Netflix Data Analysis

Using Google BigQuery & Python

Prepared by:

Narasimha Kasu

Date:

September 3, 2025



Executive Summary

This report presents an analysis of the Netflix Movies & TV Shows dataset using SQL in Google BigQuery and Python visualizations. The objective was to explore content distribution, growth trends, genres, and ratings.

Key Insights:

- Netflix's catalog is dominated by **Movies** (70%) compared to TV Shows (30%).
- The United States and India contribute the largest share of titles.
- Content additions **peaked in 2019**, followed by a decline after 2020.
- TV-MA and TV-14 are the most common ratings, reflecting a focus on mature audiences.
- Drama and Comedy are the most dominant genres, appealing to a wide global audience.

This analysis highlights Netflix's global strategy, emphasizing movie-heavy content, regional dominance by the US and India, and strong focus on mature audiences.

Contents

1	Intr	oduction	3
2	2 Tools Used		3
3	Met	hodology	3
4	Analysis and Results		4
	4.1	Movies vs TV Shows	4
	4.2	Top Countries	4
	4.3	Content Growth Over Time	5
	4.4	Ratings Breakdown	5
	4.5	Top Genres	5
5	Con	clusion	6
6 References		6	

1 Introduction

This project analyzes the **Netflix Movies & TV Shows dataset** (around 8,800 titles) using SQL in Google BigQuery and Python visualizations. The goal is to answer key business questions about Netflix's catalog composition, growth patterns, and audience focus.

2 Tools Used

- Google BigQuery SQL queries and data cleaning
- Python (Pandas, Matplotlib, Seaborn) Data visualization
- Kaggle Notebook Analysis & publishing

3 Methodology

- 1. Imported the dataset into Google BigQuery.
- 2. Cleaned the date_added column to create titles_clean.
- 3. Wrote SQL queries for distribution, trends, genres, and ratings.
- 4. Exported results to Kaggle Notebook for visualizations.
- 5. Created charts and insights.

4 Analysis and Results

4.1 Movies vs TV Shows

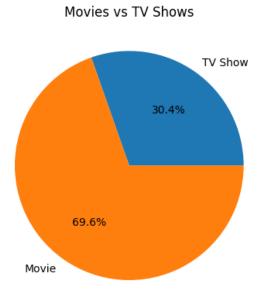


Figure 1: Distribution of Movies vs TV Shows.

Insight: Movies dominate Netflix's catalog (70%) compared to TV Shows (30%).

4.2 Top Countries

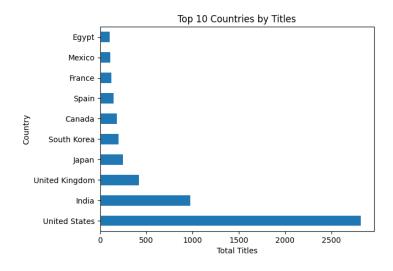


Figure 2: Top contributing countries on Netflix.

Insight: The United States and India contribute the largest share of titles.

4.3 Content Growth Over Time

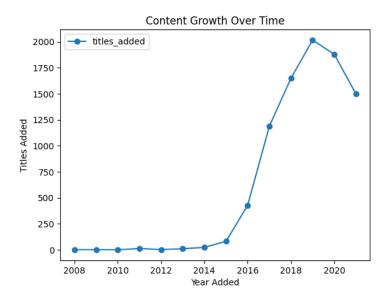


Figure 3: Growth of titles over time.

Insight: Content additions peaked in 2019 and slowed after 2020.

4.4 Ratings Breakdown

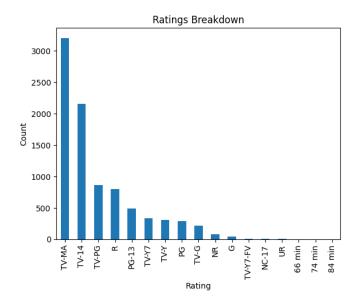


Figure 4: Distribution of ratings.

Insight: TV-MA and TV-14 dominate, showing Netflix's focus on mature audiences.

4.5 Top Genres

Insight: Drama and Comedy dominate the catalog, followed by Action and Thriller.

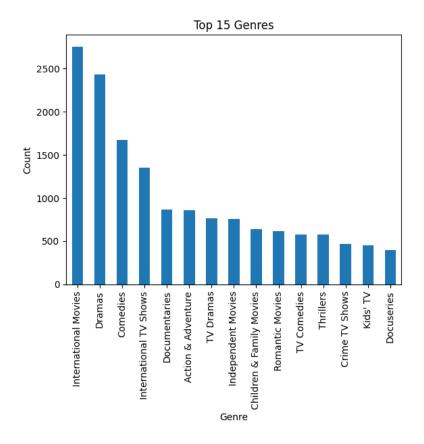


Figure 5: Top genres available on Netflix.

5 Conclusion

- Netflix is dominated by Movies (70% of titles).
- The US and India lead in content production.
- Content additions peaked in 2019.
- **Drama and Comedy** are the most popular genres.
- Mature ratings (TV-MA, TV-14) are most frequent.

6 References

- Netflix Dataset (Kaggle): https://www.kaggle.com/datasets/shivamb/netflix-shows
- Google BigQuery Documentation: https://cloud.google.com/bigquery/docs