



Revenue Generation through Non-Aeronautical Services at Airports in the North Eastern Region of India: A Study on Airports Authority of India (AAI)

Md. Faruk Ahmed

Assistant Professor, Department of Business Administration, Gauhati University
Guwahati, Assam, PIN – 781014, farukahmed385@gmail.com

Ms. Barasha Kalita

MBA Final Year, barashakalita108@gmail.com

DOI : <https://doi.org/10.5281/zenodo.17598376>

ARTICLE DETAILS

Research Paper

Accepted: 16-10-2025

Published: 10-11-2025

Keywords:

COVID-19, commercial activities, financial stability

ABSTRACT

Airports across the world increasingly rely on non-aeronautical revenue streams to enhance financial sustainability, reduce dependency on aeronautical income, and improve passenger experience. In India, the Airports Authority of India (AAI) has also adopted this approach, especially in regional airports where passenger traffic is often limited. This study investigates non-aeronautical revenue generation strategies in the Regional Headquarters (RHQ) of the North Eastern Region (NER). Using financial performance data from FY 2018-2019 to FY 2023-2024, the study analyses trends in revenue sources such as trading concessions, car parking, admission fees, consultancy services, and rentals. The findings reveal sharp fluctuations due to the COVID-19 pandemic, followed by a recovery phase, with trading concessions and admission fees emerging as the most resilient categories. Despite increasing revenue in certain areas, rising expenditure continues to challenge profitability. The study concludes with recommendations for strengthening non-aeronautical revenue generation through innovative service models, regional market integration, and policy support.



Introduction

Airports across the globe have long relied primarily on aeronautical revenues such as landing charges, parking fees, passenger service fees, and navigation charges. While these revenue streams form the backbone of traditional airport income, they are often volatile and highly dependent on passenger traffic volumes, airline operations, and broader economic conditions. With increasing competition among airports, fluctuating air traffic patterns, and global economic uncertainties, airport authorities worldwide are compelled to diversify their income sources. In this context, non-aeronautical revenue has emerged as a crucial and sustainable financial pillar.

Non-aeronautical revenues are derived from a wide range of commercial activities that complement aeronautical operations. These include retail concessions, duty-free shops, food and beverage outlets, car parking, advertising, consultancy services, real estate rentals, and passenger-oriented amenities such as lounges and restrooms. Globally, leading airports have transformed into multi-faceted commercial hubs where shopping, dining, and leisure experiences contribute significantly to financial stability. Such diversification not only enhances revenue but also improves passenger satisfaction and creates employment opportunities, thereby strengthening the airport ecosystem.

In India, the Airports Authority of India (AAI) manages more than 100 airports across different regions, playing a pivotal role in the development of aviation infrastructure. Among these, the airports located in the North Eastern Region (NER) hold immense strategic significance due to their geographical location, proximity to international borders, and potential to promote connectivity and trade. However, airports in this region face multiple challenges, including relatively low passenger density, high operational costs, limited cargo handling facilities, and seasonal variations in air traffic. These factors often restrict the ability of airports to generate sufficient aeronautical revenues, making them financially vulnerable.

Therefore, the role of non-aeronautical services becomes even more critical in the North Eastern Region. By leveraging local resources, cultural uniqueness, tourism potential, and commercial opportunities, airports in NER can create sustainable revenue streams that support financial independence. Non-aeronautical activities such as promoting regional handicrafts, food outlets featuring local cuisine, car rental services, tourism kiosks, and advertising opportunities can enhance both the passenger experience and revenue generation capacity of these airports.

Against this backdrop, the present study seeks to examine existing non-aeronautical revenue generation practices and assess their economic potential in the airports managed by AAI under the Regional



Headquarters (RHQ) North Eastern Region. Using financial performance analysis from FY 2018–2019 to FY 2023–2024, along with secondary literature contributions from Indian authors, the paper aims to propose effective strategies that can enhance the financial sustainability of these airports.

Research Methodology

The present study adopts a descriptive and analytical research design based primarily on secondary data. The data sources include financial performance reports of the Airports Authority of India (AAI) from FY 2018–2019 to FY 2023–2024, existing literature on airport revenue management in India, and relevant policy documents and government reports concerning regional airport development. The scope of the study is limited to airports managed by AAI in the North Eastern Region (NER), with a focus on key non-aeronautical services such as trading concessions, car parking, rent and services, consultancy, admission fees, and restrooms. To analyse the data, the study employs a comparative approach to examine year-on-year financial performance, supported by percentage change methods to capture growth or decline across revenue streams. Further, interpretative analysis has been used to link revenue trends with external factors such as the COVID-19 pandemic, local market demand, and regional economic conditions, thereby providing a holistic understanding of the non-aeronautical revenue potential in the region.

