

Using data to drive strategic business decisions for Microsoft to make decisition to venture into the movie industry

## **OVERVIEW**

The objective was to examine data on movies to determine why they perform the way they do and recommend the best types of movies for Microsoft's new studio to produce. The success of James Cameron's Avatar movies shows that choosing the right types of films can bring in good results. Historical data on films can help determine what types of films to invest in.

## **BUSINESS UNDERSTANDING**

Producing profitable films is crucial for Microsoft's new studio, as it yields benefits for shareholders, employees, and customers alike. Shareholders experience increased profits, ensuring a positive return on investment. Employees are rewarded with competitive compensation, fostering job satisfaction and motivation. Additionally, customers are treated to a steady stream of high-quality films, enhancing their entertainment experience. Focusing on profitable film types is essential for Microsoft's success in the industry.

## **DATA UNDERSTANDING**

Sources of Data To understand the types of films the new Microsoft studio needs to produce, we first need to examine how the industry has performed, films that have performed well in the box office and their genres, and try to use statistical data to infer the reasons why they performed well and how that can be replicated by the studio.

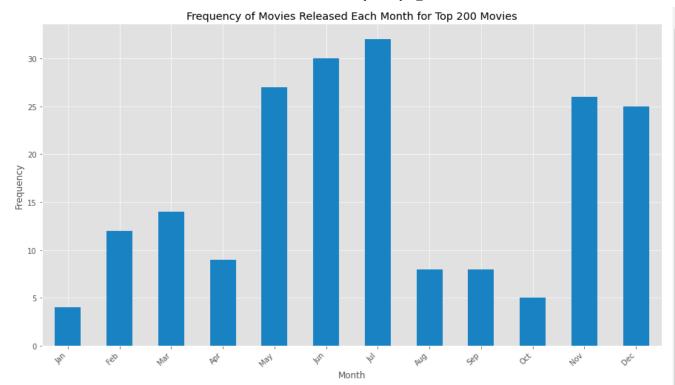
Description of Data Datasets obtained from movie box sites for this analysis. The data sets are named 'tn.movie.budgets.csv' and \*bom.movie\_gross.csv

The datasets are suitable for the analysis as they provide information on the following:

Production budgets Gross earnings (both domestic and worldwide) Release Dates The information helps us to understand movie performance, Movie popularity, and whether production costs and release dates influence movie performance.

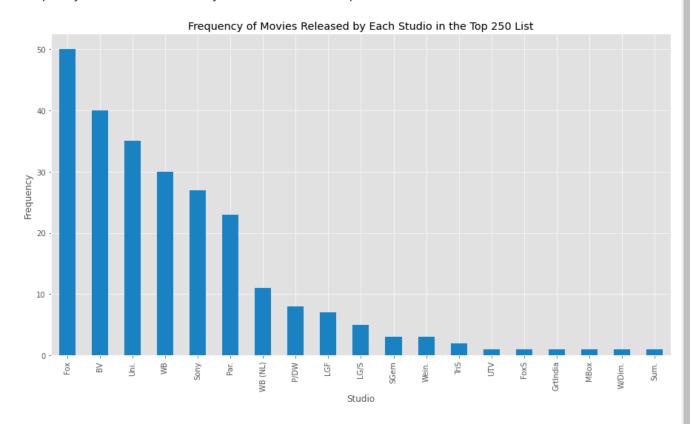
<<<<< HEAD \*\*DATA VISUALIZATION \*\*

Frequency of Movies Released Each Month for Top 200 Movies



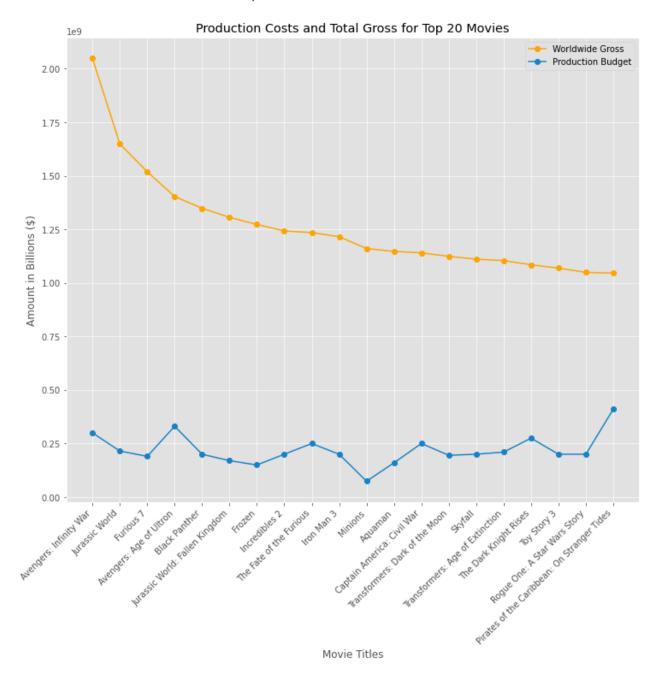
The highest number of movies in the top 200 list were released in MaY ,June and July, November And December, indicating that these months may be more profitable for movie releases. Other factors, such as weather, may also influence people to watch movies more during these months, particularly in June and July when many parts of the world experience colder climates.

Frequency of Movies Released by Each Studio in the Top 250 List



The visualization illustrates the distribution of top 250 grossing movies among various studios. Fox emerges as the predominant studio with 49 movies, trailed closely by BV Pictures with 44 movies, Universal Studios with 39 movies, and WB, Sony, and Par. Pictures with 28, 25, and 23 movies respectively. These studios have demonstrated significant dominance in the market, producing exceptionally profitable films. Consequently, they represent valuable opportunities for Microsoft Studios to either glean insights from or establish strategic partnerships with.

Production Costs and Total Gross for Top 20 Movies



## Recommendations based on Analysis

Analysis reveals significant correlations between various factors, indicating opportunities for Microsoft's new studio to thrive in the film industry.

The examination aimed to uncover relationships between production costs and box office performance, release month and box office performance, as well as production studio and box office performance. Results and visualizations suggest a strong association between production studio and performance. However, correlations are notably weaker regarding production budget and release month.

Based on these findings, I propose four strategic actions for Microsoft's movie development process, listed in order of priority:

1.Forge Partnerships: Collaborate with established production studios. Fox emerges as the frontrunner, boasting approximately 49 movies in the top 250, closely trailed by (BV) Pictures—a subsidiary of Walt

