volume in the past five years which is proof that the usage of mobile wallets has indeed increased overtime and why not? Mobile Wallets reduce the hassle of looking for change, they're a safe way of transacting and given the fact that people are trying to avoid any form of contact, it is a great way to make payments without physically touching anything or anyone.

Keywords: travel and tourism, mobile wallets, tourist, perceptions, technology, digital payments

1. Introduction

India was one of the first developing countries to witness the digital revolution thanks to demonetization in 2016 by the government. (Sobti, 2019). Something that changed the way money exchanged hands. Developed countries like the USA, UK, Germany e.t.c saw this revolution much before and it has subsequently changed the way their economy functions in more ways that anyone could imagine. One of the most revolutionary technologies that comes to mind when we think of ease and has made lives easier is Mobile Wallets and thus, they've become a large part of our daily lives.

In India, the proposed research aims to study the perception of tourists towards the usage of mobile wallets or e-Wallets. We will find out how comfortable Indian tourists are in using Mobile Wallets while travelling, what their preferred mode of payment is while travelling and also try to establish what the scope of Mobile Wallets are when it is the tourism industry. The contribution of travel and tourism's to the GDP of their countries was approximately \$2.9 trillion U.S.D (Lock, 2020) in 2019 and these statistics are only for the direct contribution, the indirect contribution of the industry remains unknown. Travel and Tourism is also one of the largest generators of employment, not to forget, it is, indeed an extremely important source of foreign exchange for India.

In 2020, around 39 Million jobs (*India Brand Equity Foundation*) were generated in the travel sector in India which accounts for almost 8% of employment generated in India. These numbers are expected to rise by 2% too and in addition, the total could as far as 52.3 million jobs by 2028. This reflects the scope of travel and tourism in the diverse country of India. According to World Travel & Tourism Council, India was ranked number 10 among 185 countries for travel and tourism's total contribution to GDP in 2019. Also, in 2019, the overall contribution of travel and tourism to the GDP was 6.8% of the total economy, which amounted to \$194.30 billion U.S. Dollars. The global size of the Mobile Wallet Market went up to \$100 billion USD in 2019 (*Global Market Insights*) and will register gains at over a whopping 15% CAGR between 2020-2026. The volume of global mobile transactions went over USD \$100 Billion in 2019 with value of transaction of about \$7.5 trillion USD. Mobile Wallets have seen tremendous growth, especially in India post demonetization and the government's 'Digital India' campaign. During the course of this research, we will see if there is any correlation between making payments using Mobile Wallets and the ease of travel. For that, let's first understand the travel and tourism industry on a global level and how it stands in India.

The literature that was studied pointed out a deeper need of study into the world of tourist perceptions towards Mobile Wallets.

Objectives

1. To analyse the preferred mode of payments for tourists in India
2. To identify the comfort level of Indian tourists in using Mobile Wallets for the purpose of travel and tourism
3. To understand if age and/or gender has an impact on tourists perception of use of Mobile Wallets
4. To analyse the relation between the comfort and ease of travel and usage of Mobile Wallets.
5. To understand the relation between level of education and the comfort level of using mobile wallets

Hypothesis

1. The preferred mode of payment for Indians is through mobile wallets.
2. Indian tourists are comfortable using mobile wallets.
3. Age and Gender do not have an impact on tourist perception of mobile wallets.
4. There is a positive correlation between the comfort and ease of travel while using mobile wallets.
5. The higher the level of education, higher are the chances of them using mobile wallets.

2. Literature Review

In the past few years, mobile wallets or what are referred to as m-wallets, have become an important form of payment and have garnered a lot of attention in growing markets like India. Initially, M-wallets were made so customers could have a seamless experience. However, not many emerging markets have taken up the concept very well. (Kaur et al., 2020). For obvious reasons, recent research related to intentions of using mobile payment platforms has largely focused on developed economies and mobile payments in general and India has often been ignored. A study conducted in Europe suggested that the way technology has been developing at such a rapid pace thanks to the advancements in the IT-sector, one of the most popular forms of payments, credit cards will be replaced in the next few years by Mobile-Wallets (Ascherl, 2013).

