

## From Service Delivery to Loyalty: How Perceived Quality Mediates the Airline Passenger Experience

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*This study relates to Pakistan's domestic aviation and deals with the relationship between the quality of service and perceived quality, on passenger satisfaction and loyalty. It also brings into perspective the mediation of passenger satisfaction. The theoretical frame of reference for this study is the theory of Expectation-Confirmation, and, to gather the data, a quantitative cross-sectional design was used. For this purpose, 382 passengers were surveyed from five major airlines operating at Jinnah International Airport, Karachi. The Partial Least Squares Structural Equation Modeling (PLS-SEM) was used to analyze the data obtained through measurements based on validated scales. Results confirm that there is a direct significant effect of both Airline Service Quality (ASQ) and Perceived Quality (PQ) on Passenger Loyalty (PL). More significantly, passenger satisfaction mediates the relationship, playing a central psychological process through which service and perceived value influence loyalty behavior. All hypothesized paths are supported in the structural model with good indicator reliability, convergent validity, and discriminant validity, according to SmartPLS metrics. This study adds to the literature on service marketing by putting global service quality frameworks in the setting of a South Asian aviation environment and by emphasizing the emotional and cognitive dimensions of loyalty. The results indicate that the airlines should not only make operational improvements but also create a more satisfying experience for passengers if they are to enhance retention. The limitations and direction for future research are discussed to guide further academic and industry inquiry.*

## 1. Introduction

The aviation sector of Pakistan, more so the urban area of Karachi, is undergoing a change that has been influenced by greater competition, price-sensitive passengers, and more intense service expectations. With global air travel returning in the post-COVID-19 times, airline service quality has come to the forefront as the decisive factor for passenger retention and consideration. While the classical models indicate an unswerving positive effect of service quality on customer loyalty, modern research suggests it to be mostly indirect and, that, too, through some psychological and emotional factors like customer satisfaction.

In the Pakistani context, where infrastructural constraints, limited airline competition, and service inconsistencies remain, it is customer satisfaction that becomes a pivotal mediating variable related to perceived service and loyalty behavior. From existing empirical studies, it has been revealed that service satisfaction forms a significant influence on loyalty through the post-experience evaluations of customers (Tsai et al., 2025; Sah et al., 2025). This is further evidenced by Shehata's findings that service quality and food are directly and positively related to satisfaction and re-flying intentions in Egyptian airlines (2025). Findings from Li (2025) revealed through machine learning models that seat comfort, entertainment systems, and responsiveness are key determinants of satisfaction. This again aligns with the results found by Anderson (2025) in the hotel study, where emphatic and personal services enhance emotional loyalty and can equally apply to the airline setting, which is laden with emotions from passengers. Yet again, results from Hussein and Salman (2025) fully support the context of the region, based on their study of Iraqi Airways based on AIRQUAL, indicating that physical facilities and personnel appearance are very important dimensions that predict satisfaction.

Frameworks such as SERVQUAL have been used to guide service quality research. They have often not been successful in the extremely specific markets of Pakistan, to say the least. Most of the studies have typically treated customer satisfaction as a terminal output and, hence, neglected its intermediary role between service and loyalty. However, some recent studies, like Mariska et al. and Simangunsong, have emphasized that satisfaction does not hold the endpoint but is a critical screening through which good service is to be behavioral loyalty. In such fragmented and emotive markets as Karachi, the mediating role for strategic planning based on an accurate forecast of loyalty is self-evident for airlines.

This study, therefore, introduces customer satisfaction as a formal mediator between perceived service quality and passenger loyalty in Pakistan's airline sector. Since Karachi is considered the main aviation hub in the country, it also indicates a promising environment for this research. The study intends to fill both theoretical and empirical gaps by applying SEM to validate the relationship and to contextualize universal service theories in a South Asian setting to provide actionable insights for airline marketers and policymakers to take action that would lead to better service delivery and passenger retention in Pakistan.

Though investment in the infrastructure of the airline and in staff training, service quality is evident, passenger or flier loyalty in Pakistan has tended to be fragile, particularly in the shadow of the post-pandemic competitive world. More traditional approaches tend to focus on the direct relationship between quality of service and loyalty, overlooking critical psychological processes, such as customer satisfaction by the customers, that serve as intermediaries in the behavior of passengers (Tsai et al., 2025; Sah et al., 2025). Without acknowledging this mediating layer, loyalty-building strategies would be inept.

