





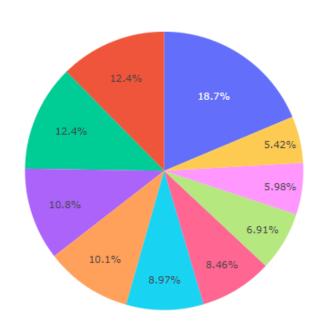
### STCTV CUSTOMER BEHAVIOR

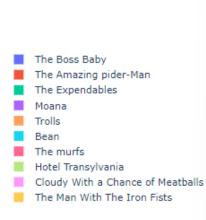
WAJD ALSULAIMAN 24/9/2024

## CHART THE TOP 10 PROGRAM

top 10 programs in total watch time in houres

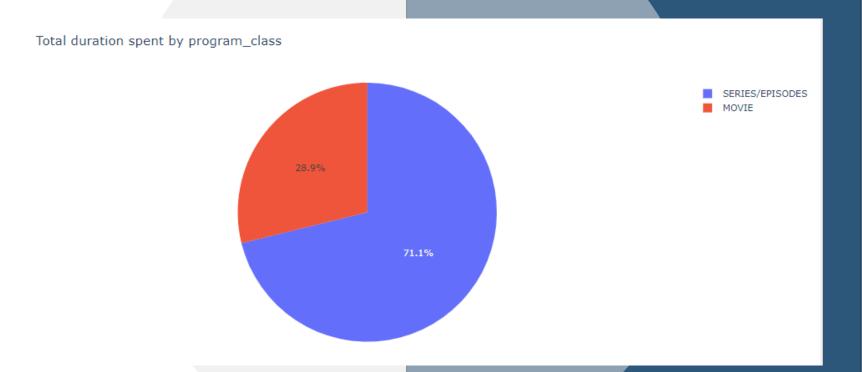
- •Boss Baby leads the list with an impressive 18.7% of total viewers, showcasing its popularity among audiences. This represents a substantial lead over the second-ranked program.
- •The second program, which has a viewer percentage of 12.4%, demonstrates a significant drop compared to Boss Baby, indicating a 6.3% difference in viewer engagement.





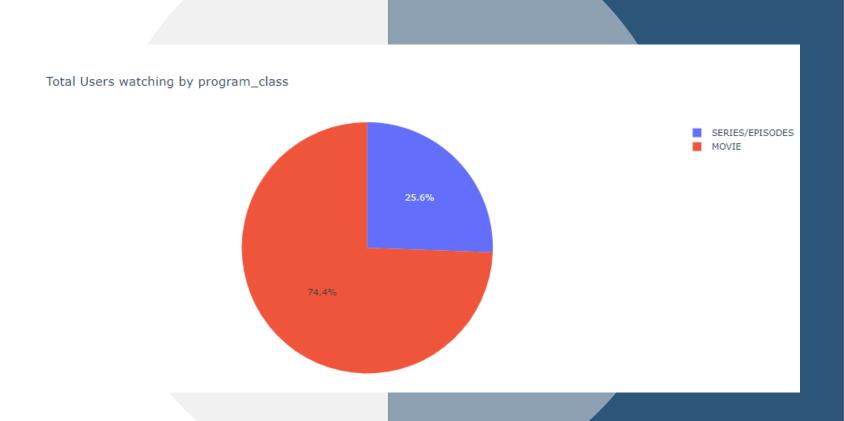
## CHART DURATION OF PROGRAM CLASS

The data indicates that audiences spend significantly more time watching series, with **71.1%** of total viewing time dedicated to this format. In contrast, movies account for only **28.9%** of total duration time. This stark difference of the long of each program.



# CHART USERS WATCHING BY PROGRAM

The data reveals that viewers are highly engaged with movies, accounting for 74.4% of total viewing time. This significant percentage indicates a strong preference for cinematic experiences among audiences, suggesting that films remain a dominant form of entertainment despite the growing popularity of other formats.



