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## Identifying factors affecting tourist destinations in Iran: Supervised Learning Approach

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## Abstract

Nowadays, numerous features and variables influence tourists' destination choices. With the increase in tourist data and advancements in analytical tools, data analysis in tourism has grown. This article implements three supervised learning algorithms—Random Forest, Support Vector Machine, and Gradient Boosting—on tourist data from Iran for the periods 2015-2018 and 2019-2021. Additionally, it examines the correlation between the number of tourists and various features. The results indicate that history-based sites, such as museums, castles, and historical places, along with caravanserais, are the most effective and popular attractions influencing tourist destinations.

Keywords: Tourism, Data Analysis, Machine Learning, Supervised Learning

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