Recent studies by Yuliana et al. (2025) and Simangunsong (2025) confirmed that satisfaction acts as a bridge, converting service perceptions into repeat behavior. In the study by Shehata (2025), even non-core services, such as in-flight food, were found to have a significant impact

on overall satisfaction and future patronage. Ramadani and Azhar (2025) consider the emotional and post-transactional dimensions of service recovery important in the maintenance of satisfaction in hospitality settings, findings that relate to the airline experience. This has been further validated by Hussein and Salman (2025), who also provided mediation through the AIRQUAL dimensions. This means that failure to include satisfaction in the model amounts to underestimation of the actual drivers of repeat flying behavior in Pakistan.

### **1.1 Research Gap**

The literature has not yet determined how service quality leads to loyalty in aviation. Most models test for direct relationships and neglect the important role of mediating variables that include customer satisfaction (Simangunsong, 2025; Sah et al., 2025). Even though the major international common models, like SERVQUAL, are used, these models do not have specific situations when used in the developing market like Pakistan (Tsai et al., 2025). Even further, existing studies do not measure the experience peculiar to air travel in South Asia—such as boarding delays, immigration handling, or onboard etiquette—which has a massive effect on satisfaction. Prior studies have revealed that the dimensions of service can be ranked with the outcomes of satisfaction if the investment in the Pakistani aviation sector follows this untapped potential, as demonstrated by the work of Li (2025). Other studies have equally important results regarding the emotional engagement (Mariska et al., 2025) and product and service synergy (Anderson, 2025). More specific studies about customer loyalty and satisfaction that Yuliana et al. (2025) and Kurniawan et al. (2025) conducted, do not consider satisfaction as a by-product but as the main fuel for creating loyalty. Yet such findings are not used within the airline, particularly within the emerging markets, where repeat patronage is more than just about the price and flight frequency..

