

# TECHNOLOGY



## ReactJS

### Course-End Project

# TECHNOLOGY

Streamify

## Objectives

To create a movie app that lets users browse and search movies by genre, rating, or title





## Problem Statement and Motivation



### Real-World Scenario:

You have been given the task of developing a movie app as a React developer. The goal of this project is to create an application that is simple to use and allows users to search for films by title, rating, and genre.

The app should incorporate various key concepts and features of React, including functional components, hooks, props, event handling, conditional rendering, and lists.

To achieve this, the app should utilize the `useState` hook to effectively manage the state of the movie data. Additionally, it should utilize the `Axios` library to make API calls and fetch movie data from a movie API. The app should handle API response errors gracefully and provide appropriate error messages to the user.

Furthermore, it should display a loading indicator while fetching data to enhance the user experience.

### Features of the project:

- React project
- JSX files
- Component files
- API usage





## Industry Relevance

Skills used in the project and their usage in the industry are given below:



- **React:** React is a widely used JavaScript library for building user interfaces. In this project, the main framework is used to develop the movie app. React skills are highly valued in the industry, and many companies rely on React for their front-end development needs.
- **Functional components:** Functional components are a key feature of React. They provide a simpler syntax and enable the use of hooks, such as `useState` and `useEffect`. Functional components are widely adopted in the industry as they offer better performance and reusability compared to class components.
- **Hooks:** The `useState` Hook is utilized in this project to manage the state of movie data. They have gained significant popularity in the industry as they simplify code and promote better component encapsulation and reusability.

## Industry Relevance

Skills used in the project and their usage in the industry are given below:



- **Props:** Props are used to pass data and functionality between components in React. In this project, props are used to pass movie data, search filters, and event handlers to child components.
- **Event handling:** Event handling is a crucial aspect of building interactive applications. In this project, event handlers are implemented to respond to user actions, such as clicking on buttons or entering text in the search bar.
- **Conditional rendering:** Conditional rendering allows components to render different content based on specific conditions. In the movie app, conditional rendering is used to display loading indicators, error messages, and movie lists based on search filters. Being proficient in conditional rendering is important for building dynamic and responsive user interfaces.



## Industry Relevance

Skills used in the project and their usage in the industry are given below:



- **Lists:** The movie app involves rendering lists of movies based on user-selected filters. React's ability to map and render arrays of data is utilized in this project. Understanding how to work with lists in React enables the efficient rendering of dynamic content and enhances the user experience.
- **Axios:** Axios is used in this project to fetch movie data from a movie API. Being familiar with Axios or similar HTTP request libraries is valuable in the industry, as web applications often require fetching data from APIs.
- **Error handling:** In the movie app, error handling is implemented to gracefully handle API response errors and display meaningful error messages to the user. The ability to handle errors effectively improves the user experience and ensures the app behaves robustly.



## Task (Activities)

Deployment of the application involves the following steps::

1. Create a new React app
2. Create a Movie API service
3. Create functional components
4. Add the functionality to browse movies
5. Update App.js and run your React app



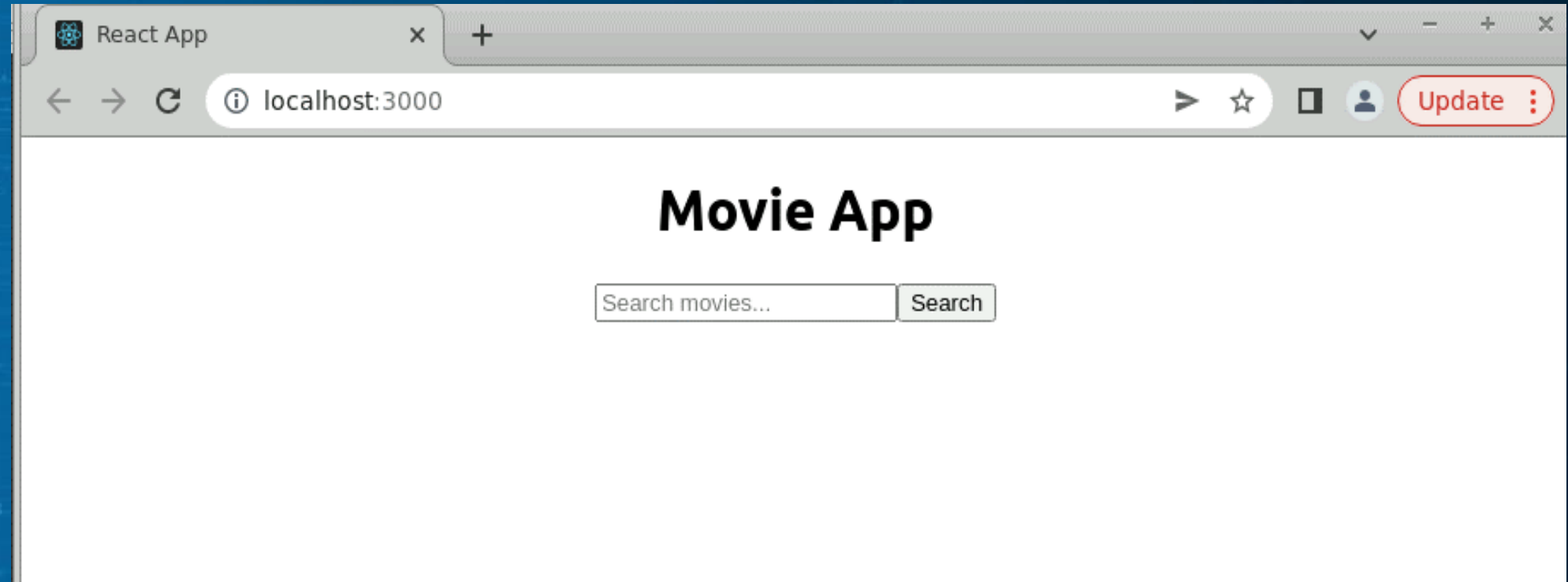
## Project Reference



**Complete the Assisted Practices of the below courses before attempting the project:**

- React Introduction and Basic Concepts
- Rendering, LifeCycle and React Hook Concepts
- Managing React Hook useReducer, useEffect, and Custom Hooks
- React Context API and Redux
- API Calling with React, Support for the new JSX transform, and Newly Launched Libraries

## Output Screenshot





# TECHNOLOGY

**Thank You**