**MovieRecommendationWebService/recommendationInfo()**

Function

Recommendation : print the recommendation result

Description

Receive the data about matching relevant movies and Print this data to user.

Inputs

Result of matching relevant movies

Source

Result of matching relevant movies from matching function

Outputs

RecommendedList - Processed List of matching relevant movies for user to see easily

Destination

None

Actions

RecommendedList is the result of edited list. From received data, edit the list sorted from high-score movies to low-score movies(descending order). List shows movie's name, genre, and relative score from matching.

Pre-condition

None

Post-condition

None

Side effects

None

**MovieRecommendationWebService/loadMovieInfo()**

Function

Load movie list from database

Description

Load the list of movies from the database server according to the input.

Inputs

Classification of required movie list

Source

None

Outputs

movie list – required movie list

Destination

None

Action

Load the list of movies from the database server according to the input

Pre-condition

None

Post-condition

None

Side effects

None

**MovieRecommendationWebService/provideMovieInfo()**

Function

Provide information received

Description

Provide clients with the materials they need

Inputs

Movie list

Source

None

Outputs

Processed movie list

Destination

None

Action

Print out the value received as input on the screen

Pre-condition

None

Post-condition

None

Side effects

None

**MovieRecommendationWebService/askPreference()**

Function

ask preference

Description

Ask users about their preference about movie. Let them choose their preferred movie in list. And compute user’s preferred movie genre score matrix .

Inputs

User’s preferred movie.

Output

Matrix which tells user’s preferred genre score

Source

None

Destination

None

Action

If the website ask users to choose their preference. Function computes each movies’s genre score and make matrix about user’s preferred genre score matrix. This matrix is for recommending for movies. This matrix contains scores of preference for each genre.

Requirements

Users need to choose large enough movies to get more precise recommendation

Pre-condition

None

Post-condition

None

Side effects

None

**MovieRecommendationWebService/matching()**

Function

matching

Description

After computing user’s preferred genre score matrix, with it, Compute list for recommending movie.

Input

User’s preferred genre score matrix

Output

List of movie which this program recommends

Source

None

Destination

None

Action

In user’s preferred genre score matrix, We compute score for the movie. We assume that there are each genre scores for movie. For example, A movie has 10points for action, 0 points for romance. After combining score (computing score), This function make list for recommendation.

Requirements

Precise user’s preferred score matrix.

Pre-condition

None

Post-condition

None

Side effects : None