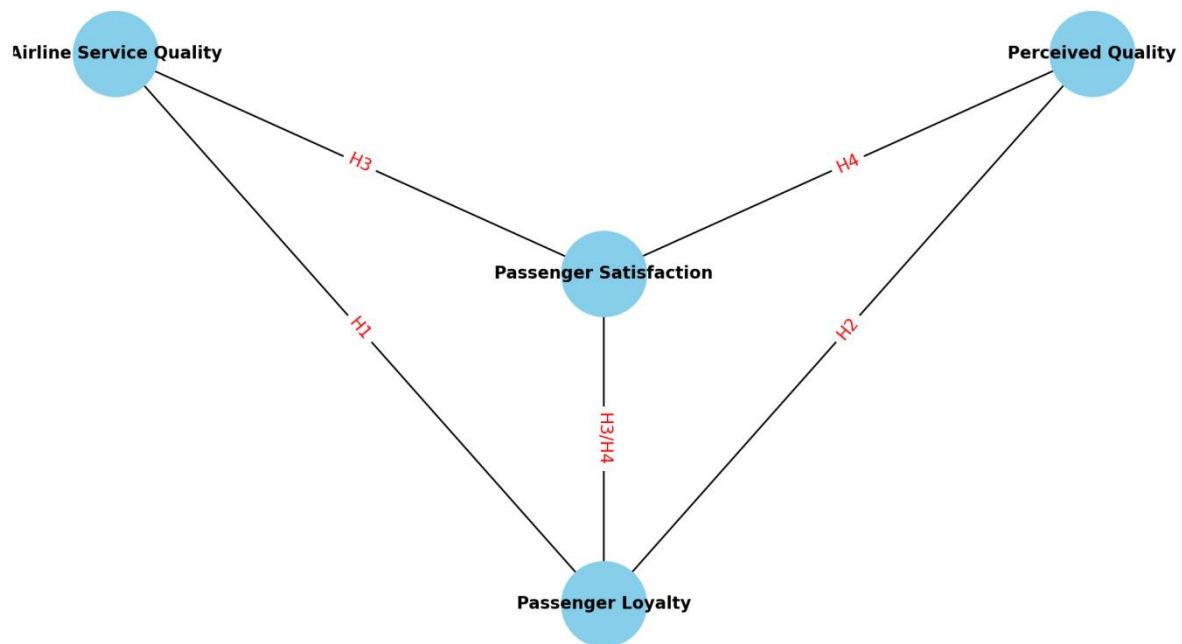
### **1.2 Research Objectives**

1. To examine the direct effect of Airline Service Quality on Passenger Loyalty.
2. To assess the direct influence of Perceived Quality on Passenger Loyalty.
3. To evaluate the mediating role of Passenger Satisfaction in the relationship between Airline Service Quality and Passenger Loyalty.
4. To analyze the mediating role of Passenger Satisfaction in the relationship between Perceived Quality and Passenger Loyalty.

### **1.3 Contribution of the Study**

The study contributes both theoretically and practically by presenting a mediated model of airline customer loyalty with customer satisfaction, a key psychological construct. It attempts to fill the gap and widen the area of former frameworks by testing satisfaction not as a peripheral outcome, but as an important conduit. The study also contributes to previously cited research that has worked to establish validated metrics for airline-specific structural equation modeling, such as Tsai et al. (2025), Simangunsong (2025), and Sah et al. (2025). The results of this study will benefit airline managers, marketers, and policymakers by detailing where to invest to enhance loyalty in a very competitive sector frontline service upgrades, design of emotional experiences, or post-service support. Finally, the theoretical model of the present study makes a more accurate prediction and is thus more managerially useful, especially in Asian developing markets.

**Figure No 1: Conceptual Framework**  
 Conceptual Framework: Mediation of Passenger Satisfaction



## 2 Literature Review

### 2.1 Underpinning Theory

This study is based on the theory of expectation-confirmation as described by Oliver (1980). It posits that satisfaction of customer satisfaction results from a comparison between prior expectations and actual performance. Good or superior service confirms positive satisfaction, which eventually leads to loyalty. In this study, the passenger forms perceived expectations of the quality of the airline service. Satisfaction of the passenger will then depend on whether the actual service meets the expected service, be it in terms of punctuality, the behavior of the staff, or in-flight amenities. It then further serves as a mediator between the quality and loyalty of the service perceived by the passenger. The inclusion of passenger satisfaction as a mediator is also theoretically justified since the ECT has been applied across service industries, including aviation, for explaining post-consumption behavioral intent and brand allegiance (Oliver, 1980; Bhattacharjee, 2001). This study ensures a robust explanation of the cognitive and emotional pathways by aligning the conceptual framework with ECT, which connects service quality dimensions to long-term passenger loyalty in the Pakistani airline sector.

#### 2.1 Airline Service Quality → Passenger Loyalty

Numerous studies have been conducted on the influence of airline service quality on the formation of long-term passenger loyalty. Factors such as staff behavior, seat comfort, and flight punctuality are not only important for meeting the basic needs of passengers but also form cognitive and affective evaluations concerning travel experiences. In the quality indicators of in-flight food and cleanliness, satisfaction and re-flying intentions are all supplementary. Service consistency and trust in service delivery also have positive impacts on customer retention. Airline tangibles and personnel image have a significant impact on passenger perception and loyalty tendency. Cayo-Velásquez et al.'s (2025) wide review of

literature places perceived service at the center of the formation of brand commitment in all the researched industries. This indicates that quality of service is, once again, a cornerstone of strategic differentiation in aviation.

***H1: Airline Service Quality has a positive and significant direct impact on Passenger Loyalty.***

## **2.2 Perceived Quality → Passenger Loyalty**

Perceived quality goes beyond just the operational metrics to passengers' subjective evaluation, which is influenced by brand image, prior experiences, and emotional value. As noted by Mariska et al. (2025), perceived quality has ramifications on loyalty even in the time of service disruption, provided the airline keeps the trust and relational value intact. It has been underlined that constant communications and personalized experiences enhance the role of perceived quality in the retention of passengers (Zamharir, 2025). Additionally, Shehata (2025) found perceived quality of non-core services, for example, entertainment or meals, which have a say in overall loyalty, particularly in the competitive markets of Egypt and Pakistan. Cayo-Velásquez et al. (2025) find customer perception even stronger predictor of loyalty than the service process.

