Examination of Airbnb Demand and Supply in India

by

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Abstract

This thesis finds Airbnb occupancy in India low and examines the reasons for it. In particular, it focuses on the curious case of year-round high occupancies of 85% + for RAHO properties, a hospitality company with accommodations listed on Airbnb in Coorg, South India. When comparing RAHO accommodation occupancies with the average Indian Airbnb occupancy of 36% and the average branded hotel chain occupancy of 66%, some questions become apparent. Is RAHO's high occupancy systemic or idiosyncratic? What could be the reason underpinning the occupancy rate differences between Airbnb and branded hotel chains? This is a particularly relevant topic given the changes in the Indian economy. India is a rapidly developing country with an average year-on-year real GDP growth of 5.75% from 2013 to 2023. The GDP per capita has grown by 57% during the same period. This economic development and increased disposable income have resulted in a larger, more powerful middle-income group that travels more often. As a result, the number of domestic traveler visits has doubled from 2013 to 2019. This increasing demand can be more easily met if accommodation supply comes from individual homeowners through online travel agencies (OTAs). The findings aim to inform strategies for improving the supply of suitable accommodations for this target group, particularly non-urban vacation destinations in India. This thesis hopes to provide a valuable resource for entrepreneurs in the space to build sustainable businesses by highlighting the primary reasons for higher occupancies and suggesting approaches for higher occupancy.

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1. Introduction

In March 2022, my business partners and I traveled on vacation to Coorg, India. Coorg is a popular holiday destination for people looking to escape the fast pace of life in Bengaluru City, Southern India. While comparing potential places to stay on Airbnb and other online travel agencies (OTAs), we noticed a lack of quality standalone accommodations at an affordable price of between ₹2000 ($25) to ₹6000 ($75)[1]. For comparison, a study of 5000 plus hotels in India by the company "budget your trip" shows that the average cost of a hotel room in India is ₹3280 ($41). In non-urban areas, standalone accommodations might be especially attractive for larger groups such as family and friends because they offer more space and privacy. Non-urban or rural destinations are characterized by relatively low populations in urban areas, primarily agricultural and forestry land use and traditional social structures and lifestyles[2]. Additionally, standalone accommodations often provide better value per person, making them a cost-effective option for accommodating larger groups of people than branded hotel chain rooms[3]. Travel to less dense forested areas such as Coorg is often for relaxation or leisure, which aligns well with the privacy and space features of standalone accommodations.

Most of the standalone accommodations are homestays run by families as an additional source of income. The homestays that had better-than-average ratings were either too expensive or booked. What remained were lower-rated stays, which had terrible reviews. Having heard about similar experiences from friends and family around the country, I was curious to know why this was happening. We believed that by providing quality rooms at an affordable price, we could start a successful business. To test this, In July 2022, my partners and I began operating four rooms in Coorg with the infrastructure, amenities, and services we felt were lacking in most of the available standalone short-term rental (STR) inventory. The rooms were listed on Airbnb. The name of the company operating the accommodations is "RAHO." As measured by three metrics: occupancy rate, ADR (average daily rent), and rating. The test proved successful and showed higher values when compared to what other Airbnb in the area achieved. Higher values for these metrics directly imply a higher earning property.

[1] Note: Conversion rate was kept at $1 = ₹80

[2] Source: Rural Tourism Definition, UNWTO – World Tourism Organisation

[3] Source: Travelers' Preferences for Peer-to-Peer Accommodation Characteristics, Young et al., 2017

These results show at first glance that a quality room at an affordable price does perform well. However, it raises the question of whether this is a unique occurrence or whether it reflects a more significant issue of a supply-demand gap in India.

To investigate further, we approached the problem holistically by first looking at a data set of all Airbnb properties in India that contained the metrics we were tracking. This was followed up by additional investigations detailed in the methodology chapter. These studies aided in understanding the state of the hospitality industry in India. Additionally, it sheds light on the homestay culture in India. Homestays are standalone houses synonymous with Airbnb in non-urban areas where the density does not allow for high-rise buildings to be built feasibly. In India, urban tourism's use of existing city infrastructure makes it more accessible and attractive as a destination choice. This infrastructure includes airports, hotels, and recreation options. In non-urban locations, this infrastructure is not well developed. While most areas have road connectivity, few designed activities and stay opportunities exist for tourists.

An argument can be made that government spending and the building of hotels can improve tourism in non-urban areas. However, the construction of branded hotels restricts operators' ability to charge lower room tariffs to guests. According to a survey conducted of 481 hotels across 126 cities in India, the cost or investment of a budget hotel room (per key) is ₹36.62 lakhs ($45,775)[4]. This severely limits the minimum that guests are charged to allow for a reasonable return on investment. Calculating the return on these room types is beyond the scope of this thesis. However, looking at the average ADR for hotel chains in India of ₹6869 ($85.86) and comparing that with the monthly income of the middle-income Indian, we can see why it would be a significant expense[5]. In comparison, the ADR for RAHO properties is ₹2073 ($25.91). This shows the importance of the homestay sector in creating affordable supply. To better understand the problem under a broader backdrop, it is essential to see it through the lens of the Indian economy and hospitality industry.

[4] Source: Hotel Development Cost Survey India, 2023, Hotelivate

[5] Note: Middle-income households earn between ₹5 Lakhs ($6100) to ₹30 Lakhs ($36,585).

2. Indian Context

2.1. Economy

Since gaining independence in 1947, India's economic journey has witnessed several transformative phases. Initially characterized by an agrarian economy with socialist-inspired policies, India's growth remained modest. The watershed moment came in 1991 when India implemented pivotal economic liberalization reforms in response to a balance-of-payments crisis. This opened doors for foreign investments and reduced bureaucratic red tape, propelling India towards rapid industrialization and modernization. The subsequent decades saw the service sector, particularly the Information Technology (IT) industry, emerge as a dominant growth driver. The IT boom, globalization, and urbanization propelled India to become one of the world's fastest-growing major economies by the 21st century.

The Indian GDP in October 2023 is $3.73 trillion (current price), accounting for 2.78% of the world GDP. It is the fifth-largest economy in the world. The early projection for GDP growth for India in 2023 is 6.3%. This contrasted with the average GDP growth of advanced economies, 1.5%, and that of emerging and developing economies, 4%, is quite significant[6]. It is the fastest-growing economy among the top 10 largest economies of the world. An indication of different GDP growth rates according to a map from IMF for 2023 is shown below in Figure 1.

[6] Source: World Economic Outlook, IMF 2023

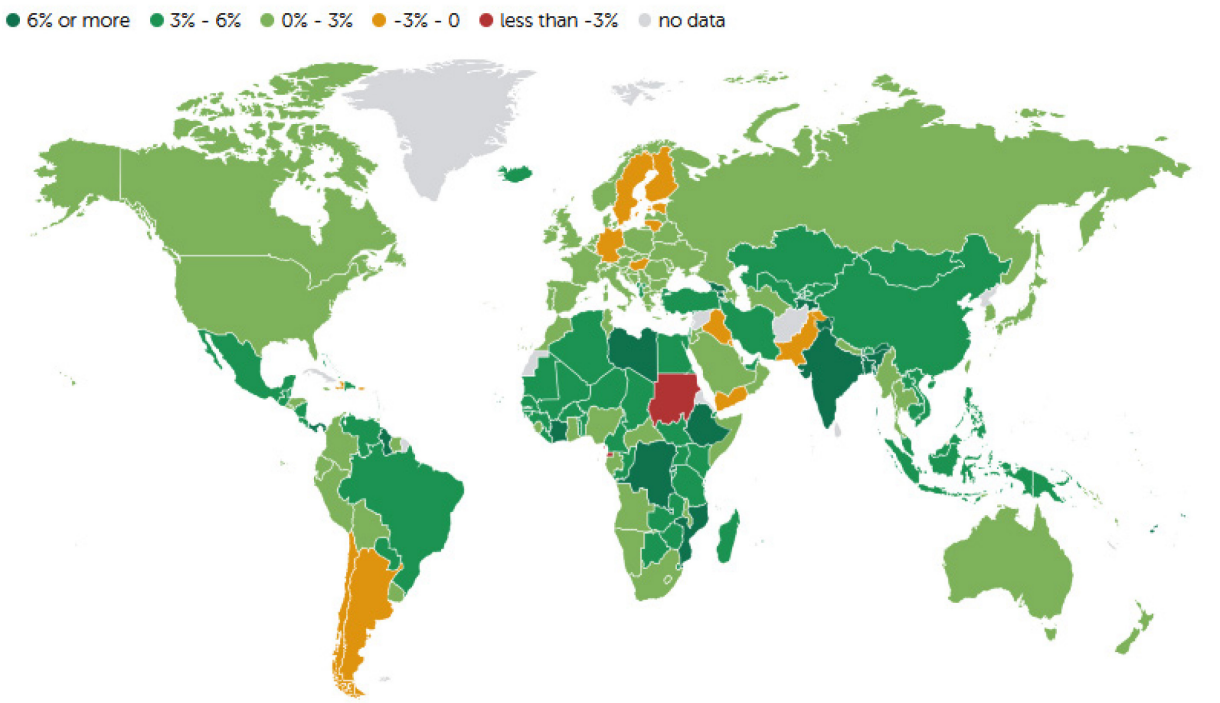

Figure 1. GDP growth rates of countries

The Indian economy is predominantly categorized into three main sectors: services, agriculture, and industry. The services sector, which includes IT, banking, real estate, and tourism, is the most significant contributor to the nation's GDP, reflecting India's global recognition in IT and software services and its expanding urban middle class. Agriculture, traditionally the backbone of the Indian economy, still plays a crucial role, especially in rural employment, with major crops like rice, wheat, and tea. However, its contribution to the GDP has declined, partly due to the rise of urbanization and industrialization. The industrial sector, encompassing manufacturing, construction, and mining, boasts a diversified base with textiles, chemicals, and steel as critical industries[7]. The 2022-23 sector-wise GDP, according to the Ministry of Statistics and Programme Implementation, is shown below in Figure 2. According to Indian Tourism Department Statistics, the hospitality and tourism industry accounted for a $92.4 B direct contribution to the GDP in 2022.