Objectives of the Study

The primary objective of this study is to investigate and propose effective revenue generation strategies through non-aeronautical services at airports managed by the Airports Authority of India (AAI) in the Regional Headquarters (RHQ) North Eastern Region (NER). Specifically, the study aims to achieve the following objectives:

1. To examine the existing non-aeronautical revenue generation practices and strategies implemented at airports within RHQ NER.
2. To assess the economic potential of non-aeronautical services and facilities specific to the airports in RHQ NER, considering local market conditions, passenger demographics, and regional economic dynamics.

Literature Review

Sarkar (2017) in the *Journal of Infrastructure Development* highlighted that retail concessions and commercial real estate have become major contributors to airport revenues in India. His study



emphasized that large airports such as Delhi and Mumbai have successfully adopted the “airport as a commercial hub” model, which serves as a benchmark for regional airports.

Bhattacharya and Ghosh (2019) conducted an empirical study on smaller airports in eastern India and found that food and beverage outlets, regional handicraft stalls, and car parking facilities are significantly underutilized sources of income. They suggested that a greater focus on localized services could enhance revenue without heavy infrastructural investments.

Choudhury (2020), in his book on *Aviation Economics in North East India*, argued that airports in the North Eastern Region (NER) face challenges such as limited passenger footfall and high operating costs. However, he noted that these airports could leverage tourism-related services—such as cultural kiosks, adventure tourism booking centres, and local cuisine counters—to expand their non-aeronautical revenue base.

Patel (2021) examined the impact of the COVID-19 pandemic on Indian airports and observed that, despite drastic declines in passenger traffic, non-aeronautical revenue streams such as retail and F&B provided much-needed financial resilience. The study recommended that airports adopt flexible concession agreements and digital platforms to ensure stability in times of crisis.

Das (2022) analysed the Airports Authority of India’s (AAI) strategies for boosting commercial revenues. He found that public-private partnerships (PPPs) in retail, advertising, and food concessions significantly improved efficiency and profitability, even in smaller airports. The study also recommended integrating local entrepreneurs into airport concession systems to ensure inclusivity and sustainability.

Khan and Roy (2022) in a study on regional aviation markets emphasized that non-aeronautical revenues could serve as a lifeline for airports in low - traffic regions. They noted that land-side commercial development, including logistics hubs and small business centres, could be strategically utilized to generate steady revenue streams for AAI-managed airports.

Sharma (2023) examined the growth of non-aeronautical income at Tier-II and Tier-III airports in India. His findings suggested that digital solutions—such as online parking reservations, prepaid lounge access, and app-based retail orders are effective, low-cost methods to increase revenue without expanding physical infrastructure.



NITI Aayog's PPP and National Monetization Pipeline (NMP) documents frame airport land-side assets (commercial real estate, warehousing, hotels) as long-horizon non-aero revenue levers. They emphasize standardizing concession templates, outcome-based KPIs, and blended finance to derisk regional projects—highly pertinent to AAI airports in the NER.

CAPA India airport outlooks underline that Indian airports moving toward “airport-as-mall” models see higher resilience during traffic shocks. They note four proven growth drivers: curated F&B portfolios, experience-led retail zoning, dynamic pricing for parking/advertising, and omni-channel pre-order for retail—approaches adaptable to the NER scale.

Analysis and Discussions:

Financial Performance of AAI on the basis of total Revenue and Non-Aeronautical Services:

Financial Year 2018-19 & 2019-20

(Rs.in Crore)

Financial Statement item/ Account	2018-2019 (A)	2019-2020 (B)	Absolute Change (B-A)	Increase/Decrease (In %) (B-A)/A*100
Trading Concessions	20.63	37.67	17.04	82.57
Rent & Services	19.55	21.35	1.8	9.21
Car Parking	62.02	65.56	3.54	5.71
Restrooms	0.06074	0.7116	0.65	1070.13
Admission Fees/Commercial Passes	0.8883	0.4986	-0.3897	-43.87
Consultancy Services	0.00	0.0060022	0.0060022	0
Non-Aeronautical	47.37	66.18	18.81	39.70
TOTAL REVENUE	344.66	313.63	-31.03	-9.003
TOTAL EXPENDITURE	473.48	486.62	13.14	2.77
PROFIT/LOSS	128.82	172.99	44.17	34.28

The table compares various financial statement items across two financial years (2018–2019 and 2019–2020), highlighting the absolute changes and percentage increases or decreases. In 2019–2020, there



were significant increases in several revenue streams such as Trading Concessions (82.57%), Rent & Services (9.21%), and Non-Aeronautical Revenue (39.70%). Revenue from Restrooms also showed a sharp rise of 1070.13%, while Car Parking increased moderately by 5.71%. However, income from Admission Fees/Commercial Passes declined by 43.87%.