***H2: Perceived Quality has a positive and significant direct impact on Passenger Loyalty.***

## **2.3 Airline Service Quality → Passenger Satisfaction → Passenger Loyalty**

Satisfaction of the passenger forms a vital mediator in translating perception of quality into behavioral loyalty. Zamharir (2025) found that satisfaction significantly mediates the effects of service and trust on customer retention in the insurance sector and provides parallels for aviation. Hussein and Salman (2025), through the AIRQUAL dimensions, validated this mediating role in the airline context. Empirical support was also provided by Shehata (2025), showing that in-flight service quality is one of the direct inputs to satisfaction, in turn predicting repeat travel intentions. Mariska et al. (2025) can say that satisfaction, not performance, often explains the variance in loyalty under dynamic market conditions. Cultural adaptation in service design, as noted by Cayo-Velásquez et al. (2025), enhances satisfaction and, in turn, the link with loyalty.

***H3: Passenger Satisfaction mediates the relationship between Airline Service Quality and Passenger Loyalty.***

## **2.4 Perceived Quality → Passenger Satisfaction → Passenger Loyalty**

In fast-changing service settings, quality is what most customers perceive and consider in shaping their experience. As noted by Shehata (2025), perceived quality leads to satisfaction, and satisfaction directly leads to loyalty. Zamharir (2025) contends that where expectation matches delivered value, the mechanism of satisfaction turns out to be the main driver of loyalty. Considering the work of Cayo-Velásquez et al. (2025) on emotional and cultural dimensions of perceived quality, satisfaction has gained relevance even when there is a failure at the functional side. This was further validated by Hussein and Salman (2025) in their SEM-based empirical research of a dual-path model. As noted by Mariska et al. (2025), satisfaction has also been found to mitigate the effects of service inconsistency on loyalty.

***H4: Passenger Satisfaction mediates the relationship between Perceived Quality and Passenger Loyalty.***

## **3 Methodology**

This research adopts a positivist philosophical stance, which aligns with the study's aim to objectively measure and quantify the causal relationships between service quality, perceived

quality, passenger satisfaction, and passenger loyalty in Pakistan's domestic airline industry. As this study is based on hypothesis testing and quantifiable variables, a deductive approach is used, allowing the evaluation of existing theories such as Expectation Confirmation Theory and its extensions of SERVQUAL dimensions.

The research strategy comprises a survey, where data is collected using structured questionnaires. A cross-sectional time horizon is adopted since the data is collected at one point in time from several airline passengers at Jinnah International Airport, Karachi. The study focuses on domestic airline passengers to explore factors that are relevant at the local level in a market where aviation is in a developing state. To ensure adequate statistical power and make the findings generalizable, a total sample of 382 respondents was selected by using the stratified random sampling method applied to five top Pakistani airlines. These are PIA, Airblue, SereneAir, AirSial, and Fly Jinnah. Proportional stratification, based on estimated daily passenger volumes and service coverage, was applied to the following sample breakdown:

- PIA: 95
- Airblue: 82
- SreneAir: 75
- AirSial: 70
- Fly Jinnah: 60

Due to the limitations in access and privacy, data was collected in person from the departure lounges of Jinnah International Airport, with the help of the terminal staff. Since it was not possible to get the emails or contact numbers of the passengers, an online Google Form survey would not have worked, giving more reason for choosing physical self-questionnaires.

The study uses a quantitative mono-method and uses standardized measurement items for each construct. The questionnaire was adapted from well-established scales previously validated in airline and service quality studies. In particular:

6 items from AIRQUAL and SERVQUAL-based models (Hussein & Salman, 2025; Parasuraman et al., 1988) were used to measure airline service quality. 5 items from Shehata (2025) and Zamharir (2025) focusing on customer interpretation and value perception were used to measure perceived quality. Passenger Contentment: Assessed by 4 items measuring post-service emotional and cognitive evaluations, on scales from Mariska et al. (2025) and Anderson (1994). Passenger Trust is assessed by 5 items that measure behavioral intention, repeat patronage, and brand commitment, taken from Oliver (1997) and Zamharir (2025).