Travel, Hospitality & Tourism are service oriented industries and are mostly clubbed together. Travel is believed to be the fastest growing sector in India among the countries of G20 - it has grown by 8.5% in 2016 (Passah and Kumar, 2019). Some initiatives have been taken by the Ministry of Tourism, result of which has been that the Government has given a push to boost the Indian tourism industry which has led to a new visa regime through Make in India to support the tourism & hospitality sector, encourage investments in infrastructure vital for travel. Forward to 2020, most Indians prefer buying items through phones (Tyagi et al., 2018) or through a laptop. Therefore a number of organizations working in a similar space are emerging day by day at a tremendous rate. Businesses big and small have been generating subsequent amounts of revenue through online payments, especially mobile wallets.

The tremendous growth of mobile phones has brought anticipation of growth of an electronic payment network in support of mobile commerce (Kasavana, 2011). The consumers that purchased goods / services through a mobile phone increased over 23% during the second half of 2010 according to a report published by Oracle. The report also claimed that even while shopping at a physical store, the consumers actively engaged in looking for the product, its price, the delivery and payment options over a mobile phone. Another research conducted in China, India's neighbour showed some very strong support for effects of perceived security, compatibility, and knowledge of Mobile Payments (Peng et al., 2011). In short, the study concluded that in addition to the perceived ease of use and usefulness, tourist intentions to use Mobile Payments is also affected by perceived security.

Now, let's throw some light onto the Indian subcontinent, especially the rural part of the diverse country. Despite the social trends, there are still some considerable challenges in being able to bring the shift (Ali et al., 2017) Some steps, which seem extremely futuristic, could be a game changer for the rural segment, however it would need to be handled effectively. The research also showed that the impact & support towards digital transactions in the rural economy is significant and under the right circumstances, the rural economy of India can be a significant factor in contributing to India's digital revolution. The mobile wallet industry has witnessed significant market disruption thanks to the availability of VoLTE technology and India's and China's ability to produce inexpensive smartphones. It's estimated that smartphones will account for around 77% of the internet-connected devices by 2025 (Wadhvani and Bhutani, 2019).

Having understood the Mobile Wallet market In India, let's understand the tourism sector of India as well. The top 10 states of India where the majority of foreign tourist's visit are Maharashtra, which is essentially for business since Mumbai is the Financial Capital of the country along with Tamil Nadu, Delhi, being the Capital, etc among many. (Ghatage and Kumbhar, 2015)

While the growth of tourism has been impressive across the globe, India's share in global tourism has been insignificant (Tripathi and Siddiqui, 2010). Though it cannot be denied that India has potential for development in the travel and tourism industry, proper infrastructure will aid the growth of the industry. The Ministry of Tourism of any country from any part of the world looks for ways to promote & develop tourism in the country. The growth of the tourism industry in any country is dependent on the changing economic conditions. In the event of turmoil or economic instability, or safety concerns or people's job is at risk, not many people choose to travel (Nag, 2013).

India lacks where issues of security and safety come into the picture, maintenance and cleanliness of tourist spots has also been a concern for the industry, the infrastructure and facilities for tourism also don't come in support of the industry. The man made attractions that have come up in the recent times are being maintained as of now but do not know for how long they'll be able to sustain. The behavior of country residents towards tourists has also been a cause of concern and the cases of cheating against foreign tourists has been rampant (Singh 2014). However, times are changing now and India is now much more safe and tourism friendly. The statistics speak for themselves and it would be interesting to see how the digital revolution has played out in favor or against the travel and tourism industry.

3. Material And Methods

Sampling & Data Attainment

For this research, the survey was conducted using a questionnaire. The questionnaire consisted of questions involving multiple-choice questions, on the Likert scale which consisted of a 5-point rating scale. The questions consisted of specific and general information of the respondents Apart from the various research papers studied from various publications which have been mentioned in the references section, newspaper articles as well as extensive research on the internet was conducted. The respondents were only offered the questionnaire if they said that they had travelled before as well as after the introduction of Mobile Wallets In India. Data was collected through convenient sampling method in between 15 - 21 December 2020. The literature review resulted in the generation of initial pool of 24 suitable items. Items were assessed for validity of content through two separate panels. The first panel comprised of 11 tourism industry professionals who were requested to correlate every item with one construct that the item best indicated. Secondly, construct was put in front of 07 eminent faculty members of tourism and hospitality to review how well the construct is defining each item. Based on comments given by the panel there were four items were not included in the pool of items which resulted in total of 19 items. We have collected our first sample and the items were assessed for content validity. Secondly, we have performed exploratory factor analysis (EFA) and reliability test. In the third phase, Confirmatory Factor Analysis (CFA) and validating test was conducted for the other sample to finalize the measurement model. To measure whether the sample size is adequate and appropriate we performed Exploratory Factor Analysis, Kaiser Mayer Olkin (KMO) (Kaiser, 1970). The result depicts that KMO value is .957 and Bartlett's Sphericity Test is .000, which shows sampling adequacy for our study and significant relationship between our variables.