Despite growth in certain areas, the total revenue decreased by 9.00%, from Rs. 344.66 crore in 2018–2019 to Rs. 313.63 crore in 2019–2020. Meanwhile, total expenditure increased slightly by 2.77%, from Rs. 473.48 crore to Rs. 486.62 crore. Consequently, the organization's profit rose by 34.28%, from Rs. 128.82 crore to Rs. 172.99 crore.

Overall, the analysis indicates that although total revenue fell slightly, a considerable improvement in profit suggests better operational efficiency and stronger performance in specific income streams, particularly in Trading Concessions and Non-Aeronautical Revenue.

Financial Year 2019-20 & 2020-21.

(Rs.in Crore)

Financial Statement item/ Account	2019-2020 (A)	2020-2021 (B)	Absolute Change (B - A)	Increase/Decrease (in %) (B-A)/A*100
Trading Concessions	37.68	113.58	75.9	201.4
Rent & Services	21.36	19.68	-1.68	-7.84
Car Parking	6.56	1.13	-5.43	-82.74
Restrooms	0.071	0.075	0.004	5.63
Admission Fees/Commercial Passes	0.50	0.14	-0.36	-72
Consultancy Services	0.006	0.0052	-0.0008	-13.33
Non-Aeronautical	66.18	32.41	-33.77	-51.02
TOTAL REVENUE	313.63	157.28	-156.35	-49.85
TOTAL EXPENDITURE	486.63	423.85	-62.78	-12.9
PROFIT/LOSS	172.99	266.57	93.58	54.09

The table compares the financial performance across two financial years, 2019–2020 and 2020–2021, showing the absolute change and percentage increase or decrease in various financial statement items. During this period, total revenue declined sharply by 49.85%, from Rs. 313.63 crore in 2019–2020 to



Rs. 157.28 crore in 2020–2021. This decline was mainly driven by significant decreases in Car Parking (–82.74%), Non-Aeronautical Revenue (–51.02%), and Admission Fees/Commercial Passes (–72%). Similarly, Rent & Services and Consultancy Services also registered minor declines of 7.84% and 13.33%, respectively.

In contrast, Trading Concessions showed a remarkable increase of 201.4%, rising from Rs. 37.68 crore to Rs. 113.58 crore, while Restroom revenue recorded a modest gain of 5.63%. Despite the steep fall in total revenue, total expenditure decreased by 12.9%, from Rs. 486.63 crore to Rs. 423.85 crore. This cost reduction, combined with strong growth in Trading Concessions, led to a substantial increase in profit by 54.09%, reaching Rs. 266.57 crore in 2020–2021.

Overall, the financial performance of AAI during this period was mixed with considerable setbacks in non-aeronautical segments and other income streams, yet impressive profit growth achieved through improved efficiency, cost control, and a sharp rise in Trading Concession earnings.

Financial Year 2020-21 & 2021-2022

(Rs.in Crore)

Financial Statement item/ Account	2020-2021 (A)	2021-2022 (B)	Absolute Change (B - A)	Increase/Decrease (in %) (B-A)/A*100
Trading Concessions	11.35	5.15	-6.2	-54.62
Rent & Services	19.68	18.82	-0.86	-4.37
Car Parking	1.13	1.29	0.16	14.15
Restrooms	0.075	0.0697	-0.0053	-7.06
Admission Fees/Commercial Passes	0.1437	0.164	0.0203	14.12
Consultancy Services	0.0051	0.0094	0.0043	84.31
Non-Aeronautical	32.41	25.52	-0.2125	-21.25
TOTAL REVENUE	157.28	191.81	34.53	21.95
TOTAL EXPENDITURE	423.85	370.03	-53.82	-12.69
PROFIT/LOSS	266.57	178.22	-88.35	-33.14

The table presents a comparative analysis of various revenue streams and expenditures for the financial years 2020–2021 and 2021–2022, showing the absolute change and the percentage increase or decrease



for each item. During this period, total revenue increased by 21.95%, rising from Rs. 157.28 crore in 2020–2021 to Rs. 191.81 crore in 2021–2022. This improvement was mainly driven by higher earnings from Car Parking (14.15%), Admission Fees/Commercial Passes (14.12%), and Consultancy Services, which showed a substantial growth of 84.31%. However, several revenue components recorded declines, including Trading Concessions (–54.62%), Rent & Services (–4.37%), Restrooms (–7.06%), and Non-Aeronautical Revenue (–21.25%). Despite these decreases, the overall rise in total revenue indicates a gradual recovery in operations and service-based income.

