

# THE COVID -19 SCARE AND AIR TRAVEL: EXPLORING PASSENGERS' CONCERNS AND ATTITUDES

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## ABSTRACT

*This paper investigated the passenger perceptions with regards to the resumption of air travel. Descriptive research design has been used to understand the consumers behaviour regarding airlines. Travel the results of Exploratory Factor Analysis have identified three major factors. Results of Pearson's correlations indicate a positive correlation between perceived health status and. willingness to fly and readiness to pay a premium for the Covid -19 secure flight. Predictably, respondents exhibiting a high degree of fear of Covid were less willing to fly. It was found that the leisure and travel is expected to restart sooner than the business. This study can serve as a starting point for other studies in the future and can aid to the development of strategies for recovering aviation demand.*

**Keywords:** Air Travel, Covid -19, Readiness to Fly

## INTRODUCTION

The travel and tourism industry has been one of the hardest hit industry as global travel continues to be below Covid-19 levels due to flight, rail and other forms of public transportation being cancelled and or capacity reductions. Suau-Sanchez, et al., (2020); Sun, Wandelt & Zhang (2020), Report that due to the effects of the pandemic, a huge number of organisations in the related industries had to cease almost all of their operations. The fallout and after effects of the disease has been unprecedented and even worst then anything witnessed in recent history. The aviation sector in India was already in a precarious position pre Covid-19 and this situation has amplified post Covid-19. Post the emergence of the second and deadlier wave of COVID-19, in India, domestic tourism has almost come to a standstill.

The pandemic also highlights the international visitor's travel aversion linked to perceived health risks (Chua et al., 2021). The deadly effect on the airline sector can be attributed to the fear of proximity with strangers for long hours and the decline in the general spheres of business and tourism. With many aircrafts grounded and facing negligible passenger demand, the airline industry is trying to find various effective measures to be convince the passengers and consumers to fly again.

In order to bring back the demand, it is important to assess the consumer's attitudes and behaviour towards airline travel. However, the authors could find very scarce research for identifying the Indian consumers' attitudes towards airline travel and hence this study.

## LITERATURE REVIEW

The seminal work of Bauer (1960) which identifies the importance of perceived risk by tourists has been of ongoing interest to the travel and tourism industry and research. Jiang (2019) identify that risks which are linked with travel, such as diseases/illnesses, natural disasters, crimes/violence, or terrorist attacks, are believed to be larger than ever before Studies by Beirman (2003); Mitchell & Vasso (1997); Irvine & Anderson (2006) identify that perception of safety and security is a major determinant in a travellers' decisions. According to Zou &

Meng (2020) many visitors' travel patterns are shaped by their desire to travel safely. Chi & Han (2020) state that leisure travellers generally pick a place that not only satisfies their requirements and wants, but also poses the fewest hazards or risks as possible.

McKercher & Chon (2004); Yates (2006) identify that the World Health Organisation (WHO) had issued a travel advisory for the first time in its history for travelling to infected areas because it felt that the disease SARS was spread by airline passengers. Recently, COVID-19 has had a significant impact on airport processes: social distancing norms paired with screening procedures have resulted in modifications in passenger processing. (Sun, Wandelt, Zheng & Zhang, 2021) In order to maintain social distancing, the International Air Transport Association (IATA, 2020) has recommended maintaining a distance of 1–2 m between passengers at any given time. Cotfas, et al., (2020) state that it would be difficult to maintain this distance with most boarding/seating methods. Further on they add that in fact, a strict application of this rule would need to leave two rows empty between each passenger. Salari, et al., (2020) indicate that it is not just a good boarding strategy that is required, but that it also mandates a keen need on the passengers' side to maintain social distancing. Profit-driven airlines must weigh the impact of various health risks against economic productivity (Cotfas et al., 2020)

Harries, Martinez & Chakaya (2021) identify that it is believed that the primary way of in-flight transmission is face-to-face exposure during talking, coughing, and sneezing. However, Bielecki, et al., (2021) state that there is a lack of formal understanding regarding the likelihood of the disease transmission in an aircraft cabin. Schwartz, et al., (2020) have studied a trip from a trip from Guangzhou to Toronto and based on the lack of infection in the said flight, state that In-flight transmissions are infrequent.

The work of Kim, et al., (2017); Cahyanto, et al., (2016) have studied travel behaviours for transit passengers and state that the fear and perceived risk of contracting infection influence travel behaviours, they identify that this influence varies vastly based on the infected area and demographic characteristics of the people. The work by Fenichel, et al., (2013); Sharangpani, et al., (2011) also describe that self-protective behaviours like cancelling or postponing international trips or flights to avoid infection during pandemics depend mainly on demographic characteristics (mainly age).