[7] Source: Ministry of Statistics and Programme Implementation (12,13)

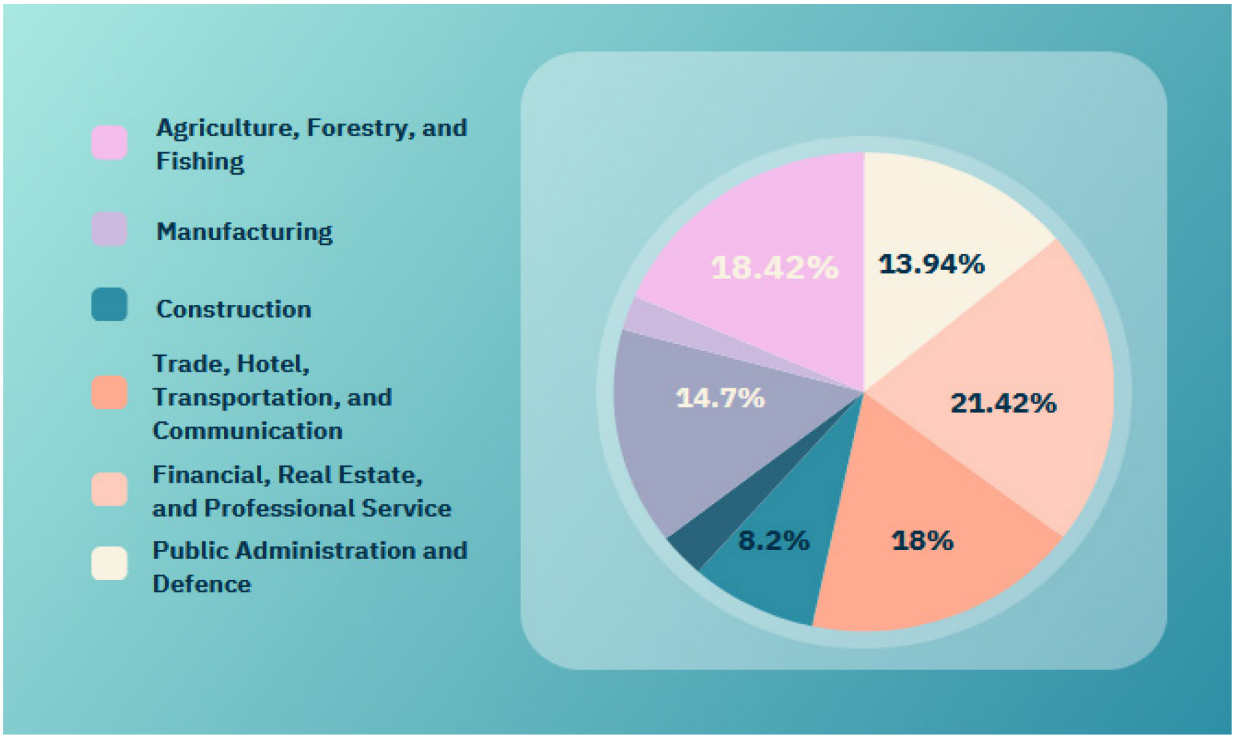

Figure 2. Sector-wise GDP

It is important to understand what consumer category is targeted for these accommodations. The survey data from guests who stayed at RAHO properties show that guests' annual income matches the classification for the middle-income category as per PRICE. This is shown in Table 11 in the appendix. The classification as per PRICE, "People's Research on India's Consumer Economy," is shown below in Figure 3; the middle income is defined as households earning between ₹5 Lakhs ($6100) to ₹30 Lakhs ($36,585). The number of people in this segment was 432 million as of 2021[8]. To give context to this number, the entire population of the USA is about 330 million as of 2021.

[8] Source: PRICE Projections based on ICE 360 Surveys, 2021

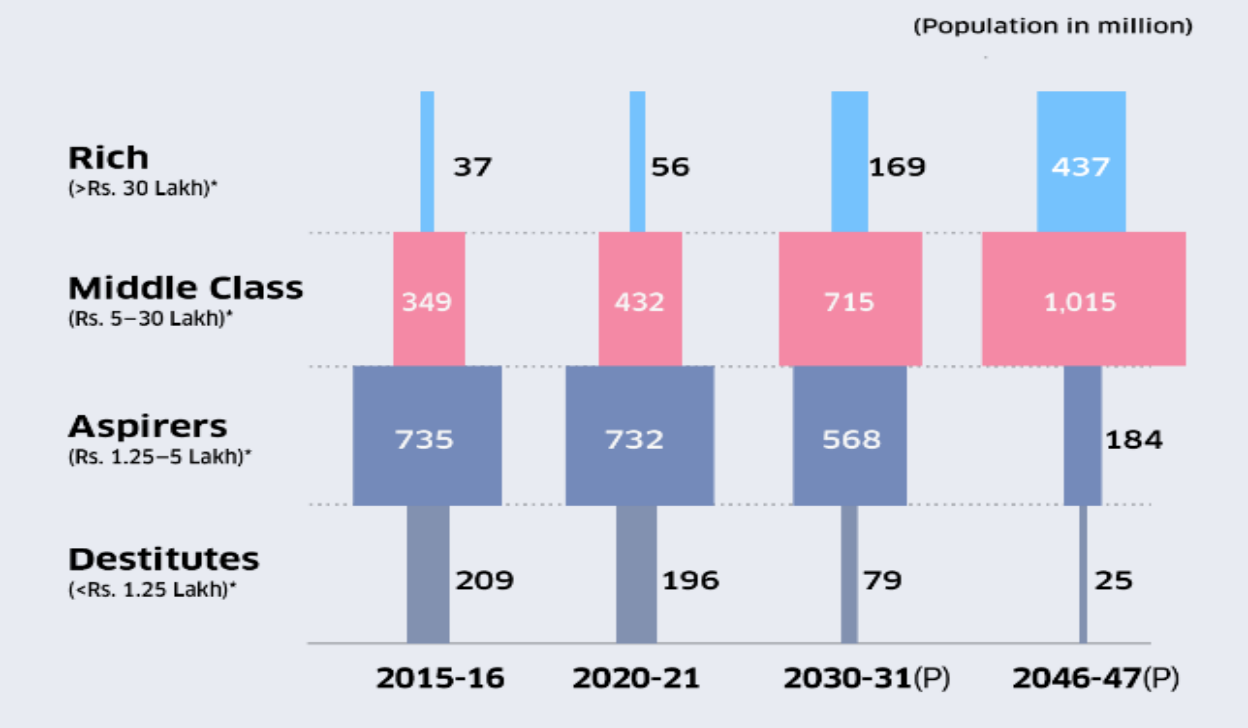

Figure 3. Indian income pyramid

The 2021 middle-income group comprises 30.5% of the Indian population. From the above income pyramid, we can see that the middle-income group is expected to grow to 165.5% of the population in 2020-21. Considering travel patterns stay the same, this would result in significant growth in the hospitality industry's size. Additionally, aggregate trips are expected to increase from 2.3 billion in 2019 to around 5 billion in 2030.[9]

2.2. Hospitality in India

India is a vast country that covers approximately 3.29 million square kilometers (1.27 million square miles). It has the largest population in the world, which was 1.41 billion in 2021[10]. It comprises an eclectic variety of cultural and ecological zones, such as the Himalayas, the Konkan coast, the Thar Dessert, and the Sundarbans. To give the reader a sense of the cultural diversity, there are 75 major languages spoken across India[11]. India has a rich historical legacy, having seen numerous civilizations, such as the Indus Valley civilization, the Mauryas, and the Cholas. This tapestry of ecology, culture, and history forms the foundation for the tourism industry.

[9] Source: How India Travels – Booking.com and Mckinsey
[10] Source: World Bank
[11] Source: Anthropological Survey of India

India recorded 677.63 million domestic tourists in 2021 and 10.56 million foreign tourists in 2018 (pre-covid)[12]. To measure and understand the economic significance of its tourism sector, India utilizes the Tourism Satellite Account (TSA) framework, endorsed by the United Nations. The TSA provides a comprehensive assessment of the contributions of tourism to the economy, focusing on critical aggregates such as the Gross Value Added of the Tourism Industry (GVATI), Tourism Direct Gross Value Added (TDGVA), and Tourism Direct Gross Domestic Product (TDGDP). Demand and supply-side information collected from various sources, including domestic and international tourism surveys, employment surveys, national accounts statistics, and supply-use tables, is considered to compile this data. Hospitality in India accounted for 5.19% of the GDP in 2020. The industry's GDP is expected to record an annual growth rate of 10.35% between 2019 and 2028[13].