Meanwhile, total expenditure decreased by 12.69%, from Rs. 423.85 crore to Rs. 370.03 crore. This reduction in spending, though significant, was not enough to offset the decline in some major income streams, leading to a drop in profit by 33.14%, from Rs. 266.57 crore in 2020–2021 to Rs. 178.22 crore in 2021–2022.

Overall, the analysis suggests that while cost efficiency improved and certain revenue categories recovered, the fall in key income sources such as Trading Concessions and Non-Aeronautical Revenue adversely impacted profitability during the year.

Financial Year 2021-2022 & 2022-2023.

(Rs.in Crore)

Financial Statement item/ Account	2021-2022 (A)	2022-2023 (B)	Absolute Change (B - A)	Increase/Decrease (in %) (B-A)/A*100
Trading Concessions	5.15	7.64	2.49	48.34
Rent & Services	18.82	15.07	-3.75	-19.92
Car Parking	1.29	1.45	0.16	12.40
Restrooms	0.0697	0.0513	-0.0184	-26.39
Admission Fees/Commercial Passes	0.164	0.122	-0.042	-25.61
Consultancy Services	0.0094	0.0053	-0.0041	-43.61
Non-Aeronautical	25.52	24.42	-1.1	-4.31
TOTAL REVENUE	191.81	261.23	69.42	36.19
TOTAL EXPENDITURE	370.03	464.59	94.56	25.55



PROFIT/LOSS	178.22	203.36	25.14	14.10
--------------------	--------	--------	-------	-------

The table presents a comparison of various financial statement items between the fiscal years 2021–2022 and 2022–2023, showing the absolute change and percentage increase or decrease for each component. During this period, the organization’s total revenue increased significantly by 36.19%, from Rs. 191.81 crore in 2021–2022 to Rs. 261.23 crore in 2022–2023. This growth was primarily driven by a 48.34% rise in Trading Concessions and a 12.40% increase in Car Parking revenue, indicating a stronger recovery in commercial and service-related operations.

However, several revenue streams showed declines, including Rent & Services (–19.92%), Restrooms (–26.39%), Admission Fees/Commercial Passes (–25.61%), and Consultancy Services (–43.61%). Non-Aeronautical Revenue also registered a marginal fall of 4.31%, reflecting slight weaknesses in ancillary sources of income. Despite a 25.55% increase in total expenditure, rising from Rs. 370.03 crore to Rs. 464.59 crore, the organization achieved an overall profit growth of 14.10%, with profit increasing from Rs. 178.22 crore to Rs. 203.36 crore.

Overall, the analysis indicates that while certain non-aeronautical income sources declined, robust performance in Trading Concessions and Car Parking contributed to strong revenue growth and improved profitability during 2022–2023.

Financial Year 2022-2023 & 2023-2024.

(Rs.in Crore)

Financial Statement item/ Account	2022-2023 (A)	2023-2024 (B)	Absolute Change (B - A)	Increase/Decrease (in %) (B-A)/A*100
Trading Concessions	7.64	11.81	4.17	54.58
Rent & Services	15.07	13.95	-1.12	-7.43
Car Parking	1.45	1.63	0.18	12.41
Restrooms	0.0513	0.09	0.0387	75.43
Admission Fees/Commercial Passes	0.122	0.17	0.048	39.34
Consultancy Services	0.0053	0.00	0.00	0



Non-Aeronautical	24.42	27.67	3.25	13.30
TOTAL REVENUE	261.23	387.74	126.51	48.42
TOTAL EXPENDITURE	464.59	565.97	101.38	21.82
PROFIT/LOSS	203.36	178.22	-25.14	-12.36

The table compares various financial statement items between the fiscal years 2022–2023 and 2023–2024, showing the absolute and percentage changes. During this period, the organization’s total revenue increased substantially by 48.42%, rising from Rs. 261.23 crore in 2022–2023 to Rs. 387.74 crore in 2023–2024. This growth was mainly driven by a 54.58% rise in Trading Concessions, a significant 75.43% increase in Restroom revenue, and a 39.34% increase in Admission Fees/Commercial Passes. Non-Aeronautical Revenue also grew by 13.30%, indicating stronger performance in several ancillary segments.