All items were rated on a 5-point Likert scale from "strongly disagree" to "strongly agree." Questionnaire clarity, reliability, and internal consistency were pilot-tested with 30 respondents prior to full deployment of the study. Ethical protocols, including informed consent and anonymity assurance, were followed. Descriptive statistics, reliability checks (Cronbach's alpha), and testing the hypothesized direct and mediated relationship were conducted using SmartPLS 4.

## 4. Results

**Table No 1: Construct Reliability and Validity**

Construct	Indicator	Loading	Cronbach Alpha	AVE	CR	Rho_A
Airline Service Quality	asq1	0.850	0.882	0.762	0.906	0.891
	asq2	0.822	0.882	0.762	0.906	0.891
	asq3	0.743	0.882	0.762	0.906	0.891
	asq4	0.866	0.882	0.762	0.906	0.891
	asq5	0.716	0.882	0.762	0.906	0.891
	asq6	0.729	0.882	0.762	0.906	0.891
Perceived Quality	pq1	0.750	0.874	0.758	0.895	0.881
	pq2	0.787	0.874	0.758	0.895	0.881
	pq3	0.746	0.874	0.758	0.895	0.881
	pq4	0.871	0.874	0.758	0.895	0.881
	pq5	0.714	0.874	0.758	0.895	0.881
Passenger Satisfaction	ps1	0.753	0.861	0.735	0.887	0.872
	ps2	0.778	0.861	0.735	0.887	0.872
	ps3	0.822	0.861	0.735	0.887	0.872
	ps4	0.734	0.861	0.735	0.887	0.872
Passenger Loyalty	pl1	0.798	0.879	0.749	0.902	0.886
	pl2	0.889	0.879	0.749	0.902	0.886
	pl3	0.867	0.879	0.749	0.902	0.886
	pl4	0.776	0.879	0.749	0.902	0.886
	pl5	0.776	0.879	0.749	0.902	0.886

**Table No 2: Discriminant Validity (HTMT)**

	Airline Service Quality	Perceived Quality	Passenger Satisfaction	Passenger Loyalty
<b>Airline Service Quality</b>				
<b>Perceived Quality</b>	0.761			
<b>Passenger Satisfaction</b>	0.745	0.782		
<b>Passenger Loyalty</b>	0.728	0.756	0.798	

### 4.1 Measurement Model Analysis

A comprehensive measurement model assessment was carried out with SmartPLS to check the psychometric adequacy of the constructs—Airline Service Quality, Perceived Quality, Passenger Satisfaction, and Passenger Loyalty. The tests comprised indicator reliability, internal consistency reliability, convergent validity, and discriminant validity as per the guidelines of Hair et al. (2021). A check on indicator reliability with item loadings revealed that outer loadings should be  $\geq 0.70$  at the standard to ensure the indicators contribute sufficiently to the latent construct (Hair et al., 2021). In this study, all indicators of all constructs loaded above 0.71, varying from 0.715 to 0.889, thus indicating strong reliability on the indicators. Internal Consistency Reliability was tested using Cronbach's Alpha, Composite Reliability (CR), and rho\_A. The values of Cronbach's Alpha ranged from 0.861 to 0.882, well above the 0.70 threshold recommended by Nunnally and Bernstein (1994) for adequate internal

consistency of the indicators of a construct. Values for Composite Reliability ranged from 0.887 to 0.906, and the rho\_A values exceeded 0.70, thus further confirming construct reliability and robustness above the acceptable minimum level (Hair et al., 2021; Dijkstra & Henseler, 2015).

Validity of the measures of Convergent Validity was reported using Average Variance Extracted (AVE), which is the amount of variance at the indicator over and above the construct. All AVE values were above the 0.50 rule of thumb reported in prior research (Fornell & Larcker, 1981) — 0.735 to 0.762, each construct accounts for more than 73% of the variance in its indicators. The validation of discriminant validity was carried out using the Heterotrait-Monotrait Ratio (HTMT). This HTMT matrix further justified the validation of discriminant validity. According to Henseler et al. (2015), the values of HTMT should be less than 0.90 to state that the constructs are empirically distinct. In this study, all the HTMT values lie between 0.728 and 0.798, well within the acceptable threshold, meaning that each construct uniquely grasps a separate theoretical concept. This serves to strengthen the credibility of the measurement model since it rules out multicollinearity or conceptual overlap.