The supply of short-stay hospitality accommodations for leisure travelers in India comes from various sources, each catering to different preferences and requirements:

1) Chain Hotels: These are part of a larger group or series, operated by the same company or under the same brand, such as the Taj and Oberoi in India. They offer a standardized set of amenities, services, and décor, ensuring a consistent experience across locations. Chain hotels often have subclassifications to cater to different income levels and requirements. This is also the segment for which the most data is available.
2) Non-Chain Hotels: Also known as independent or boutique hotels, these are single-standing properties not affiliated with a larger chain. The service offerings across this segment vary, are not standardized, and range from budget-friendly hotels to luxurious establishments. Companies like Oyo took advantage of this wide range of hotels and sought to provide a standardized product through online aggregation and standard setting[14].
3) Resorts: Specialized accommodations, often situated in scenic or unique locations like beaches or mountains. Resorts aim to provide a comprehensive vacation experience

[12] Source: Indian Tourism Statistics, 2022
[13] Source: Indian Brand Equity Foundation
[14] Source: OYO – Standardising budget hotels across India - Digital Innovation and Transformation. (2019, October 17). Digital Innovation and Transformation. https://d3.harvard.edu/platform-digit/submission/oyo-standardising-budget-hotels-across-india/

with various on-site amenities and activities, eliminating the need for guests to venture outside the property for leisure. These resorts are often a clustering of standalone units.

4) Homestays or Bed and Breakfasts: These offer a more home-like environment, often run by families or individuals. They provide a cozy, intimate setting, often with personalized hospitality and a local experience. This is the most common type of property on Airbnb in non-urban locations in India.
5) Travel Hostels: Catering primarily to budget-conscious travelers, especially younger guests or backpackers, travel hostels offer basic accommodations, often with shared rooms and common areas, promoting a social atmosphere. Several hostel chains have started in the last decade, most notably Zostel.

The data available for metrics on Indian Hospitality are limited to branded hotel chains because of the complexity of assessing the total number of rooms in the unbranded and new-age chain segments. A survey[15] conducted in 2018 estimated the total number of hotel rooms in all categories to be 2.72 million. This is expected to grow to 3.33 million by 2023. This unbranded segment comprises 72% of all hotel rooms. Branded/chain hotels account for 5% of the supply. Homestays are the second largest segment, accounting for 15% of total rooms. This segment is also growing rapidly. New-age hotel rooms such as Fabhotel and Treebo account for 8% of the inventory. This is detailed in Figure 4 by Hotelivate—an Asia-Pacific-focused hospitality consulting firm. As per an Economic Times news article, the number of Airbnb in India is more than 70,000 as of 2021[16]. This estimate is small when compared to the population of India. For instance, Airdna found that the number of Airbnb in the smaller population USA as of 2022 is 1.38 million.

[15] Source: The Indian Travel and Hospitality Report, Hotelivate, 2019

[16] Source: Airbnb surpassed 2019 gross booking levels in India in Q1 of 2021, Economic Times, 2021, July 7,

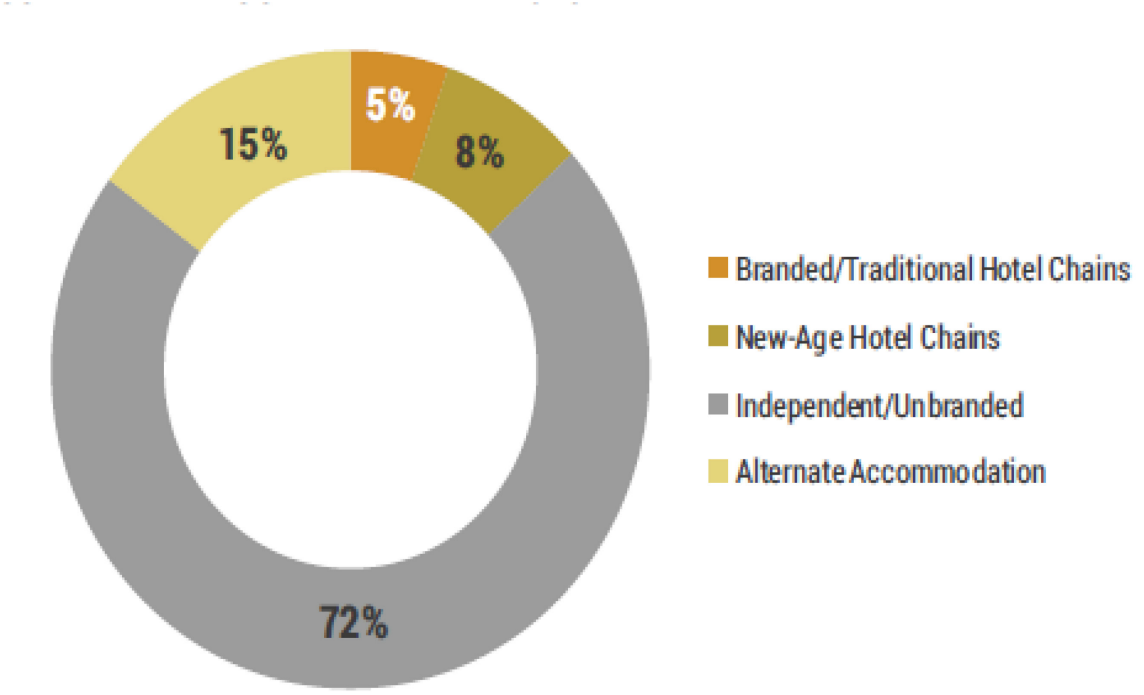

Figure 4. Distribution of accommodation types

Traveling trends have changed in a way that benefits the Airbnb model. Mr. S. Mahalingiah, the secretary of the Karnataka Tourism Society, an organization that works with the Department of Tourism to promote tourism in Karnataka, points out the current trend of shorter, more frequent trips as opposed to long, less frequent trips in the past. He also explains, "The focus is now on experience-based tourism. People no longer just want to travel from place to place; they want to immerse themselves in local experiences, such as cooking, living, and farming activities."

Growth in the hospitality industry was briefly disrupted. 2020 was the worst year for Indian hospitality in terms of Revenue per Available Room (RevPAR) compared to the last 25 years because of the tailwinds of Covid 19. Occupancy was 34.5%, and the ADR was ₹4630. In 2023, the Indian hospitality industry witnessed a significant recovery. The nationwide occupancy for branded and organized hotel sectors reached 66.1%, the second highest in a decade, with an average daily rate (ADR) of ₹6869, the highest in 10 years. This recovery represented a 34% growth in occupancy, a 39% increase in ADR, and an impressive 82% jump in RevPAR compared to the previous year, marking a remarkable turnaround for the industry[17].

[17] Source: Trends and opportunities report 2023, Hotelivate

This chapter discusses that from 2021 to 2030, 283 million additional individuals will be in the middle-income bracket. This represents a 65% increase. If these individuals continue to travel like in the past and if occupancy rates are constant, by 2030, a demand for over 2 million extra hotel rooms will arise. This presents a significant challenge that could be partially alleviated by incorporating available homes instead of new construction.

3. Brief Literature Review

Research papers on Airbnb in the Indian context are limited compared to studies focused on the USA. Those that are available are not looking at the demand for Airbnb compared to branded hotel chains. The following papers focus on decision factors and digital adoption by the Indian consumer.

The paper titled “The Digital Platforms and Homestay Business: A Study in Indian Context” by Sutheeshna Babu S. and Dripto Mukhopadhyay delves into the transformative impact of digital platforms on the homestay sector in India. It highlights the shift of homestay businesses from traditional, offline operations to modern, online platforms, significantly enhancing their reach and revenue. Key insights include increased occupancy rates and expanded market reach due to digital adoption. The paper talks about the unique advantages of this property type to homeowners, such as lower capex expenditure compared to traditional hotels and hosts' unique position in providing guests with cultural insights and cuisines[18].

The paper "Airbnb In India: Comparison with Hotels and Factors Affecting Purchase Intentions” by Devlina Chatterjee and Manohar Giri focuses on Indian tourists’ perceptions of Airbnb compared to other hospitality options. It uses an integrated model based on the theory of planned behavior and social exchange theory to understand factors influencing purchase intentions. The study finds that price, facilities, trust, and authenticity are critical factors for Airbnb users, distinct from resorts and high-end hotels. Of these factors, the price is the most crucial factor for Airbnb selection[19]. This is a significant find because it gives us some context to look at the findings into the demand for Airbnb.

The paper “The Tourism and Hospitality Industry in India: Emerging Issues for the Next Decade” by Sanjeev et al. looks at the hospitality industry holistically and looks to answer the question of what the hospitality industry should work towards to stay competitive in the next decade. The paper also examines the new policies and trends shaping the industry's development. It notes the Indian government’s support for 100% foreign direct investment and improved visa access to boost the sector. Innovations like the “Swachh Paryatan” mobile app for tourist feedback on monument cleanliness are emphasized. Additionally, the paper

[18] Source: The Digital Platforms and Homestay Business: A Study In India Context, Babu & Mukhopadhyay, 2020
[19] Source: Airbnb in India: comparison with hotels, and factors affecting purchase intentions, Chatterjee et al, 2019

discusses the trend of utilizing data analytics for business decision-making in hospitality, the adoption of Robotic Process Automation for operational efficiency, and the rising popularity of homestays as a lodging format supported by government initiatives[20].