## **RESEARCH METHODOLOGY**

This study aims to study and investigate the consumer attitudes towards the airline industry especially w.r.t the Indian scenario. It uses descriptive research design. A detailed questionnaire was used to analyse the consumer's attitudes towards air travel. The data was collected through on line mode in the month of May 2021 and June 2021 using Google docs. . Snowball method of sampling was used. . The questionnaire explored the respondents' socio-demographic characteristics, their health status and factors affecting airline travel. Before finalizing the research instrument, a pilot study was conducted. 35 questionnaires were issued to a mix of corporate professionals, housewives and first year management students. The survey instrument was cross validated by six academic experts in the domain of marketing and tourism and supply chain.

## **DATA ANALYSIS AND FINDINGS**

The data was collected through Google documents. The data was analysed through SPSS21. Descriptive statistics, Pearson's correlations and Exploratory Factor Analysis have been used to analyse the gathered data. Table 1 below indicates the demographic composition of the respondents.

<b>Table 1 DEMOGRAPHIC VARIABLES</b>		
<b>Gender of Respondents</b>	<b>Frequency</b>	<b>Percent</b>
Male	170	51.52
Female	160	48.48
Total	330	100.00
<b>Age group of Respondents [In Years]</b>	<b>Frequency</b>	<b>Percent</b>
Below 20	14	4.24
20-35	89	26.97
36-50	125	37.88
51-65	61	18.48
More than 65	41	12.42
Total	330	100.00
<b>Occupation</b>	<b>Frequency</b>	<b>Percent</b>
Student	14	4.24
Self-Employed	113	34.24
Corporate Executive	91	27.58
Government job	55	16.67
Housewife	57	17.27
Total	330	100.00
<b>Income Per Annum</b>	<b>Frequency</b>	<b>Percent</b>
Less than ₹ 10,00,000	12	3.64
₹10,00,001 - ₹20,00,000	96	29.09
₹20,00,001 - ₹ 30,00,000	138	41.82
Above ₹ 30,00,001	84	25.45
Total	330	100.00
<b>Education</b>	<b>Frequency</b>	<b>Percent</b>
Not completed graduation	26	7.88
Graduate	189	57.27
Post graduate	83	25.15
More than post graduate	32	9.70
TOTAL	330	100

The table above indicates that the respondents were almost well balanced in terms of their gender. A huge majority of the respondents were educated-at least graduates or more. A majority of the population lay in the age group of 35-50. The respondent profile was affluent with around a quarter earning more than 30,00,001 per annum.

### **Perceived Health Status and Preventive Covid 19 behaviour**

Moreover, it was very heartening to note that a substantial percentage (70%, n=231) of respondents reported to be having fair to good and very good health on a Likert scaled question. It was heartening to note that a huge majority of people follow the Preventive COVID-19 behaviours (more than 89%) which are as defined by WHO safety standards for avoiding COVID-19 infection. More than a quarter (30.9%, n=102) reported being vaccinated completely while 43.94% (n=145) reported partial vaccination (one shot).

### **Readiness to Fly & Pay a Premium**

Respondents were asked if they were worried about acquiring an infection while flying. More than half of the respondents (60 percent; n=198) said they were moderately concerned while 38.48 percent; n=127) were extremely concerned and (1.51 %, n=5) were not at all concerned. Readiness to fly in the pandemic scenario was assessed and it was found by the authors that a substantial number of respondents (65.15%, n=215) indicated that they would be very ready to fly. Out of those, 71% wanted to fly both international and domestic. When asked

about their likeliness to travel for business/official purpose or leisure it was clear that the respondents preferred to travel for recreational and leisure purposes rather than business purposes

Further on the respondents were asked if they were ready to pay a premium *i.e.*, more for taking flights in which all COVID precautions have been carried out. The table below indicates that a huge majority of respondents are ready to pay more for COVID-19 secure flights. The fact that the respondents are ready to pay a premium is a positive indicator for the aircrafts.

<b>Would the respondents pay more for Covid secure flight?</b>	<b>Frequency</b>	<b>Percent</b>
No	92	28
Yes	238	72
Total	330	100
<b>How much more are the respondents ready to pay more for the Covid -secure flight?</b>	<b>Frequency</b>	<b>Percent</b>
Up to 10%	66	28
Between 11-20 %	103	43
Between 21 - 30%	53	22
More than 31%	16	7
Total	238	100

**Results of Factor Analysis**

Next and exploratory factor analysis was carried out on the attitude statements. The Kaiser Meyer-Oklin (KMO 0.715) and the Bartlett test (p, 0.05) indicated that it was suitable to proceed with factor analysis. Internal reliability which can be verified by Cronbach’s Alpha (0.828) was also obtained. This according to Hair, et al., (1998), indicates a strong internal consistency among the construct. Principal Component Analysis (PCA) with Varimax rotation yielded the following result.

