

Programming for Design
Project 2 - Book Information Website

Program Pseudocode

Keir Herbert (u3211239)

For the group:

Keir Herbert
Michael Coward
Sujith Kumar

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Project2.html

Set web browser tab/window title

Define external W3.css style sheet relationship

Create title banner

- Define panel and colour

- Display heading and sub-heading

- Display name and ID number

End panel section

Create container for table

- Create table with JavaScript reference ID

- Create table column headings

 - Set heading background colour

 - Add column headings

- End table heading

- Start table body with JavaScript reference ID

End table section

Run JavaScript program isbn.js

Run JavaScript program classes.js

Run JavaScript program main.js

classes.js

class bookCover

Define input parameters and default values

Pass input values into class properties

Prefix size value with “-”

Convert key property to uppercase and append “/”

Define first part of book cover URL

Define last part of book cover URL

display method

Combine URL strings with key, ISBN, and size properties to form valid URL

Return assembled URL string

class bookDetail

Define input parameters and default values

Pass input values into class properties

Convert key property to uppercase and append colon

Pass output from bookCover class into bc property

Define first part of URL for collecting the JSON object

Define last part of URL for collecting the JSON object

Make available detail property and set to null

size method

Default value to small

Pass input value into bc sub-class property

cover method

Return book cover image

getDetail method

Call getBookDetail function to collect the JSON object data

Populate this.detail with returned data

getAuthor method

Create listOfAuthors variable and set to null

Setup loop with no end condition (always ends in a caught error)

Attempt to collect author value from JSON object and append to any previous ones

Catch a failed attempt to get author value

Failed on first attempt?

 If yes, return "No authors found" response

 Else, return list of authors

getTitle method

Create variable bookTitle

Return book's title from JSON object

Return bookTitle as result

getPublisher method

Create listOfPublishers variable and set to null

Setup loop with no end condition (always ends in a caught error)

Attempt to collect publisher value from JSON object and append to any previous ones

Catch a failed attempt to get publisher value

Failed on first attempt?

 If yes, return "No publishers found" response

 Else, return listOfPublishers

getPublishedDate method

Collect published date from JSON object

Value returned?

If not, return "N/A" string

Else, return published date

getPageCount method

Collect page count from JSON object

Is returned value an integer?

 If yes, return page count as result

 Else, return "N/A" string

class movieInfo

- Define accepted input parameters and default values
- Define first section of URL string
- Read key input value into object
- Define second section of URL string
- Remove spaces from input movie value and store in object

getInfo method

- Call the getMovieInfo function to collect JSON object data
- Populate this.detail with returned data

getMovieTitle method

- Create listOfMediaTitles variable and set to null
- Setup loop with no end condition (always ends in a caught error)
- Attempt to collect title value from JSON object and append to any previous ones
- Catch a failed attempt to get title value
- Failed on first attempt?
 - If yes, return “No associated media” response
 - Else, return listOfMediaTitles

getBookDetail function

- Combine two URL parts with key and ISBN value to form URL
- Use URL to fetch HTML data from API
- Convert response into JSON format
- Did API call fail?
 - If yes, alert user with pop-up message
 - Else, return JSON object data

getMovieInfo function

- Combine two URL parts with key and movie value to form URL
- Use URL to fetch the HTML data from the API
- Convert response into JSON format
- Did API call fail?
 - If yes, alert user with pop-up message
 - Else, return JSON object data

Main.js

Create async function main

Create constant tableOfBooks pointing to HTML element

Dimension array bookDetails

Dimension array movieDetails

Create array index variable and set to zero

Loop until reaching end of ISBN array

 Create variable book to hold object data collected by getDetail

 Call getDetail and wait to complete

 Push collected details into bookDetails

 Create variable movie to hold object data collected by getInfo

 Call getInfo and wait to complete

 Push collected details into movieDetails

 Insert row into HTML table and link to variable 'row'

 Insert new cell into row at column 0 and link to variable cover

 Insert new cell into row at column 1 and link to variable title

 Insert new cell into row at column 2 and link to variable author

 Insert new cell into row at column 3 and link to variable publisher

 Insert new cell into row at column 4 and link to variable
 publishedDate

 Insert new cell into row at column 5 and link to variable pageCount

 Insert new cell into row at column 6 and link to variable filmTV

 Place book cover image into cell called cover

 Place book cover image into cell called title

 Place book cover image into cell called author

 Place book cover image into cell called publisher

 Place book cover image into cell called publishDate

 Place book cover image into cell called pageCount

 Place book cover image into cell called filmTV

Increment array index

End function main

End of program