Methods

For the purpose of analysis, SPSS a software made by IBM was used extensively for analysing the data and deriving conclusions within which ANOVA test was used as well. The above-mentioned approach, tools, questions were chosen as they perfectly fit with the research and would answer all the relevant questions in the best way possible for most accurate results.

4. Analysis

Demographics

The respondents were a mixture of the age group mentioned above. 60 were from the age of 18-35. The least amount of respondents were from the age group of 36-45. 30 respondents were from the age group of 46-55 and 55 respondents were from the age group of 55 and above.

age

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	18-35	60	38.7	38.7	38.7
	36-45	10	6.5	6.5	45.2
	46-55	30	19.4	19.4	64.5
	55 And Above	55	35.5	35.5	100.0
	Total	155	100.0	100.0	

The research consisted of almost an equal amount of Male and Female respondents which ensured the results were as unbiased as possible.

gender

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Male	80	51.6	51.6	51.6
	Female	75	48.4	48.4	100.0
	Total	155	100.0	100.0	

As the table suggests, there were 80 male respondents whereas there were 75 female respondents.

Travelled In Past 1 Year

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	110	71.0	71.0	71.0
	No	45	29.0	29.0	100.0
	Total	155	100.0	100.0	

Travelers are no longer obligated to carry around huge sums of cash and then wait in lines to get it converted into the currency that they need. Phones have become a necessity now, we cannot go anywhere without phones. It is convenient to be able to make payments through the phone itself rather than looking for the exact sum which needs to be paid. In the year 2020 the entire idea of “digital payment” got special attention as people around the globe began to reduce the use of cash due to COVID-19. Mobile wallets offer a safe and secure medium wherein there is zero contact.

Popularity of Payment Method

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Cash	10	6.5	6.5	6.5
	Credit/ Debit Cards	2	1.3	1.3	7.7
	Mobile Wallets	40	25.8	25.8	33.5
	Combination of All Three	103	66.5	66.5	100.0
	Total	155	100.0	100.0	

The option of having access to three modes of payments tends to make a traveler feel at ease because they have the reassurance that they will not get stranded without access to money which can be a major concern while traveling to an unknown country. Credit and debit cards are acceptable all around the globe, there is no doubt that carrying a credit/debit card would ideally be considered the next best option but forty respondents felt that if not combination of all three then the next best option would be mobile wallets. Ten respondents felt it was better to carry cash to use for payments on the trip and only two respondents would use credit/debit cards for payments.

There is a change in trends, travelers prefer keeping multiple mediums of payments just in case. Thus our hypothesis is proven wrong since people prefer a combination of all three.

I feel comfortable using Mobile Wallets

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Agree	90	58.1	58.1	58.1
	Agree	35	22.6	22.6	80.6
	Disagree	30	19.4	19.4	100.0
	Total	155	100.0	100.0	

Maximum respondents (90) strongly agreed on whether they were comfortable using mobile wallets. This shows that there is a lot of trust in mobile wallets and users have become comfortable in using them as a mode of payment over the years. The mobile wallets which are presently being used are extremely simple to use, they need to be linked to a bank account after which the user has the option to make payments directly from the bank itself or transfer money into the mobile wallet. Mobile wallets have tried their best to implement a strong security strategy in order to safeguard the details of all users. A secure payment gateway which is easy to use is bound to attract new users. Mobile wallets have evolved ever since their introduction and that is the reason behind this enhanced level of comfort that was seen among respondents. There was a certain percentage of respondents who agreed that they are comfortable with use of mobile wallets, this depicts a positive attitude towards use of mobile wallets. Thus our hypothesis is proven right.

Correlations

		age	preference_m obile_wallets
age	Pearson Correlation	1	-.006
	Sig. (2-tailed)		.936
	N	155	155
preference_mobile_wallets	Pearson Correlation	-.006	1
	Sig. (2-tailed)	.936	
	N	155	155

Since degree of significance is much higher than .05, we can conclude that there is a high negative correlation between age and preference of mobile wallets. This means that there is no conclusive evidence that there is a correlation between Age and Preference of Mobile Wallets. Thus our hypothesis is proven right.

