Analyzing Movie Genres for Microsoft's New Movie Studio

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Overview

To identify successful movie genres

 Assisting Microsoft's new movie studio in data-driven decision-making.



Microsoft's new movie studio aims to enter the film industry and produce successful movies. To make informed decisions and maximize their chances of success, they need to identify the most lucrative and promising movie genres based on recent box office performance metrics.



The data for this analysis was collected from various sources in the film industry such as movie budgets,tmdb movies, bom movie gross, providing a comprehensive view of different aspects of movies and their performance.

Data cleaning

- Handling missing data:
 Removal of rows with
 missing values or replacing
 with mean or median
- Data formatting: Ensuring consistent data types and formats.
- Duplicate removal: Process of removing duplicate entries.

Data Integration

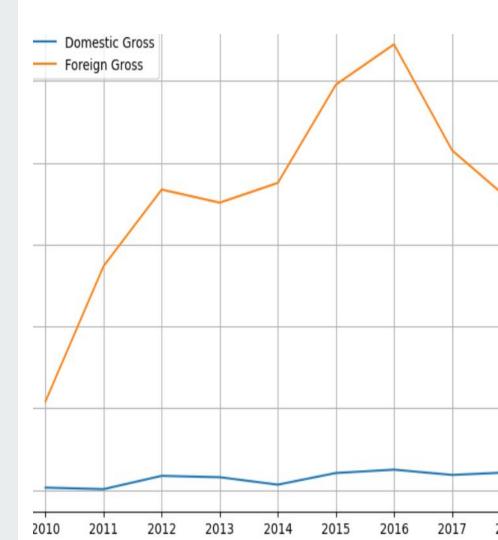
- Integration of movie basics and movie ratings into merged data
- Further cleaning and preprocessing steps to create a clean dataset .

Exploratory Data Analysis (EDA)

- Insights from summary statistics exploration.
- Calculated basic statistics (mean, median, standard deviation).
- Top 10 movies and studios ranked based on their total gross earnings
- Visualizations showcasing relationships between variables .For example average rating and number of votes

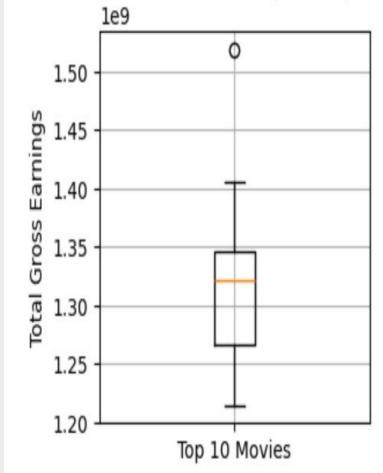
Line graph

Shows total revenue earned in a domestic and foreign market in different years



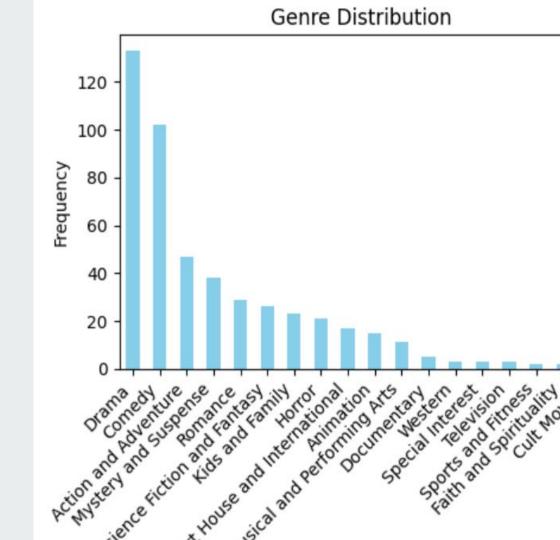
Box plot

The box plot shows the gross earnings for the top 10 movies Box Plot: Total Gross Earnings of Top 10 Movies



Bar graph

The bar graph shows the frequency distribution of different genres



Conclusion

• The success of 'Marvel's The Avengers' and the dominance of BV Studio in total gross emphasize the prosperity of movies within established franchises.

 Avatar as the most viewed movie brings the highest gross revenue. Emphasize visually striking movies with captivating storytelling to transport audiences into unique and engaging worlds.

Recommendations

- Invest in Visual Spectacle: Emphasize high-quality visual effects and immersive storytelling to create unique and captivating movie experiences. Audiences are drawn to films that provide an escape and a visually stunning world.
- Strategic Partnerships: Collaborate with established studios or filmmakers to leverage their expertise and gain insights into successful movie production. Strategic partnerships can help in navigating the complexities of the movie industry.
- By incorporating these insights and recommendations, Microsoft's