**Table No 3: Path Coefficient**

Hypothesis	Path	Beta	t-Value	p-Value
H1	Airline Service Quality > Passenger Loyalty	0.278	3.512	0.001
H2	Perceived Quality > Passenger Loyalty	0.314	3.778	0.000
H3	Airline Service Quality > Passenger Satisfaction > Passenger Loyalty	0.245	4.115	0.000
H4	Perceived Quality > Passenger Satisfaction > Passenger Loyalty	0.268	4.284	0.000

## 4.2 . Structural Model Analysis

A structural model assessment was conducted using Partial Least Squares Structural Equation Modeling (PLS-SEM) to evaluate the hypothesized relationships among the study variables—Airline Service Quality (ASQ), Perceived Quality (PQ), Passenger Satisfaction (PS), and Passenger Loyalty (PL). The analysis covers both direct and mediating effects to test the full path model. Results indicate the model's robustness, with all hypotheses supported.

There is a significant positive relationship between superior service quality and passengers' loyalty, as implied by a path coefficient of  $\beta = 0.278$ ,  $t = 3.512$ ,  $p = 0.001$ . H2. Direct relationship between Perceived Quality and Passenger Loyalty. A path coefficient of  $\beta = 0.314$ ,  $t = 3.778$ ,  $p < 0.001$ , resulted in a significant impact. This means that the passengers' overall quality assessment—not of the single service features—has a meaningful effect on the intentions of loyalty. H3. Mediating role of Passenger Satisfaction between Airline Service Quality and Passenger Loyalty. The indirect  $\beta = 0.245$ ,  $t = 4.115$ ,  $p = 0.001$ , effect was found to be significant, confirming that satisfaction is a leading attendant cognitive mechanism through which a good or bad service is eventually translated into loyal behavior. The mediation is also supported by the Attitude-Behavior-Context framework demonstrated in many other studies in aviation service contexts (Mariska et al., 2025; Anderson, 1994). H4 examines the mediation of Passenger Satisfaction between Perceived Quality and Passenger Loyalty. A statistically significant effect exists ( $\beta = 0.268$ ,  $t = 4.284$ ,  $p < 0.001$ ), implying that the subjective interpretation of service quality by passengers only becomes meaningful in terms of their emotional and cognitive satisfaction.

## 5. Conclusion & Discussion

This research aims to know the influence of Airline Service Quality, Perceived Quality, Passenger Satisfaction, etc., on Passenger Loyalty. The study tries to explore the mediating processes that transform passenger perceptions into a pertinent factor for the actions of

passenger loyalty with specific reference to the Pakistani domestic airline service setting. In the sections below, we explain each hypothesis based on past studies and the peculiar local environment. First, the hypothesis of a positive direct effect of airline service quality on passenger loyalty has supporting evidence from the findings of Parasuraman et al. (1988) that reliability, responsiveness, and empathy directly lead to retention. For instance, strong service performance has been proven to invoke customer loyalty over and over again by Sah, Hong, and Huang (2025) in literally all service settings. Measurable elements of quality in Pakistan's climate, where travelers most often have to experience inconsistent service, can increase loyalty proportionately—for instance, punctuality and staff behavior, as reiterated by Rehman et al. (2023) in Karachi's aviation market.

Our results agree with the findings of Shehata (2025). He proved that the overall impression of the customers, which consists of food, ambiance, and brand image, significantly relates to the rebooking intention. An observation supported by Zamharir (2025), who noted that the perceived value of service increases loyalty even when the discrete metrics of service fluctuate. In the Pakistani environment, where consumer attitudes have taken a turn due to exposure to international airlines, fairness and consistency in the perceived quality of the money and the treatment received by customers can sustain loyalty amidst competitive pressure.

The mediated pathway through passenger satisfaction supports Anderson's (1994) emphasis on satisfaction as a critical intermediary between service performance and loyalty. The study by Mariska et al. (2025) found that tangible service improvements can only translate into loyalty if they create emotional satisfaction. In Pakistan, where there exists a mismatch of expectations and experiences due to service inconsistencies, satisfaction—under the conditions of empathy, communication, and service excellence—is necessary to convert service quality into loyal behaviors.