Correlations

		preference_m obile_wallets	gender
preference_mobile_wallets	Pearson Correlation	1	.096
	Sig. (2-tailed)		.236
	N	155	155
gender	Pearson Correlation	.096	1
	Sig. (2-tailed)	.236	
	N	155	155

Since degree of significance is higher than .05, there is a negative correlation between gender and preference for mobile wallets. Thus we can conclude that age and gender suggest no pattern and have no relation between a customer’s preference for usage of mobile wallets and hence our hypothesis is proven right.

ANOVA

		Sum of Squares	df	Mean Square	F	Sig.
comfort	Between Groups	5.959	3	1.986	2.483	.063
	Within Groups	120.815	151	.800		
	Total	126.774	154			
preference_mobile_wallets	Between Groups	9.933	3	3.311	2.574	.056
	Within Groups	194.261	151	1.286		
	Total	204.194	154			

The degree of significance is .063 which is slightly higher than .05. Thus we can say that usage of mobile wallets doesn't necessarily translate to comfort. Thus our hypothesis is proven wrong. The reasons for this can be many ranging from acceptance as a mode of payment to infrastructure difficulties. From the looks of it, India's infrastructure isn't apt for a complete online experience. Though demonetization has put a QR code on every nook and corner of every street, there are often issues of connectivity.

Rural areas still do not have internet connectivity and these offbeat places are often tourist attractions.

Popular Mobile Wallets

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Google Pay	52	33.5	33.5	33.5
	Phone Pay	15	9.7	9.7	43.2
	Paytm	85	54.8	54.8	98.1
	Mobiquick	3	1.9	1.9	100.0
	Total	155	100.0	100.0	

There are many factors which lead to the popularity of an application, it has a lot to do with the way that the application makes its users feel and the kind of image it builds over time. Eighty five respondents listed Paytm as the payment gateway that they use in their mobile phones. One big reason why this has happened is that Paytm has been successful in making itself known among mobile phone owners and with the help of indian centric advertisements has been able to tap in to the market in a way that other apps are yet to do.

Consistency Of Usage Of Mobile Wallets

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Daily	40	25.8	25.8	25.8
	Weekly	79	51.0	51.0	76.8
	Fortnightly	26	16.8	16.8	93.5
	Monthly	10	6.5	6.5	100.0
	Total	155	100.0	100.0	

There was a great increase during the lockdowns because people refrained from withdrawing cash from ATM, therefore the next best option would be to make digital payments and instead of taking out a card repeatedly it is more convenient to use mobile wallets since we usually carry our phones in our hands and there is no need to punch in the pin of the card machine.

Correlations

		usage of mobile wallets	education
Usage of mobile wallets	Pearson Correlation	1	.018
	Sig. (2-tailed)		.825
	N	155	155
edu	Pearson Correlation	.018	1
	Sig. (2-tailed)	.825	
	N	155	155

Since degree of significance is less than .05, there is positive correlation between between the level of education and the usage of mobile wallets.

5. Conclusion

The research showed that the preferred mode of payment among tourists in India was to have access to all three mediums i.e.cash,credit/debit card and mobile wallets. More than half of the people who have traveled in the past year reported that they used mobile wallets in the past one year when they traveled. Ninety respondents strongly agreed to being comfortable in using mobile wallets for the purpose of travel and tourism. As time passes, mobile wallets have gained popularity because they are easy to maneuver. There was a considerable rise in the use of mobile wallets due to the pandemic. Paper currency had become a risk of transmission & there was a fear of going to the ATM and withdrawing money. It is convenient to have access to mobile wallets. There are chances that one might forget his or her wallet at home, in such a case the person will not be able to purchase anything but with the help of mobile wallets they can pay for any products which they need.

This study was completed in a period of 4 weeks and due to the shortage of time there might have led to errors in the result. Though all efforts were made to ensure that no errors occur in the final result or in any other part of the report, there is a bleak chance, given the constraint of time.

There were 60 respondents from age 18-35. The least number of respondents were from the age group of 36-45. 30 respondents were from the age group of 46-55 and 55 respondents were from the age group of 55 and above. This shows that the age group of 18-35 is much more accepting & comfortable with the use of mobile wallets. Gender in particular had no real impact on the use of mobile wallets. Respondents were almost in equal ratios. However there is a direct relation in the comfort level and number of users. If there is a higher level of comfort then there is bound to be more users as well. We can conclude that mobile wallets have indeed brought about an ease when it comes to travel and tourism. Payments have become hassle free and convenient..

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