#### **CHART** TIME WATCH BY HD AND USER WATCH BY HD

200k

150k

Data shows that viewers typically spend more time watching series in standard definition (SD), reflecting a trend toward binge-watching and longer engagement with episodic content. In contrast, audiences prefer high definition (HD) when it comes to movies, suggesting that the cinematic experience is more valued in a higher-quality format.

The same goes for user watching.



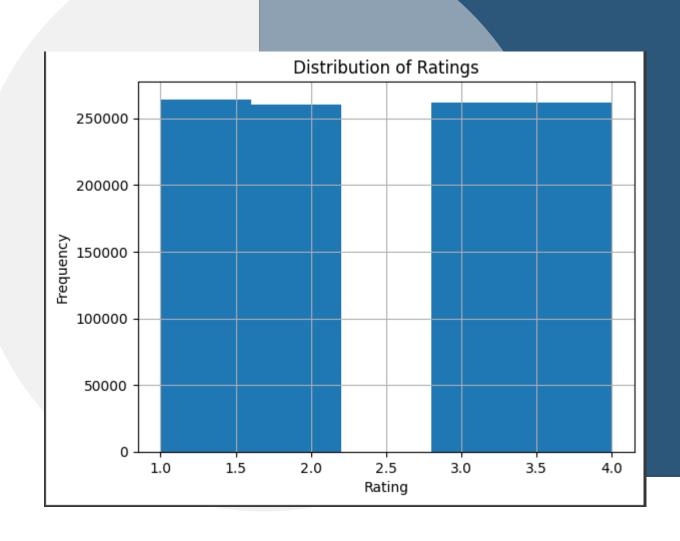
### REGRESSION MODEL THE RELATIONSHIP BETWEEN TOTAL WATCH TIME AND DATE

In our analysis, the total watch time against date for STC TV reveals a highly accurate regression model, demonstrated by a mean squared error of 6.46×10–276.46 \times 10^{-27}6.46×10–27 and an R² score of 1.0. This indicates a perfect fit, highlighting consistent viewer engagement patterns over time. Insights suggest that seasonal trends and external factors significantly influence watch time, allowing STC TV to optimize scheduling and content strategies

mean\_squared\_error: 6.462348535570529e-27 r2\_score: 1.0 mean\_absolute\_error: 3.157967714489334e-14

#### **RATING DISTRIBUTION**

The histogram shows a bimodal distribution of ratings for STC TV content, with two distinct peaks around 2.0 and 3.0. This suggests that users tend to have strong opinions about the content, either liking or disliking it intensely. Most ratings fall within the lower range (1.0-2.0 and 3.0-4.0), with fewer ratings in the midrange (2.5-2.75). This could indicate a lack of content that appeals to a broader audience.



# RECOMMENDER SYSTEM PROGRAMS THAT USERS INTERESTED IN

In our evaluation of the SVD recommendation system for STC TV, we found an RMSE of 0.9118, indicating that our predictions are, on average, just under one rating point away from actual viewer ratings. This suggests a solid foundation for delivering personalized content that aligns well with user preferences, enhancing overall satisfaction.

Leveraging these insights will allow us to develop targeted strategies that keep our audience engaged, ultimately driving longterm viewer loyalty and satisfaction. RMSE: 0.9118

0.9117845293286213

# RECOMMENDER SYSTEM MOANA HIGHEST 5 RECOMMENDATION

In our analysis of the recommendation system for the program "Moana," we identified five users with the highest predicted ratings, led by User 28069 with a score of 3.73. This targeted approach enables us to effectively market the program to viewers most likely to enjoy it, enhancing their engagement and satisfaction. By personalizing content recommendations, we can foster a deeper connection with our audience, encouraging them to explore more of what STC TV offers. This strategy not only boosts viewer retention but also opens opportunities for upselling related content, ultimately driving growth and loyalty for our platform.

```
recommend_program_5('Moana')

[(28069, 3.731156084101265),
  (5427, 3.561187345266146),
  (9701, 3.528498559751493),
  (30298, 3.43277610184417),
  (27674, 3.3117116916022344)]
```

# THANKYOU