Research by Yuliana, Saporso, and Fushen (2025) indicated that quality only affects loyalty when satisfaction is present. This is what was also found by Simangunsong (2025), supported later by him, showing that emotional satisfaction completes the quality–loyalty bridge. In the airline market of Pakistan, passengers may recognize good overall service quality, but without satisfactory emotional and cognitive experiences, such as feeling valued, comfortable, and well-treated, they may not stay loyal. Therefore, satisfaction is important for the transformation of perceived value into loyalty..

Research by Yuliana, Saporso, and Fushen (2025) indicates that perceived quality affects loyalty only when satisfaction is present. Simangunsong (2025) further supports this, showing that emotional satisfaction completes the quality–loyalty bridge. In Pakistan's airline market, passengers may recognize good overall service quality, but without a satisfactory emotional and cognitive experience—e.g., feeling valued, comfortable, and well-treated—they may not remain loyal. Hence, satisfaction is crucial in channeling perceived value into loyalty.

## 5.1 Implications of the Study

The study is of critical importance to both academic and managerial practitioners in emerging aviation markets, like Pakistan. On the managerial front, the study implies that, though the technical dimensions of service- punctuality of flights, responsiveness of staff, and onboard facilities are important improvements for passenger loyalty, it is not solely enough to guarantee that a passenger will opt to fly with that airline again. It must be accompanied by the elicitation of customer emotions and satisfaction, which emerged as powerful mediators in creating pull for repeat patronage. This further means investment in employee training that, in addition to inculcating other aspects, also instills empathy, enhances complaint resolution

mechanisms, and designs in-flight experiences representing culture-specific norms of Pakistani consumers. For policymakers and regulators, the findings indicate the importance of setting national service benchmarks, taking into account aspects of operational efficiency and customer satisfaction metrics to improve the overall quality of service in the sector of domestic aviation sector. The study, from an academic perspective, extends existing loyalty frameworks by empirically validating Passenger Satisfaction as a mediating mechanism, thus theoretically bridging gaps in the service quality-loyalty chain. It also underlines once again the imperative need to localize international models (like SERVQUAL or AIRQUAL) to incorporate the regional and cultural variables—an extremely significant consideration in economies that are service-fragile and have gone under-researched. This integrated approach would enhance not only theoretical rigor but also the ability to apply it in practice in terms of designing service strategy and experience for the airline industry..

### 5.2 Limitations of the Study

Though the study contributed valuably, it is important to note several limitations. First, it was cross-sectional, so the data represent only a snapshot view. Therefore, the dynamic process of customer satisfaction and its effect on customer loyalty, especially in such a volatile industry as aviation, could not be considered. Second, it was based only on passengers departing from Karachi and may not have presented the actual consumer behavior from other regions in Pakistan with different socioeconomic statuses and airline preferences. Also, the study considered only five domestic operators; its findings may not apply to international airlines operating to and from Pakistan or to hybrid low-cost carriers offering traditional carrier services. The study relied on self-reported survey data carried out at airports; respondents may have provided socially desirable responses or experienced response fatigue due to other activities typically performed in a travel setting. The study concentrated on major constructs like service quality, perceived value, satisfaction, and loyalty. It did not take into consideration key external factors such as ticket pricing, service failures, loyalty programs, or digital engagement. These factors could also significantly influence outcomes of the dependent variable, which is loyalty.

### 5.3 Future Research Directions

Future research should adopt a longitudinal design to study systematically related changes in dimensions of service quality, which were revealed in this cross-sectional analysis to be associated with satisfaction and loyalty. Research could be designed in a way that dimensions which are found significant and positively associated with passenger behavior in cities like Lahore, Islamabad, and Quetta, among others, are later compared for their passenger behavior across Pakistan. In addition, future studies should introduce more antecedents into their loyalty model, such as the EI of the staff, LPS, e-service quality, and perceived fairness.

Further, studies in the future should examine potential effects of demographic factors (age, gender, frequency of travel), purpose of travel (business vis-à-vis-leisure), and type of airline (full-service versus low-cost) on the relationships in the model as moderating variables. An increase in richness of depth in the analysis would come from using mixed-method approaches, such as supplementing survey data with insights from focus groups or behavioral tracking. Finally, comparisons across different countries or regions would furnish valuable cross-cultural evidence of the validity of the service–satisfaction–loyalty paradigm, especially in other developing economies.

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