ML Problem Statement

Mentorness Internship Program

Project Name: Sales Forecasting for Furniture Store

Welcome to the Machine Learning project, focused on forecasting the sales of a furniture store. In this project, you will delve into the world of time series analysis, exploring various techniques to predict sales and optimize inventory for sustained business operations.

Problem Statement:

For a retail furniture store, predicting future sales is critical to avoiding inventory issues like overstocking or under-stocking. The challenge lies in utilizing time series data from the superstore dataset to forecast furniture sales for the next year accurately. This predictive insight ensures an optimal customer experience, avoids losses, and maintains store sustainability.

Your Mission:

Your mission in this project is to forecast furniture sales by leveraging time series data. Follow these key steps:

1. **Understanding Time Series Data:**
   Dive into the superstore dataset and grasp the fundamentals of time series data.

2. **Checking Components of Time Series:**
   Identify and analyze the various components of time series data, such as trends and seasonality.

3. **Forecasting Techniques:**
   Utilize a range of time series forecasting techniques to predict furniture sales for the next year.

4. **Visualization in Time Series:**
   Develop an understanding of effective visualization techniques for time series data.

Learning Outcome:

By the end of this project, you will gain a deeper understanding of trends and seasonality in time series data. You'll distinguish between prediction and forecasting, acquiring valuable skills in handling and interpreting time series information.

Are you ready to embark on this exciting journey of forecasting furniture sales and optimizing business strategies? Let's get started!