

Assignment4

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CHOOSEN TOPIC

coffee dataset

Summary

This dataset includes 3,547 coffee shop transactions, including details such as the type of coffee purchased, amount spent, payment method, and the exact time and date of purchase. It also includes categorized information such as time of day, weekday, and month, making it useful for analyzing customer preferences, sales patterns, and payment behavior across different time periods. Our goal is to analyze sales patterns by time, day, and month. In this dataset, the target column is money.

This dataset captures information about what customers buy, how much they spend, how they pay, and when they shop. It also includes coffee shop transaction records. This dataset provides background information for examining consumer preferences, payment patterns, and sales trends over various periods, and for comparing payment methods across time periods and seasons.

This type of dataset helps businesses make data-driven decisions and optimize their operations:

1) Customer Behavior Analysis:

- Identifying the most popular coffee varieties to make menu and product development decisions.
- Understanding which products customers prefer at which times of day to optimize marketing and operational strategies.

2) Inventory and Supply Management:

- Accurately forecasting future product demand based on historical data, thereby reducing overstocking/outage issues.

3) Marketing and Promotion Strategies:

- Running targeted promotions during specific hours or for low-selling products.

4) Business Performance Tracking:

- Measuring the business's overall performance and growth areas by monitoring sales trends (daily, weekly, monthly).

5) Financial Analysis:

- Analyze revenue streams and popular price points based on sales volumes and payment methods.

Dataset Description

<https://www.kaggle.com/datasets/ayeshasiddiqua123/coffee-dataset/data>