Guttentag's paper "Airbnb: Disruptive Innovation and the Rise of an Informal Tourism Accommodation Sector "discusses various reasons behind the rise of Airbnb as an alternative to traditional accommodation options. One of the aspects the paper touches upon is the unique value proposition of Airbnb accommodations, which includes a more personalized experience, the feeling of living like a local, and the privacy of having an entire place to oneself[21]. The privacy element is particularly highlighted by travelers who seek a home-like environment or those traveling in groups who might find a single accommodation unit more conducive to their needs.

"Trends in Consumer Behavior and Accommodation Choice: Perspectives from India" by Shah and Trupp looked at travel patterns and socio-economic backgrounds of travelers in Nainital, a hill station in Northern India. This makes it particularly relevant as a reference because RAHO properties are located in Coorg, a hill station in India. The research identified five factors that led to the selection of accommodation. They are value for money experience, perception of personal space, safety and security, convenience, and homely atmosphere[22]. These findings can help inform marketing strategies and critical accommodation features to improve outcomes for hosts.

The literature on Airbnb in India highlights the transformative impact of digital platforms on homestays. Airbnb's unique value propositions include personalization, privacy, and a homely atmosphere. Studies show a shift from traditional to online operations, enhancing occupancy and reach. There is a recurring theme in the importance of understanding consumer preferences, indicating a shift towards more tailored, culturally rich, and economically efficient lodging options.

[20] Source: The tourism and hospitality industry in India: emerging issues for the next decade, Sanjeev et al, 2019

[21] Source: Airbnb: disruptive innovation and the rise of an informal tourism accommodation sector, Guttentag, D, 2013

[22] Source: Trends in consumer behaviour and accommodation choice: perspectives from India, Shah &Trupp, 2020

4. Methodology

This study employs a mixed method approach, in which the primary and secondary data are analyzed quantitatively, and the data results are explained qualitatively through discussions with stakeholders. The guest survey and interview questions asked to stakeholders are listed in the appendix. Pre-research interviews are conducted to gauge the state of the hospitality industry. These conversations probed into regulatory challenges, market perceptions, infrastructural bottlenecks, and cultural dynamics that shape the hospitality sector. Post-research interviews are conducted to better understand the results of quantitative analysis by seeking to answer the questions raised in the abstract.

The primary reservoir of data is from Airdna, a firm known for its insights into Airbnb's operational metrics[23]. Its data, which comes from an amalgamation of direct data from Airbnb with auxiliary data sources like property management and channel management software, offers a comprehensive view of market dynamics. This data can be indicative of the performance of the properties. Elevated occupancy rates, for instance, could indicate heightened demand or market inefficiencies. The primary data is a list of all the Airbnb in India with data that covers one year from 14th November 2022 to 13th November 2023. Secondary data or guest survey data came from the survey of 400+ guests who stayed at RAHO properties from March 2022 to June 2023 and provided data on demographics and preferences. Furthermore, a dive into academic thesis papers and industry reports provided a view of the Indian Hospitality landscape, particularly concerning Airbnb-type accommodations.

The primary data is examined using summary statistics to understand informative metrics such as average occupancy, most popular locations, and most common accommodation size. A regression is applied to the data to understand how influential each variable is in explaining occupancy. Apart from the discussion and guest survey data insights, a review analysis of properties in Coorg is carried out. The reviews of the best and worst performing properties with similar attributes are compared to understand the property's unique characteristics that are not captured in the high-level metrics such as ADR, ratings, and location.

[23] Note: The data was collected by a team manually from the Airdna website and inputted into a table

5. Quantitative Analysis

5.1. Data Structure and Cleaning

The dataset consists of a structured data collection on 76,833 Airbnb properties organized across ten fields. This is meant to be a comprehensive data set covering all Airbnb in India over one year from 14th November 2022 to 13th November 2023. These fields listed below collectively provide a view of each Airbnb property, covering aspects from basic identification and classification to performance metrics and guest perceptions.

Name of Property: This field contains the names or titles of each Airbnb property. The name often includes unique or descriptive elements that can indicate something about the property's features, location, or style.

Location: This indicates the geographical location of each property. It can include cities, towns, or specific areas within a city, providing insight into the property's setting and surroundings.

Real Estate Type: This field classifies properties based on real estate categories, like 'apartment,' 'house,' etc. It provides a general idea of the property's architectural style and form.

Property Type: This is a more detailed breakdown of Real Estate Type. This category describes the functional type of the property, such as 'Serviced Apartment,' 'Villa,' 'Condominium (condo),' etc. It helps classify properties based on their structure and the accommodation experience they offer.

Number of Beds: Indicates the total number of beds available in each property. This figure is crucial for potential renters to understand the accommodation capacity of the property. It also roughly indicates the size of the accommodation.

Occupancy: This field shows the percentage of time a property is occupied in a year. For example, if a property's occupancy is 56%, the property has guests for 205 days in the year.

Average Daily Rate per Room (ADR): This represents the average rental cost per day for each room. This rate is essential for potential guests to gauge the expense of their stay and for comparisons across different properties.

Rating: Airbnb's rating system is on a scale of 1 to 5. This data shows the average rating given to each property by guests; higher ratings indicate better guest experiences and can significantly influence the attractiveness of a property to potential renters.

Number of Reviews: The total count of reviews received by a property. Many reviews can imply popularity and provide valuable feedback about guest experiences.

Potential Revenue: An estimate of the revenue that a property can generate. This is usually calculated based on factors like the Average Daily Rate per Room, occupancy rates, and the property's appeal (which can be inferred from ratings and the number of reviews).

The following section details the approach to cleaning the data acquired before drawing an analysis.

5.1.1. Data Cleaning

In preparing and cleaning the dataset, several critical steps have been undertaken to ensure its quality and suitability for analysis. Data points with missing values were removed, albeit a small portion of the dataset. Furthermore, the dataset underwent rigorous outlier detection and handling procedures, particularly in numerical attributes like ADR per room, Rating, and Number of Reviews. Using statistical methods and visualization techniques such as histograms, outliers that could significantly skew analytical results were removed. Some of the data was subjected to winsorization—a process involving the capping of extreme values at specified percentiles. In some cases, data transformations, such as log transformations, were applied to mitigate the influence of outliers on subsequent analyses.

5.1.2. Number of Reviews

Figure 5 is a distribution chart for the Number of Reviews in the Airbnb dataset. It comprises a histogram with the distribution of review counts on the x-axis and the number of properties on the y-axis. It additionally has vertical lines to indicate the mean and standard deviation of the review counts. The y-axis was set to a logarithmic scale so that the data could be better visualized.

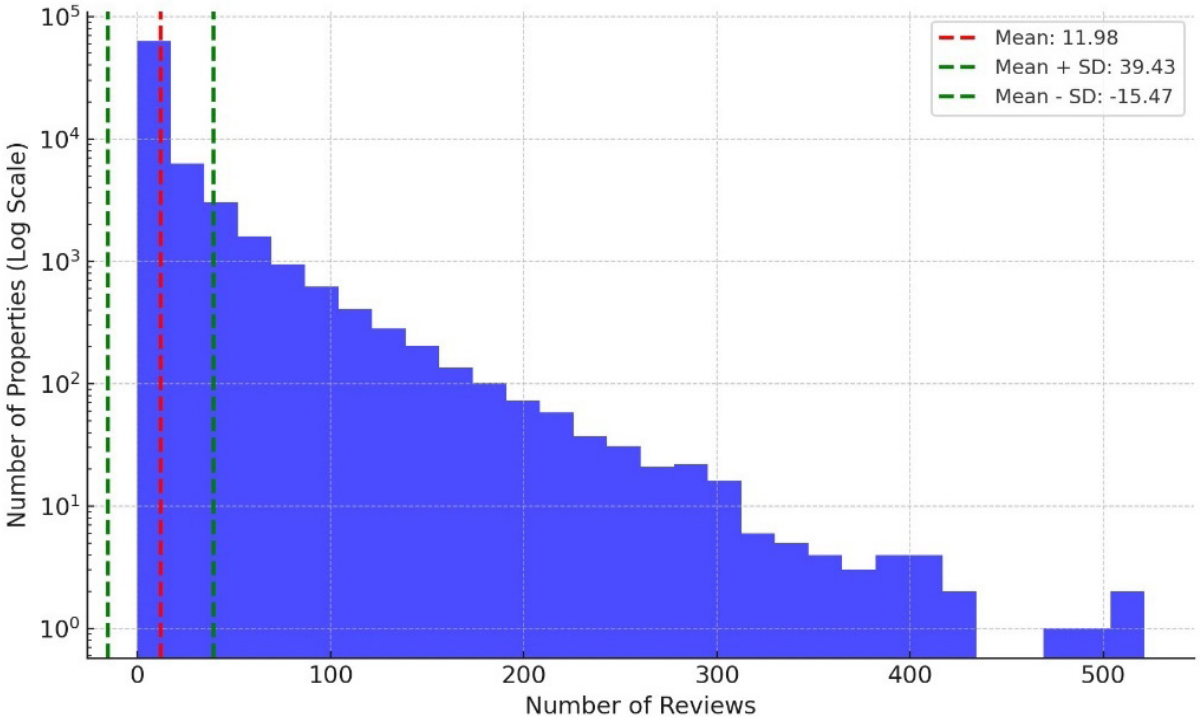

Figure 5. Distribution of number of reviews

The mean Number of Reviews is 11.98. The standard deviation is 27.45. A higher standard deviation implies that the review counts are spread over a broader range of values. The proportion of the total Number of Reviews within one standard deviation of the mean is 91.40%, suggesting that the data distribution is highly concentrated around the mean. The Mean +SD is 39.43, so data points with reviews above 40 were removed from the data set. This leaves us with 70,403 properties. Additionally, all Airbnb with a number of reviews equal to zero or one were removed because these extreme values often indicate anomalies or unrepresentative feedback. Such low scores might not be indicative of the typical guest experience. Removing these outliers helps present a more accurate and reliable analysis of the property's quality and guest satisfaction. After removing unrepresentative feedback, the number of data points is 33,947[24].