<b>STATEMENTS</b>	<b>FACTOR LOADINGS</b>		
I will travel by air if a majority of population at my destination is vaccinated	0.813		
I will travel by air if there was good medical facility at my destination	0.764		
I will travel by air if there were no entry restrictions, even if I have to self-isolate upon arrival.	0.741		
I will travel by air if the self-isolation (upon arrival)period was reduced from the current period	0.906		
I will travel by air if self-isolation was no longer required	0.884		
I will travel by air if the Covid cases at my destination are falling daily regardless of self-isolation	0.657		
I will travel by air if the airline keeps middle seats empty and each passenger remains distanced from each other		0.763	
I will travel by air if all the aircraft crew wore face masks		0.733	
I will travel by air if the aircraft meets with all the sanitary conditions like providing face mask, face shields, hand sanitizer and other disinfection measures) within the aircraft		0.675	
I will travel by air again if the aircraft had equipments necessary to prevent transmission of disease. For instancese at partition curtains.		0.776	
I will travel by air if all airport employees wore face mask all the time			0.812
I will travel by air if preventive measures were regularly carried out in all airport facilities.			0.808

I will travel by air if social distancing is maintained between people for check-in, security check, and boarding.			0.655
I will travel by air if social distancing is maintained within the buses and trains used in the airport to reach the aircrafts.			0.687
I will travel by air if COVID-19 testing was mandatory for all passengers upon departure or entry.			0.713

A three factor solution was arrived at and named as Destination factors, within the aircraft safety and Safety at the Airport. All the three factors combined accounted for 76% of the variance. This indicates that factors at the destination like majority of people at the destination being vaccinated, availability of good medical facility at the destination, reduction or removal of self-isolation or removal of entry restrictions are important. The second factor was identified as within the aircraft safety. These entailed keeping the middle seats empty and ensuring that passengers remained distanced from one another. One major determinant was that the aircraft had to provide face mask, face shields, hand sanitizer and other disinfection measures within the aircraft. And also ensure that all the aircraft crew wore face masks.

Maintaining safety at the airport was also vital for the would-be travellers. Measures like ensuring that all the airport employees wore face mask all the time, carrying out preventive measures regularly in all airport facilities, maintaining social distancing is between people for check-in, security check, and boarding. Additionally, it also entailed maintaining social distancing within the buses and trains used in the airport to reach the aircrafts. The would be passengers also felt that the COVID-19 testing should be mandatory for all passengers upon departure or entry.

**Examining Relationships through Pearson’s Correlation**

Further on, Pearson’s correlations were used to examine the relationships between the variables of this study (perceived health status and willingness to fly, paying more for Covid secure flight and COVID-19 preventive behaviours (Table 4).

	<b>Perceived Health Status</b>	<b>Covid-19 Preventive Behaviour</b>	<b>Readiness to pay a premium</b>	<b>Willingness to fly</b>	<b>Fear of Covid -19</b>
Perceived Health Status	-	0.59	0.52	0.66	0.38
Covid-19 Preventive Behaviour		-	0.63	0.72	0.54
Readness to pay a premium			-	0.78	0.67
Willingness to fly				-	-0.61
Fear of Covid -19					-

It was found that there was a positive correlation between Perceived health status and exhibiting taking covid preventive behaviour. (r=0.59) Willingness to fly (r=0.66) and readiness to pay a premium (r=0.52) for the Covid -19 secure flight. The respondents have also exhibited a strong positive correlation between taking covid preventive behaviour, willingness to fly (0.72) and readiness to pay a premium. (0.63)These respondents also exhibited a fear of covid -19 unsurprisingly, those who had a fear of covid were less willing to fly (-0.61). A strong positive correlation was found between Readiness to pay a premium and Willingness to fly (0.78)

**CONCLUSION**

This current study examined the passengers' health concerns and attitudes toward flying given the recent on-going COVID-19 pandemic. The study suggests that the passengers are willing to fly again. The results of Exploratory Factor Analysis have revealed that Destination factors, within the aircraft safety and Safety at the Airport are important determinants. The correlation results reveal that there is a significantly positive relationship between the variables of their willingness to fly and Covid-19 preventive behaviour. Moreover, it is interesting to note that consumers are ready to pay a premium for Covid secure flights. These findings resonate with earlier research that has found a link between COVID-19 fear, mental health, and COVID-19 prevention activities (Ahorsu, et al., 2020).

The business travel sector will recover more slowly than the recreational /leisure travel. People have got used to video calling apps like Zoom, Cisco WebEx and Google meet and these are now commonly used by organisations routinely. This will necessitate a restructuring of the travel segments. This can also impact the pricing as traditionally the leisure and recreational segment is more price conscious than the business segment. If the situation continues then the airlines may want to reconfigure the layout of the aircraft. It is evident that the need for maintain hygiene is just not here to stay but has also become more stringent. Extrapolating, the authors feel that the use of mobile apps will increase as they will be used to store the vaccine certificates and COVID-19 test results.

The data for this paper has been collected after the end of second wave in India and hence might showcase the optimism of the population. Data collected in different times might yield different results.

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