

# Competing with Airbnb

**Analytics in Practice: Individual Assignment (100%)**

**Deadline: 24th of April 2024 at 2pm**

## Background

Airbnb, an American entity, facilitates an online platform for short-term lodging options such as holiday cottages, apartments, home-stays, hostel beds, or hotel rooms. It also enables users to engage in tourism-related experiences, like walking tours, and make restaurant reservations. Operating as a brokerage, Airbnb earns service fees from bookings. It stands as a prime example of collaborative consumption and the sharing economy, boasting over 12 million listings and facilitating more than 356 million check-ins. In 2021, Airbnb's worldwide listings generated \$48.9 billion in gross revenues, marking a 76.6% increase from 2020. The global average daily rate (ADR) in 2021 was \$137 per night. As of 2019, Airbnb was valued at 35 billion U.S. dollars.

## Task

You are tasked with consulting for a company that manages a vast portfolio of rental properties in a major city of your choosing. The goal is to develop an accommodation service that can compete with Airbnb, targeting one of three demographic groups: (1) low-income couples with an infant, (2) middle-class retired couples, or (3) high-income single business travellers, all based in a high-income developed country.

Choose a large city and ensure its data is accessible on the ["Inside Airbnb" data repository](#). Your objective is to determine whether a market gap exists for your chosen demographic and how a new service could position itself against Airbnb's market penetration in the selected city.

## Analysis

- Utilize data from the "Inside Airbnb" repository, focusing on the "listings.csv.gz" for detailed information or "listings.csv" for summaries. Other data files may also be considered.
- Analyse key features of Airbnb listings, including price, room types, minimum stay, reviews, location, cancellation policies, review scores, and cleaning fees.
- Broaden your research to include other aspects of your chosen city, such as demographic information, touristic appeal, and social media activity.
- Employ design thinking principles and empathy mapping to understand your target demographic's needs and attitudes towards travel and accommodation.
- **You may use any software, BI tool, or programming language for your analysis.**

## Submission Format and Guidelines

Submit a comprehensive report (limited to a maximum of 2000 words, excluding appendices and references) as a PDF. This report should summarise your analytical journey and findings, presented with a professional layout and engaging narrative about the chosen city. It should also include a summary of the empathy map results to provide insights into the target demographic's needs and preferences.

The report should consist of:

1. **Title Page:** Includes the report's title and subtitle for easy identification.
2. **Executive Summary:** Offers a succinct overview of the report's key findings, methodology, and proposed recommendations. This section distils the essence of the report into a few sentences, providing readers with a clear understanding of the report's value and insights without needing to dive into the full text (10% of grade).
3. **Introduction:** Provides a brief but thorough introduction to the city's touristic appeal, accommodation market, and any relevant socio-demographic information pertinent to your target demographic (10% of grade).
4. **Empathy Maps:** Summarizes the empathy mapping process and its outcomes, highlighting the needs, experiences, and attitudes of the target demographic group towards travel and accommodation (20% of grade).
5. **Analysis and Results:** Details the data sources and methodologies employed in the analysis, presenting the findings with the aid of visual aids, graphs, and diagrams. This section demonstrates how the data, including from the "Inside Airbnb" repository and other relevant sources, were used to identify market gaps and opportunities (50% of grade).
6. **Conclusions:** Offers a concise summary of the key discoveries, acknowledges the limitations of the analysis, and suggests avenues for future research (5% of grade).
7. **References:** Lists all sources cited or referenced throughout the report, formatted according to the Harvard Bath referencing style, ensuring academic rigor and integrity (5% of grade).
8. **Appendix:** Contains supplementary materials that support the analysis, offering additional depth and context to the report's arguments and recommendations.