

# Movie Streaming Application Ontology

Azareel Grahandito Adi / 5025221126

Mikha Gracia Sugiono /

Moch. Avin / 5025221061

Nabil Fadhil / 5025221200

Nathaniel Ryo / 5025221019

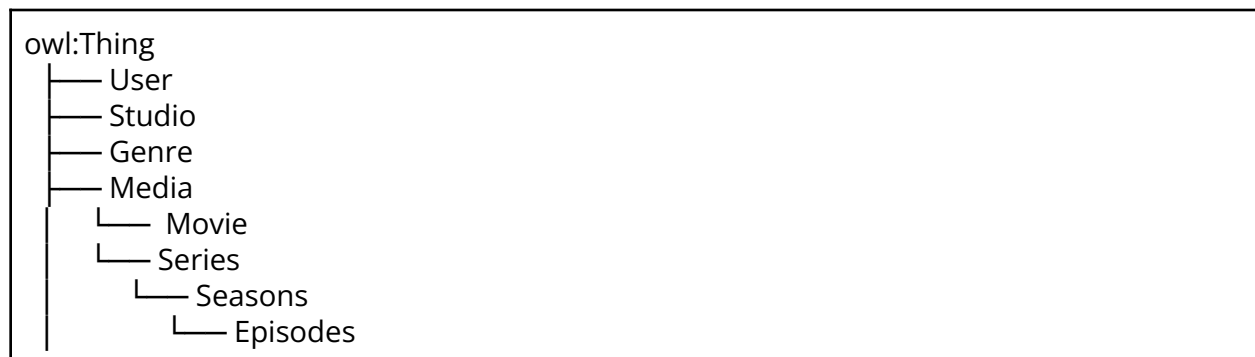
---

## Study Case

This report outlines the ontology created for a Movie Streaming Application. The ontology models the relationships between users, movies, series, genres, ratings, subscriptions, watchlists. This structured representation enables effective management of the streaming system, supports personalized content recommendations, and helps manage subscription and payment details.

## Classes

The class hierarchy defines the main entities involved in the movie streaming platform. The hierarchy is structured with classes representing users, media content, and supporting entities such as subscriptions and watchlist.



- **User:** Represents users of the streaming platform.
  - **Media:** Represents a media entity.
-

- 
- **Movie:** Represents a full-length movie.
  - **Series:** Representing TV shows or series with multiple seasons.
    - **Seasons:** Represents individual seasons of a series.
      - **Episodes:** Representing individual episodes within a season.
  - **Genre:** Represents categories or genres of movies and series (e.g., Comedy, Action).
  - **Studio:** Represents or genres of movies and series (e.g., Comedy, Action).

## Object Properties

These define relationships between the classes.

**hasStudio:** Links **Movie** and **Series** to their respective **Studio**.

- **Domain:** Media
- **Range:** Studio

**watchesMedia:** Links **User** to the **Media** they are watching.

- **Domain:** User
- **Range:** Media

**belongsToGenre:** Links **Movie** to one or more **Genres**.

- **Domain:** Movie
- **Range:** Genre

## Data Properties

These represent attributes of each class, linking classes to literals (like strings or numbers).

### User Data Properties

1. **hasUsername:** Stores the username of the user.
2. **hasEmail:** Stores the email address of the user.
3. **hasAge:** Stores the age of the user.
4. **hasSubscriptionDate:** Stores the subscription start date for the user.

---

## Media Data Properties

1. **hasTitle**: Stores the title of the movie or series.
2. **hasReleaseDate**: Stores the release date of the movie or series.
3. **hasDuration**: Stores the duration of the movie or series in minutes.
4. **hasRatingScore**: Stores the average rating score of the movie or series.

## Studio Data Properties

1. **hasStudioName**: Stores the name of the studio.
2. **hasLocation**: Stores the location of the studio.

## Individuals

These represent specific instances within our ontology.