#### A DECISION MODEL FOR SELECTION OF THE BEST AIRLINE COMPANY: A CASE OF LONDON-ISTANBUL ROUTE

#### ABSTRACT

This study aims to evaluate the preferences of passengers for airline companies. The research provides a decision model to determine the factors affecting airline company selection of passengers, to prioritize these factors, and to find the most preferred airline company. A case study is implemented for scholarship students flying at the London-Istanbul route. Based on the literature review and interviews, the main criteria are deduced as image of the company, service quality, ticket price, total duration, existence of direct flight, loyalty program, and access to/from the used airport of the company. The problem on hand can be addressed by AHP. The findings of the case study will reveal the preferences of students for airline companies at the selected route and the importance of criteria.

Keywords: airline companies, air transportation, AHP

#### **1. Introduction**

Air transportation has become steadily more important in recent years as a mode of transportation (Chantarapanich *et al.*, 2014), especially for passengers. The growing importance of the air transportation has led to increase in the number of airline companies and this has resulted in fierce competition in the industry (Görkem and Yağcı, 2016). This being the case, in order to be more competitive and to expand their market shares, airline companies have had to satisfy their customers by providing a variety of services and value added activities with high standards.

With the aim of retaining existing customers as well as acquiring new ones, airline companies need to offer much and different services. Yet, while companies try to step forward among others by offering various services, diverse number of criteria have arisen to choose the best airline company, which turns into a selection problem for customers. Since multiple criteria exist in this selection and different criteria play dissimilar role for each customer, a suitable approach have to be applied to address this vagueness. In such cases, multi-criteria decision making (MCDM) methods offer realistic and accurate solutions. Thus, in order to overcome this problem, first, there is a need to identify the core selection criteria from the pool of indicators and, then, to decide their priorities with the help of MCDM techniques. Accordingly, this study aims to establish a decision model by identifying important criteria to select the most suitable airline company and, then, to prioritize these criteria by using the Analytic Hierarchy Process (AHP) method.

## 2. Decision Model

In this on-going study, the evaluation of preferences of passengers for airline companies is taken into consideration. For this purpose, the goal is stated as:

• selecting the best airline company

Based on the literature review and interviews with passengers, the main evaluation criteria are deduced as follows

• image of the company

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- service quality of the company
- total fare
- total duration
- existence of direct flight
- loyalty program of the company
- access to/from the used airport of the company

### 3. Analysis

The authors of this on-going study mainly use two methodological approaches.

Firstly, the AHP method (Saaty, 2005) is used to prioritize the presented criteria in the model due to its unique feature by offering realistic results on a basis of a top-down hierarchy.

Secondly, during the selection of the research sample, a non-probability sampling technique, purposive sampling, is used since it allows researchers to select respondents based on their judgments in order to meet research objectives (Saunders *et al.*, 2009). Hence, decision-makers of this study are selected from the scholarship students using London-Istanbul route.

The findings of the case study will reveal the priorities of the scholarship students using this route in terms of: the preferences for the airline companies and the importance of the criteria.

# 4. Conclusion

This study investigates to identify and prioritize the selection criteria for the best airline company choice on the London-Istanbul route. In order to address the research problem regarding the prioritization of the criteria and the selection of the most suitable airline company for customers, the AHP method is proposed in this research.

The results of this study will not only be useful for the customers using this route but also for the airline companies in terms of understanding the relative importance of the selection criteria. Thus, by using the outcome of this study, airline companies can organize their operations and/or marketing strategies in order to increase their competitiveness.

## **Key References**

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