However, Rent & Services declined slightly by 7.43%, and Consultancy Services remained unchanged during the year. Meanwhile, total expenditure increased by 21.82%, from Rs. 464.59 crore to Rs. 565.97 crore. Despite robust revenue growth, the profit declined by 12.36%, falling from Rs. 203.36 crore to Rs. 178.22 crore, mainly due to the higher rate of increase in expenses compared to revenue. Overall, the analysis suggests that while 2023–2024 was a strong revenue year with notable growth across several categories, the surge in expenditure offset the gains, resulting in reduced profitability.

Comparative study on non-aeronautical service from Current FY 2023-2024 to Previous FY 2018-2019: Comparative study on non-aeronautical service Current FY 2023-2024 to Previous FY 2018-2019 provides a detailed comparison of various non-aeronautical revenue streams over multiple fiscal years.

(For this calculation purpose 2018-2019 is chosen as a base year)

(Rs.in Crore)

Particulars	2018-2019	2019-2020	2020-2021	2021-2022	2022-2023	2023-2024
Trading Concessions	100	182.58	30.15	45.33	148.54	154.48
Rent & Services	100	109.21	92.16	95.63	80.11	92.52
Car Parking	100	105.71	17.25	114.46	114.46	111.98
Restrooms	100	117.16	105.58	92.74	73.7	176.81



Admission	100	56.13	28.83	114.12	74.67	139.01
Fees/Commercial Passes						
Consultancy Services	-	100	86.44	182.64	55.57	-
III. Non-Aeronautical	100	139.72	48.97	78.75	95.67	113.3
Total						

The non-aeronautical revenue streams experienced a significant decline during the fiscal year 2020-2021, likely due to the impacts of the COVID-19 pandemic, with total revenues dropping from ₹139.72 crore in 2019-2020 to ₹48.97 crore. However, a recovery trend is evident in subsequent years, with notable increases in several categories. For instance, Trading Concessions rose from ₹30.15 crore in 2020-2021 to ₹154.48 crore in 2023-2024, and Admission Fees/Commercial Passes climbed from ₹28.83 crore to ₹139.01 crore during the same period. Despite fluctuations in areas like Rent & Services and Restrooms, which saw significant highs and lows, overall recovery patterns indicate resilience and adaptive strategies in response to the disruptions. The total nonaeronautical revenue reached ₹113.3 crore in 2023-2024, reflecting a gradual recovery and the ability to bounce back after the significant declines.

Findings

The study reveals that non-aeronautical revenue streams such as retail concessions, food and beverage (F&B) outlets, advertising, and car parking facilities have emerged as significant contributors to the Airports Authority of India's (AAI) financial performance in the North Eastern Region (NER). Retail and F&B outlets, in particular, have enhanced passenger spending by catering to modern consumer preferences, while services such as car parking and premium lounges have provided stable and recurring income. Additionally, real estate leasing and the provision of airport lounges have contributed to revenue diversification.

A key factor driving this revenue growth has been the steady rise in both domestic and international passenger traffic. The evolving demographic profile of passengers and their growing demand for high-quality services and amenities have created opportunities for airports to introduce modern non-aeronautical offerings. Operational efficiency has also been improved through the adoption of automated systems, partnerships with leading brands, and optimized management of services, which have together reduced costs and enhanced service delivery, particularly during financially challenging periods.



However, the impact of the COVID-19 pandemic disrupted this growth trajectory. Passenger traffic and associated revenues declined sharply during the pandemic, with recovery patterns varying across airports. While airports such as Barapani and Tezpur showed early signs of recovery by 2021–2022, others continued to face prolonged setbacks. The uneven recovery highlighted the vulnerabilities of airports in the region and underscored the need for resilient strategies.

Furthermore, environmental and regulatory challenges continue to pose hurdles for non-aeronautical growth. The study highlights that environmental sustainability pressures, regulatory delays, infrastructure constraints, and growing competition are limiting the full potential of these services. It emphasizes the importance of adopting sustainable practices and digital engagement strategies to align with global standards and evolving passenger expectations. Overall, while AAI's non-aeronautical initiatives in the NER have been instrumental in diversifying revenue, there is a clear need for further improvements in regulatory efficiency, infrastructure expansion, and digital innovation to ensure long-term sustainable growth.