5.1.3. Number of Beds

Figure 6 is a graph with the Number of Beds on the x-axis and the Number of Properties on the y-axis. Based on the filtered dataset of properties between 2 and 40 reviews, the mean number of beds is 2.01. The standard deviation is 1.71.

[24] Note: Most of these removed data points had a rating of zero, which is not possible for Airbnb ratings. This could indicate inaccuracies in the data set.

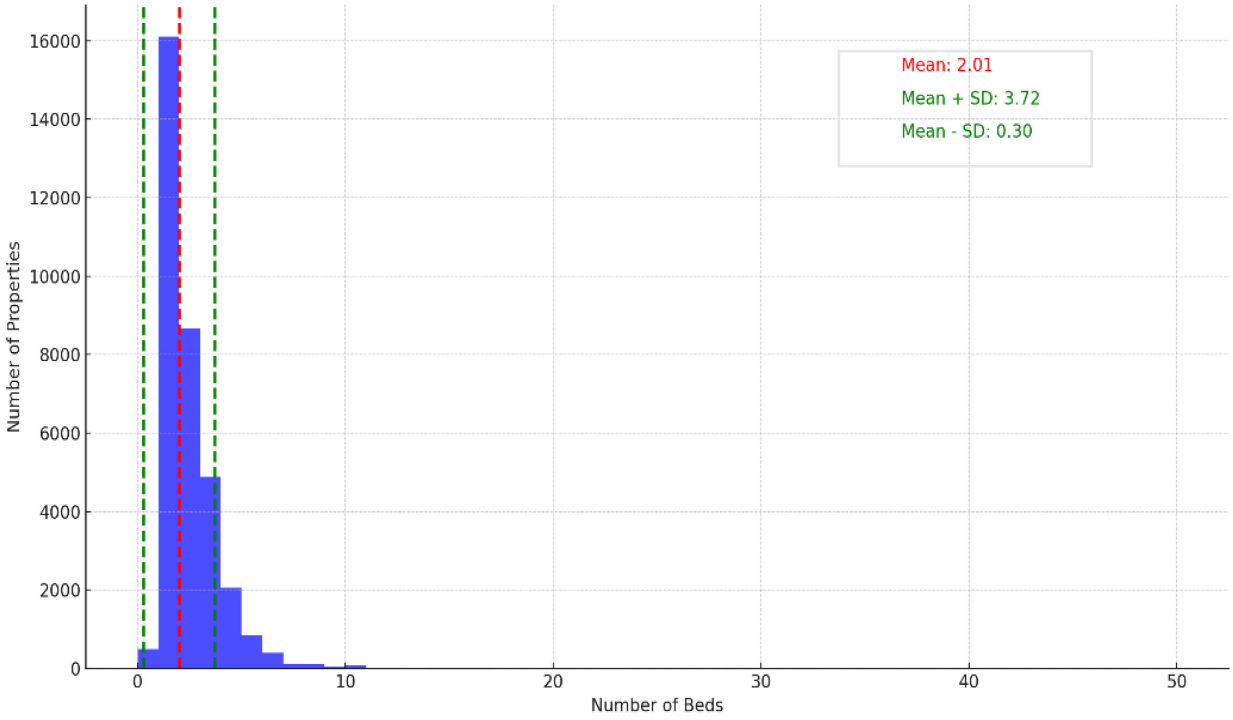

Figure 6. Distribution of the number of beds

This high standard deviation indicates a considerable variation in bed numbers among properties. Notably, 87.38% of the properties fall within one standard deviation of the mean. The histogram of this data suggests a homogeneity in the market with a focus on smaller properties. While most properties are small, a few with a significantly higher number of beds point to a potential niche market for larger groups or events. Data points with above four bedrooms were removed. Data points with zero beds were not eliminated because these indicate studio-type properties. The remaining number of data points is 32,215.

5.1.4. Removal of null data points

Some properties listed have no values for average daily rate per room and ratings. These have been omitted from the data set as Airbnb properties cannot be listed this way. The remaining number of properties is 32,011.

5.1.5. Identifying RAHO properties in the data

RAHO operates two properties in Coorg, India, as shown in Table 1. The data points were found in the data set and within the parameters established. It is important to examine the performance of these properties within the larger context of the other Airbnb properties in India.

Name	Address	Property Type	Real Estate Type	Bed	Occupancy	Average Daily Rate per Room	Rating	Number of Reviews	Potential Revenue
The Annexure	Kodagu	Farm stay	unique	1	87.91%	₹ 1,575	4.6	6	₹ 505,479
Tool House	Kodagu	Farm stay	unique	2	99.14%	₹ 2,570	4.8	16	₹ 1,860,038

Table 1. RAHO Properties in the primary data

Things to note are that the occupancies are above 85% for the Annexure and Tool House and that the ADR per Room ranges between ₹1575 ($19.68) and ₹2570 ($32.13).

5.2. Summary Statistics

5.2.1. Performance Metrics

Table 2 shows the five locations with the highest property count. This can be seen as an indicator of areas where Airbnb is popular in India. The closest tier 1 city to RAHO properties, Coorg, is Bangalore. The Reserve Bank of India classifies tier 1 cities as those with well-established real estate markets, businesses, and civic and social amenities. The tier 1 cities are Bangalore, Delhi, Chennai, Hyderabad, Mumbai, Pune, Kolkata, and Ahmedabad.

Location	Property Count
Bangalore Urban	2,831
New Delhi	1,585
Mumbai	1,476
Kullu	1,076
Gurgaon District	1,063

Table 2. Locations with the highest number of properties

As expected, the locations shown in Table 2 are tier 1 cities, except Kullu, a popular non-urban tourist destination. Gurgaon district is adjacent to Delhi and is part of the larger National Capital Region. The guest survey shows that 70% of RAHO's guests travel from Bangalore.

Table 3 displays the properties categorized as apartment, house, unique, and bed and breakfast. 'Apartment' includes properties that are part of a residential building. House indicates a standalone residential structure. 'Unique' encompasses properties that do not fit standard categories, offering unique or unconventional accommodation experiences. 'Bed and Breakfast' includes small lodging establishments that provide overnight accommodation and breakfast, often in a more personal, homely setting.

Real Estate Type	Property Count
Apartment	14,102
House	12,966
Unique	2,786
Bed and Breakfast	2,057

Table 3. Number of properties for different real estate type

The Apartment, comprising 44% of all units, is mostly in urban areas, whereas House and Unique accommodations that represent standalone units are primarily in semi-urban and non-urban areas. Table 4 shows the five most common property types classified as Unique.

Property Type	Property Count
Farm Stay	1528
Nature Lodge	350
Tiny House	154
Earth House	137
Hut	117

Table 4. Unique accommodation with the most properties

RAHO properties are classified under 'Farm stay, ' the most common unique property type. A farm stay is an accommodation on a working farm where guests can experience and participate in daily farm activities. A 'Nature Lodge' is an accommodation near a forest or national park, often with opportunities for outdoor activities. A 'Tiny House' is a compact and efficient dwelling, emphasizing a minimalist and often eco-friendly lifestyle. An 'Earth House' is made of mud blocks or adobo, a mixture of straw and mud. This is typical of older standalone houses. Similarly, a hut is a simple dwelling in remote settings, typically made from natural materials. Table 5 details standard statistics for the numerical filtered data set of 32,011 units.

	Number of Beds	Occupancy	Average Daily Rate per Room	Rating	Reviews	Potential Revenue
mean	1.75	36%	₹ 2,597	4.61	11.14	₹ 601,788
median	1.00	31%	₹ 2,053	4.80	7.00	₹ 340,024
std	0.95	23%	₹ 1,974	0.48	9.84	₹ 845,486
min	0.00	2%	₹ 83	1.00	2.00	₹ 8,525
25%	1.00	18%	₹ 1,372	4.50	3.00	₹ 172,236
50%	1.00	31%	₹ 2,053	4.80	7.00	₹ 340,024
75%	2.00	50%	₹ 3,159	5.00	16.00	₹ 679,318
max	4.00	100%	₹ 33,395	5.00	40.00	₹ 16,849,115

Table 5. Statistical summary of accommodation properties

The mean occupancy for Airbnb is 36%, with 50% of properties having occupancies of 31% and lower. In contrast, the hotel occupancy for branded chains for the Indian fiscal year from 1 April 2022 to 31 March 2023 is 66.1%[25]. Later in the qualitative analysis section, we discuss this difference in occupancy by interviewing persons in the industry. Additionally, an explanation is required for the phenomena of relatively high occupancies in the Annexure and Tool House properties in Coorg of 87.91% and 99.14%, respectively, when compared with that of Airbnb.

The analysis results were examined across two dimensions: ADR per Room, which represents the cost for guests, and Rating, which is a proxy for quality and customer experience. Do quality and price explain why the occupancies are so high? Table 6 tabulates the average of the data points shown in Table 1. These averages were used to compare with that of other Airbnb.

Name	Address	Property Type	Real Estate Type	Bed	Occupancy	Average Daily Rate per Room	Rating	Number of Reviews	Potential Revenue
The Annexure	Coorg	Farm stay	unique	1	87.91%	₹ 1,575	4.6	6	₹ 505,479
Tool House	Coorg	Farm stay	unique	2	99.14%	₹ 2,570	4.8	16	₹ 1,860,038
Average					93.53%	₹ 2,073	4.7	11	₹ 1,182,758

Table 6. Average occupancy of RAHO properties

5.2.2. Comparison of Key Metrics

Cost is a major deciding factor when selecting accommodation for Indian travelers, as pointed out by Chatterjee et al. in the paper "Airbnb in India: Comparison with Hotels and Factors Affecting Purchase Intentions."[26] However, our research shows that price is not why guests

[25] Source: The 2023 Indian Hospitality Trends & Opportunities Report, Hotelivate

[26] Source: Airbnb in India: Comparison with Hotels and Factors Affecting Purchase Intentions, Chatterjee et al. 2019

stay at RAHO properties. It is important to note that the data set used in this research is 32,011, far more than the 313 data points used in the above research paper.

We can see from Table 6 that the average ADR per Room for both properties is ₹2073 ($25.91), which is 20.11% less than the average shown in Table 5 for the entire data set. However, the ADR per room for the Tool House is ₹2575 ($32.18). This is a similar price to the average for the data set of ₹2597 ($32.46). This would rule out price as the reason for the higher occupancies seen for RAHO properties. Compared to the ADR of branded chain hotels, the ADR of Airbnb is considerably lower. The average ADR for branded hotel chains is ₹6869 ($85.86)[27]. This is more than 2.5 times greater than Airbnb in terms of cost to guests and can also be ruled out as the reason for the selection between Airbnb and branded hotel chains based on ADR.

The average rating for all Airbnb properties is high at 4.61. The average ratings of the RAHO properties are slightly higher at 4.7. However, the annexure has a rating of 4.6, similar to the average for Airbnb. This rules out quality as the reason for the low occupancies we see the Airbnb properties having. The overwhelmingly positive ratings of an average of 4.61 observed in the Airbnb dataset align with the observations made by Proserpio et al. (2021), who found a similar trend in their comprehensive analysis of Airbnb's reputation system. The authors suggest that the bilateral nature of the platform's reviewing process and the intimate nature of the transactions may contribute to rating inflation, with properties often receiving near-perfect scores[28].

Teubner and Glaser (2018) elucidate the dynamics of star rating scores on Airbnb, identifying survivorship bias as a contributing factor to the platform's rating skewness. Their analysis of Airbnb data over 19 months reveals that while the distribution of rating scores narrows with an increased volume of ratings, the average scores remain relatively constant[29]. This phenomenon suggests that the observed high ratings across Airbnb properties may not be solely due to accumulated positive reviews over time. Furthermore, their findings on churn rates add a layer of understanding to market forces, where listings with lower scores are more

[27] Source: The 2023 Indian Hospitality Trends & Opportunities Report, Hotelivate

[28] Source: A first look at online reputation on Airbnb, where all properties boast high ratings: An overwhelming 94% of properties are rated at 4.5 stars or above. Prosperio et al., 2021

[29] Source: Up or out—The dynamics of star rating scores on Airbnb, Teubner et al., 2018

likely to exit the market, potentially inflating the overall rating quality. Such insights can be applied to the current dataset's high average rating of 4.61, which could be partially raised by the platform's high turnover rate and the exit of lower-rated properties. These dynamics underscore the intricate relationship between rating scores and market behavior, highlighting the potential economic disadvantage for hosts with lower ratings within the Airbnb ecosystem.

Ratings and reviews are looked at in tandem by guests looking to book an Airbnb. The data was checked to see if a relationship exists between ratings and the number of reviews. Figure 7 is a scatter plot of Number of Reviews as a logarithmic scale on the y-axis and Rating on the x-axis.

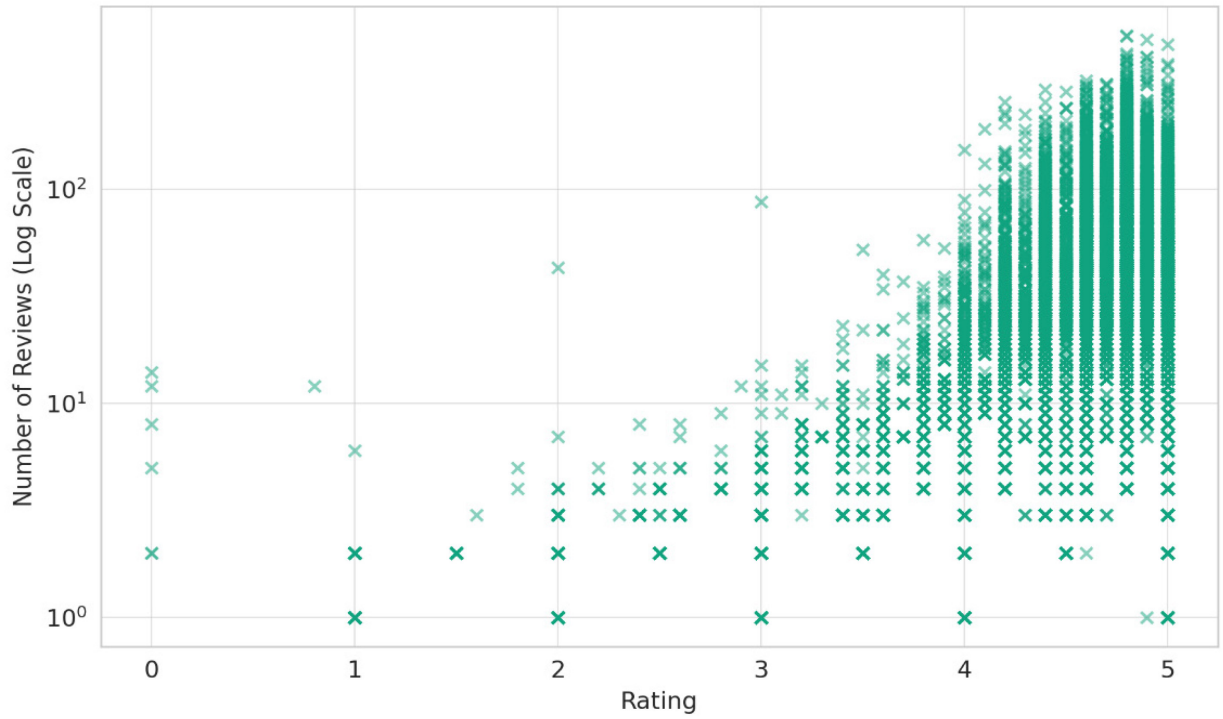

Figure 7. Scatter plot of number of reviews against ratings

The plot reveals a wide distribution of review counts for properties across the rating spectrum, with no apparent strong pattern indicating a clear relationship between higher ratings and a more significant number of reviews. This is especially true considering that most reviews have associated property ratings of above 4. Many properties with high ratings have a low number of reviews, and similarly, properties with lower ratings also span a wide range of review counts. This lack of a strong correlation might suggest that other factors influence the

likelihood of a property receiving reviews beyond just its rating. This aligns with Teubner et al.'s findings that ratings are not strongly correlated to reviews.

The implications of this analysis are significant for property owners and businesses that rely on customer feedback. It indicates that while maintaining a high rating is essential, it may not be sufficient to generate a higher volume of reviews. Property owners might need to actively encourage guests to leave reviews, regardless of the rating they might give.

5.3. Regression

A multilinear regression analysis was carried out to determine the influence of various independent variables on Airbnb occupancy rates. The independent variables analyzed include numerical data such as ratings, reviews, number of beds, Average Daily Rate (ADR), and categorical data like location and real estate type. The variable 'Potential Revenue' was excluded from the analysis to avoid confounding the results. The variable 'Real Estate Type' was excluded to prevent confounding with the 'Property Type' variable. This approach aims to quantitatively assess how these factors collectively impact the occupancy levels of Airbnb properties.

Number of Observations	32011
F(340, 31670)	27.68
R^2	0.2291
Adjusted R^2	0.2208

Table 7. Efficacy and predictive power of regression model

From Table 7, the model's R-squared value of 0.2291 indicates that these variables explain approximately 22.91% of the variability in occupancy rates, with an adjusted R-squared of 22.08%. The model's R-squared value of 0.2291 suggests that a significant proportion of the variance remains unexplained, indicating the potential of adding other independent variables that could explain the occupancies. A value of 27.68 for the F-statistic indicates that the model is statistically significant. It explains the variation in the dependent variable better than a model with no predictors.

Table 8 shows the key findings for the numerical variables. The number of beds has a slight but statistically significant negative impact on occupancy. In contrast, guest rating and the number of reviews have a positive influence, both with strong statistical significance. A rating

increase by one would correspond with an occupancy increase of 5.3%. For every ten reviews added, the occupancy increases by 4.5%. Interestingly, the average daily rate did not significantly affect occupancy rates in this analysis. The coefficient of 0.08807 suggests that the expected occupancy rate is 8.81% when all other variables are zero.