Issues and Challenges

Despite the progress made, several issues and challenges continue to hinder the optimization of non-aeronautical revenue in the region. Regulatory and policy-related challenges remain prominent, as lengthy approval processes for new concessions and rigid government-imposed pricing controls slow down revenue generation and discourage the participation of premium service providers.

Market competition is another concern, with nearby airports offering competitive services that draw passengers and business away from RHQ NER airports. Additionally, internal competition among multiple airports in the region dilutes the passenger and business base, limiting revenue potential for each. Infrastructure-related issues are also significant; limited physical space restricts expansion of retail and F&B outlets, while older airports with outdated facilities struggle to attract premium brands.

Economic factors such as fluctuating currency values and periodic downturns affect passengers' spending power, which directly impacts non-aeronautical revenue. Moreover, rising costs of goods, services, and utilities erode profit margins. Technology and security-related challenges also persist, as technical failures or security incidents can disrupt operations and result in revenue losses. Collectively, these issues point to the need for robust policy reforms, infrastructure investment, and modernized operational strategies to sustain growth in the sector.



Recommendations

To address these challenges and unlock the full potential of non-aeronautical revenue in the NER, several recommendations are proposed. Firstly, regulatory processes must be streamlined. Engaging with government bodies to simplify and expedite approval processes will help minimize delays; while advocating for more flexible pricing policies can attract premium service providers and enhance profitability.

Secondly, enhancing the passenger experience should be a priority. Airports need to invest in high-quality, modern facilities and adopt technologies that reduce waiting times, thereby improving efficiency and satisfaction. Expanding digital engagement is equally important, and the development of mobile apps and online platforms can not only provide convenience to passengers but also open new revenue opportunities through targeted advertising and promotions.

Thirdly, infrastructure investments are crucial. Upgrading existing facilities and expanding space for retail and F&B services will make airports more attractive to both passengers and business partners. Integrating sustainable practices in these infrastructure projects will not only improve operational efficiency but also strengthen the airport's image as a responsible and future-ready entity.

Suggestions and Conclusion

The Department of Finance plays a vital role in ensuring the balanced development of AAI, particularly through effective revenue generation and cost management. The study highlights how different financial divisions within the department coordinate to maintain organizational stability by maximizing income while reducing unnecessary expenditures. Although the analysis of AAI's financial data in the North Eastern Region indicates operating losses, the broader financial performance of AAI has remained profitable in recent years, underscoring the importance of strategic revenue diversification.

Non-aeronautical services at AAI's RHQ NER have emerged as a cornerstone of financial sustainability, significantly contributing to passenger satisfaction and overall airport performance. With retail, F&B, advertising, parking, and other commercial activities showing strong growth potential, these services are positioned to become even more crucial in the years ahead. By adopting the recommended strategies—streamlining regulations, investing in modern infrastructure, enhancing digital engagement, and improving passenger experiences—AAI can strengthen its financial base and position itself as a key driver of regional development.



In conclusion, while AAI NER has shown commendable progress in leveraging non-aeronautical services, the path to sustainable growth requires continuous innovation, strategic management, and proactive adaptation to market dynamics. By addressing existing challenges and implementing targeted recommendations, AAI can ensure not only financial resilience but also its role as a catalyst for the overall development of the North Eastern region.

References

- Sarkar, S. (2017). Retail concessions and commercial real estate as major contributors to airport revenues in India. *Journal of Infrastructure Development*, 9(2), 45-62.
- Bhattacharya, S., & Ghosh, R. (2019). Underutilized income sources at smaller airports in eastern India: An empirical analysis. *Indian Journal of Airport Management*, 8(1), 23-38.
- Choudhury, R. (2020). *Aviation Economics in North East India*. North Eastern University Press.
- Patel, A. (2021). Impact of COVID-19 on non-aeronautical revenues in Indian airports. *Journal of Airport Economics*, 15(3), 112-130.
- Das, P. (2022). Strategies for boosting commercial revenues at Indian airports: Public-private partnerships and local entrepreneurship. *International Journal of Airport Management*, 12(4), 79-95.
- Khan, M., & Roy, S. (2022). Non-aeronautical revenue streams in regional aviation markets in India. *Regional Aviation Journal*, 7(2), 50-67.
- Sharma, V. (2023). Growth of non-aeronautical income at Tier-II and Tier-III airports: Digital solutions and revenue enhancement. *Indian Airport Review*, 14(1), 35-49.