Variable	Coefficient	Std. Error	t value	Pr(>|t|)
(Intercept)	0.08807	0.02356	3.738	0.000186
Bed	-0.005591	0.001498	-3.732	0.00019
Rating	0.05307	0.002461	21.559	<2e-16
Number of Reviews	0.004513	0.0001196	37.723	<2e-16

Table 8. Regression coefficients and key variables

The analysis also revealed the importance of location, with specific locations showing a positive correlation with occupancy rates. This model underscores the importance of reviews and ratings in the Airbnb market while suggesting a significant impact of specific locations on occupancy rates.

6. Qualitative Analysis

6.1. Guest Preferences

Guests who have stayed at RAHO properties were asked to fill out a survey, detailed in the appendix, with multiple questions to collect data on guest preferences. This data sheds some light on the reasons behind the high occupancies. One such question was why guests pick homestays/hotels. This is detailed in Table 9.

Reasons to pick a homestay/hotel	Count	Percentage (%)
Review	70	17.33%
Amenities	33	8.17%
Views	34	8.42%
Location	30	7.43%
Design	7	1.73%
Price	16	3.96%
Look and feel (design)	210	51.98%
Food	4	0.99%
Total	404	100%

Table 9. Guest's reasons to pick an Airbnb

The guest survey shows that the number one reason why a specific accommodation is selected is because of its look and feel. That is to say, how appealing the photos are on the Airbnb profile page. This comprises two parts: the property's design and the quality of the images shown on Airbnb. This is corroborated by several research papers discussing the perception of a property from its photos. Zhang et al., in their research paper "How Much Is An Image Worth? An Empirical Analysis of Property's Image Aesthetic Quality on Demand at Airbnb,"[30] found that replacing low-quality, unverified photos with high-quality, unverified photos could potentially increase a host's annual income by $2,455. The researchers use machine learning techniques to assess the quality of over 380,000 Airbnb listing photos, categorizing them into high and low-quality groups. Further research done by Zhang et al. looks at the attributes that make up a good photo. They list 12 attributes under three aspects: composition, color, and figure-ground relationship.

From Table 9, we can see that the second most significant reason is reviews. The primary data also shows a significant effect of reviews on occupancy. The critical difference between

[30] Source: How Much Is An Image Worth? An Empirical Analysis of Property's Image Aesthetic Quality on Demand at Airbnb, Zhang et al., 2016

reviews in the guest survey data and the number of reviews mentioned in the primary data of Airbnb properties is that respondents perceive the guest survey question as meaning both the quantity and quality of the reviews. In contrast, the primary data only captures the quantity or total number of reviews. Lawani et al. did a sentiment analysis on 2051 hosts' reviews. Sentiment analysis was used to derive scores from guest reviews, providing a more nuanced quality measure than traditional single rating scores. The study identifies multiple quality dimensions, including cleanliness, accuracy, and communication, suggesting that these detailed reviews are better predictors of listing quality and, consequently, affect room prices and demand. The findings imply that more comprehensive reviews, capturing various aspects of the guest experience, play a crucial role in influencing consumer decisions and the pricing strategies of hosts in the sharing economy. Mr. Devraj, AGM of the Karnataka State Tourism Development Corporation (KSTDC), also notes that accommodations for the middle-income group at lower price points lack cleanliness and quality.

The information in Table 9 also matches what was seen in the regression in that the ADRs (Price in Table 9) were not as important in determining the property's occupancy. This signifies that guests are flexible with pricing within a given range, provided they believe they are getting a better property.

6.2. Airbnb Profile Comparison

To further look into the effects of reviews and make them comparable to RAHO properties, the data set was filtered to focus on properties in Coorg. Once filtered, the number of properties in Coorg is 451. The data is filtered for ADR per Room, Ratings, and Occupancy. The review for the best-performing profiles was compared to the worst-performing properties in terms of what is highlighted in each review. For both the best and worst properties, the ADR was filtered for between ₹1500 ($18.75) to ₹4000 ($50) and the rating between 4.6 and 5. The five best-performing properties and five worst-performing properties in occupancies are selected. These properties are shown in Table 10. It can be noted that the Tool House and Annexure are in the top 5 of these properties.

Sl.No.	Best Performing Properties			
	Name	ADR	Rating	Occupancy
1	River point 2	₹ 3,285	5	100.00%
2	Tool House	₹ 2,570	4.8	99.14%
3	The Annexure	₹ 1,738	4.8	87.22%
4	A-Frame cottage amid a coffee estate	₹ 1,747	5	76.92%
5	SAYURI	₹ 2,524	5	76.61%
Sl.No.	Worst Performing Properties			
	Name	ADR	Rating	Occupancy
1	Neravanda Foothill Homestay, Coorg	₹ 2,329	5	6.90%
2	Red Hill Home Stay 1	₹ 3,546	5	8.00%
3	37, Malabar Road-The Yellow room. Virajpet, Coorg	₹ 1,747	4.8	8.47%
4	The Town House: Private room 1	₹ 2,523	5	9.68%
5	Nature watch bedroom (1)	₹ 1,555	4.7	10.67%

Table 10. Best and worst performing properties in Coorg

The range of occupancies for the best-performing properties is between 76.61% and 100%. The worst five properties had occupancies between 6.9% and 10.67%. The reviews from both high and low-occupancy Airbnb properties show common themes around host hospitality, cleanliness, food quality, and overall ambiance. Despite the occupancy rate differences, guests consistently appreciate attentive hosts, clean environments, local cuisine, and the charm or comfort of their accommodations. Regardless of occupancy rates, the uniform positivity in reviews may result from guests' reluctance to leave negative feedback. This phenomenon is known as the positivity bias[31] in online studies. Guests often form personal relationships with hosts during their stay, making them more lenient in their reviews or hesitant to leave critical feedback. Moreover, some guests might feel social pressure not to harm the business of a host they have interacted with personally.

As discussed in the comparison of performance metrics section, guests are reluctant to leave negative reviews because of Airbnb's rating system's structure and social aspects, leading to underreporting of negative experiences. Reviews left by Airbnb guests can be seen without being anonymized by the host. This makes it potentially confrontational.

[31] Source: Hoorens, V. (2014). Positivity Bias. In: Michalos, A.C. (eds) Encyclopedia of Quality of Life and Well-Being Research. Springer, Dordrecht. https://doi.org/10.1007/978-94-007-0753-5_2219

6.3. Alternative Explanations

The data does not entirely explain the results of the difference between Airbnb occupancies and those of branded hotel chains. I interviewed experts from the industry to understand more about this. Mr. Bikramjit Ray, the editor of the Economic Times hospitality section, believes it has to do with the perception of Airbnb by Indian Travelers. He says travelers may have safety concerns and that quality and trust issues persist despite ratings and reviews. Bikramjit points out that while Airbnb is likely to be filled during the weekends for leisure stays, business travelers prefer to stay in branded hotel chains during the week. This leads to hotel chain rooms being occupied throughout the week, which could result in the difference that the data shows. Mr. Alok Belliappa, the Regional Revenue Manager USEA at Accor Group, echoes this sentiment that there is a perception of more excellent safety and security in branded hotel chains.

When looking at how some Airbnb properties with similar ratings, ADR, location, and reviews can outperform others, we must also consider response rate and time. According to Airbnb, the Response rate reflects the proportion of new inquiries and reservation requests you have replied to within 24 hours over the last 30 days. This includes both accepting/pre-approving and declining these communications. Response time is the average time to respond to initial guest inquiries during the previous 30 days. These two metrics are especially important as they determine the search placement given to each property on the Airbnb website. Airbnb rewards attentive hosts by putting their listings higher up on the list. A 2021 study[32] of factors that influence successful bookings found that under host-related attributes, response time was a critical indicator of whether an Airbnb is booked. It can be noted that RAHO typically responds to all guests within 24 hours, and the average response time is 30 minutes. However, more data points on other Airbnb are required to conclude the significance of RAHO's response rate and time.

It is pertinent to remember that most Airbnb are run by individuals for whom operating an Airbnb is not a full-time occupation. As such, they cannot give their full attention and treat this as a priority. Zhao et al., in their paper "Effects of Airbnb Hosts Quality and Quantity

[32] Source: Examining the predictors of successful Airbnb bookings with Hurdle models: Evidence from Europe, Australia, USA and Asia-Pacific cities (Sengupta et al., 2021)

Attributes on Reservation Performance: The Case of Hong Kong," notes that being responsive can indicate trustworthiness, which could affect a guest's decision to book or not[33]. Quicker responses by hosts of professionally run Airbnb, such as RAHO properties with dedicated hosts to interact with guests, could be the reason for higher occupancies.

Some perceived advantages of branded hotel chains over Airbnb are the more significant number of amenities and the availability of hotel staff to assist guests. Mr. Devraj of KSTDC explains, "The essence of hospitality is missing in this segment. Service providers should focus on providing essential services like baby care areas, doctor on call, and basic amenities like hot water and 24/7 electricity."

It could also be that Airbnb has not reached the type of popularity that it enjoys in other countries like the USA. Airbnb was launched in India in 2016 as opposed to 2008 in the USA. CEO of Airbnb Brian Chesky, in an interview with the Economic Times, notes that India's increasing internet penetration and surging middle income make India a potentially large market for Airbnb as it seeks to expand its operations.

[33] Source: Effects of Airbnb Hosts Quality and Quantity Attributes on Reservation Performance: The Case of Hong Kong (Zhao et al., 2019)

7. Conclusion and Recommendations

The demand for Airbnb in India is low, as evidenced by the smaller number of Airbnb in India of just about 70,000. Moreover, from November 2022 to November 2023, the all-India average Airbnb occupancy is 36%. This presents a significant challenge, as India will need to add approximately 2 million rooms by 2030, and it will be challenging to meet this demand through new construction alone. This thesis explored the reasons for these occurrences by examining the various attributes influencing a traveler's decision to book an Airbnb. It centered its discussion around RAHO properties, a grouping of Airbnb properties in Coorg, India.

The data shows that the average occupancy for RAHO properties is 93.53%. This is significantly higher than the average occupancy across Airbnb. The analysis shows that even when comparing properties with similar ADR (Average Daily Rate) and Rating, some properties had much lower occupancies than others. This points to other factors that could be influencing the occupancy rate. This finding is supported by the R^2 value of 0.2291 for a regression run on the primary data set and points to missing independent variables. Additionally, it shows that for increases in rating and number of reviews, there is a significant increase in occupancy but shows no strong link between ADR and occupancy. Furthermore, a survey of more than 400 guests who stayed at RAHO shows that ADR is the fifth of eight factors that guests use to decide whether to book. This indicates that contrary to popular belief of the price-sensitive nature of the Indian consumer, ADR was not found to be an essential factor in the selection of Airbnb.

Other factors that affect occupancy are response rate and time and the look and feel of the property. Evidence from survey data of 400+ guests points to look and feel as being the most important criteria when booking an accommodation, as shown in Table 9.

The occupancy of branded hotel chains is 66%, significantly higher than the all-India average Airbnb occupancy. In discussions with experienced industry professionals, they highlighted the following reasons for the low occupancy: Indian travelers' apprehension about safety and quality, limited awareness of the Airbnb concept, and Airbnb's fewer amenities when compared to branded hotel chains. Additionally, it was discussed that business travel, which

accounts for a large share of trips to branded hotel chains, occurs throughout the week. In contrast, leisure travel on Airbnb occurs mainly on the weekends. This could account for the lower overall demand for Airbnb.

The following are recommendations for Airbnb owners to boost occupancies based on the reasons previously discussed. Airbnb owners can appeal to leisure travelers by offering more activities geared towards this segment. Guests are interested in sightseeing and unique experiences. They should also elaborate on the accommodation's safety and security features, including video surveillance and persons on the property. Since trust was an issue that was highlighted, active encouragement to guests to leave reviews might alleviate this concern. This can be done by offering guests incentives such as discounts on food and services. The guest survey results corroborate the importance of reviews in the selection of Airbnb, which points to the combination of quantity and quality of reviews as being the second most crucial criterion for guests after look and feel. To tackle the look and feel, it is suggested that Airbnb hosts use a professional photographer to improve the quality of the images posted. Additionally, minor changes to the interior to differentiate the accommodation can be pursued to improve the chances of a guest booking.

After filtering the initial data set by removing invalid data points, the remaining data points were 32,011, or 41.66% of the total number of Airbnb initially recorded. This could lead to a potential bias in the research findings. Therefore, while the results provide insights, they should be viewed as indicative rather than conclusive due to the nature of the data set.

Further research should focus on looking at response rates and time across Airbnb in India. It would be helpful if data sources could collate information on this. This would definitively show the impact of the responsiveness of hosts on occupancy. The primary data set could be used to identify the highest earning locations, informing decisions on buying property to list online for short-term rentals. Many properties prefer to list on other OTAs (online travel agency) sites such as Booking.com and Make My Trip. Analyzing data from such websites would give a more comprehensive understanding of the hospitality landscape. The challenge is collating data from these sites without repeating accommodations, as they are often listed on multiple OTAs.

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Appendix

	Family		Friends		Couple		All	
Income Ranges	**Count**	**%**	**Count**	**%**	**Count**	**%**	**Count**	**%**
2 lakhs to 5 lakhs	3	7.1%	3	10.7%	5	12.8%	12	8.6%
5 lakhs to 7 lakhs	3	7.1%	3	10.7%	5	12.8%	13	9.3%
7 lakhs to 10 lakhs	6	14.3%	8	28.6%	4	10.3%	21	15.0%
10 lakhs to 15 lakhs	9	21.4%	4	14.3%	8	20.5%	24	17.1%
15 lakhs 20 lakhs	6	14.3%	4	14.3%	9	23.1%	21	15.0%
20 lakhs to 25 lakhs	2	4.8%	3	10.7%	4	10.3%	12	8.6%
25 lakhs to 35 lakhs	9	21.4%	3	10.7%	2	5.1%	16	11.4%
35 lakhs to 45 lakhs	3	7.1%	2	7.1%	3	7.7%	11	7.9%
Above 45 lakhs	4	9.5%	1	3.6%	4	10.3%	10	7.1%
Total	42		28		39		140	

Table 11. Income of guests staying at RAHO properties

Pre-Research Interview Questions

1) How do you see the growth of the middle-income group in India affecting tourism and hospitality?

2) What are the 2-3 trends in the industry in the supply-demand dynamics?

3) What is your opinion on the services and products provided by aggregators such as Airbnb, Stay Vista, and OYO?

4) How is future demand being forecasted?

5) What are the improvements to Indian hotels and hospitality regarding services or products required to meet travelers' requirements?

6) How does this data inform the government's actions?

7) Which areas in the state are best served and which are not served optimally?

8) How is the government encouraging the growth of tourism in India? What are the new policies being brought?

Post-Research Interview Questions

1) We have found that the average occupancy for Airbnb is 36% for the years 2022 to 2023. The occupancy for this period for branded hotel chains is about 66%. What might be the reasons for this finding?

2) Where do you see the role of Airbnb and other aggregation platforms for non-branded accommodations? Are there any discernible trends?

3) The regression that has been run shows that ratings, number of reviews, location, property type, number of beds, and ADR only explain 22% of the variation in occupancy. What are some other factors that might be influencing occupancy?

4) You have seen our property RAHO and are familiar with it. It is performing better than the average occupancy for Airbnb. It has an average occupancy across the Annexure and Tool house of about 93%. Why might some properties perform better than others? Can you advise hosts that run Airbnb on how to have more occupancy?

RAHO Guest Survey Questions

1) Email:
2) What is your name?
3) How old are you?
4) How do you identify yourself?
5) How often do you travel in a year?
6) On Average, how many days do you spend on each trip?
7) Which locations would you like to travel to in South India?
8) Which location would you like to travel in Karnataka?
9) Where are you traveling from? (Select the closest city)

- Bengaluru
- Mumbai
- Kolkata
- Delhi
- Kochi
- Ahmedabad
- Chennai
- Hyderabad
- Guwahati
- Other

10) Why do you travel (select all that apply)

- Tourism
- Remote work
- Rest and Relaxation
- Special event
- Off-beat experiences

11) What is your annual salary?
12) Why do you choose a property?

- Amenities
- Price
- Reviews
- Look and feel (design)
- Food
- Proximity to activities

13) What are some essential factors to have a great stay? (Select top 3 that apply)

- Good food
- Unique design/ Aesthetics
- The caretaker at the property
- Privacy

- Activities at the property
- Proximity to tourist spots
- Other:

14) How do you plan your travel?
- In advance
- Last minute/ Spontaneous trips

15) In which room did you stay?
- Tool House (3)
- Tool House (4)
- The Tool House (Both Rooms)
- Annexure (1)
- Annexure (2)
- The Annexure (Both Rooms)

16) Who are you traveling with? (select all that apply) *
- Solo
- Friends
- Family
- Couple
- Other:

17) Are you traveling with a pet?
- Yes
- No
- I would like to

18) How would you rate your rooms on a scale of 1 to 5, with five being excellent?

19) Why have you given the rooms the above rating?

20) How was your experience with your host on a scale of 1 to 5, with five being excellent?

21) Do you have any suggestions for the host?

22) How would you rate our staff on a scale of 1 to 5, with five being excellent?

23) How was your check-in process?

24) Were you able to check in immediately after 1 pm?

25) Were you greeted with a welcome drink?

26) Did the staff offer to carry your luggage bags?

27) Were the rooms clean during check-in after 1 pm?

28) Was the room and general area explained?

29) Were you able to check in immediately after 1 pm?

30) Were you greeted with a welcome drink?

31) Did the staff offer to carry your luggage bags?

32) Was the room and general area explained?

33) Were the rooms/cottages cleaned daily?
- Yes, we requested it, and it was done
- No, we did not request it
- We were not in during cleaning hours
- No, we requested it, but it was not done
- Other:

34) Any suggestions for the staff?

35) How would you rate the food provided on a scale of 1 to 5, with five being excellent?

36) Please provide suggestions to improve our food service
37) Would you have liked a travel itinerary or travel packages from us?
- Yes
- No
- Other:

38) What other activities/ amenities/ facilities would you like from us?
39) Would you like to subscribe to our surprise deals/ discount emails?
- Yes
- No

40) How likely are you to recommend our property to a friend on a scale of 1 to 10, with 10 being very reasonable?
41) Do you have any other suggestions for us?
42) Have you previously stayed at a Raho property?
- Yes
- No

43) How did you find out about Raho/ this property?
- Airbnb
- Instagram
- Google search
- Referrals (Heard from someone)
- Other: