

Frontend Development

Index.jsx:

```
src > index.jsx > ...  
  Click here to ask Blackbox to help you code faster  
1  import ReactDOM from 'react-dom/client';  
2  import React from 'react';  
3  import './index.css';  
4  import App from './App';  
5  const root = ReactDOM.createRoot(document.getElementById('root'));  
6  root.render(<App />);
```

ReactDOM.createRoot: This method is part of ReactDOM, which is a package in React for working with the DOM (Document Object Model). createRoot is used to create a new root (entry point) for a React application. The createRoot function returns a Root object, which represents the root of a React tree.

root: This is the variable that holds the reference to the root created in the previous line.

render(<App />): The render method is used to render a React element into the root. In this case, <App /> represents the root component of the React application. This is the component that will be initially rendered into the DOM.

Render Method:

```
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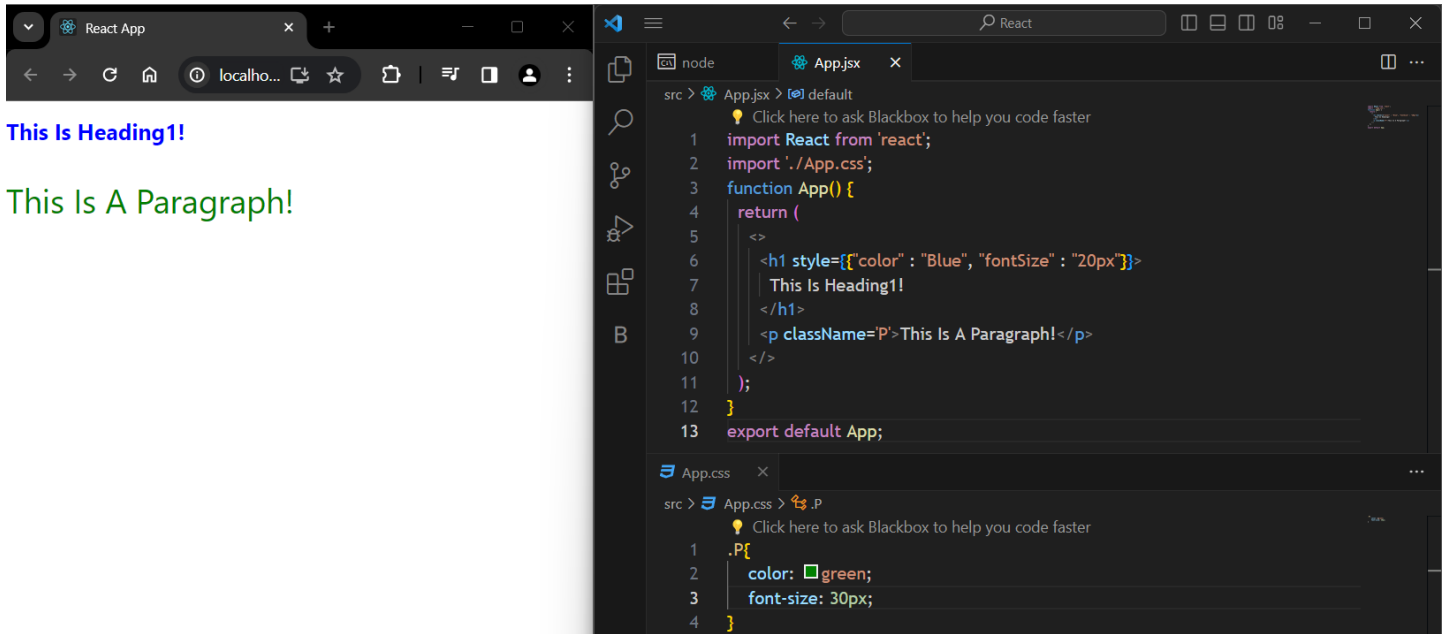
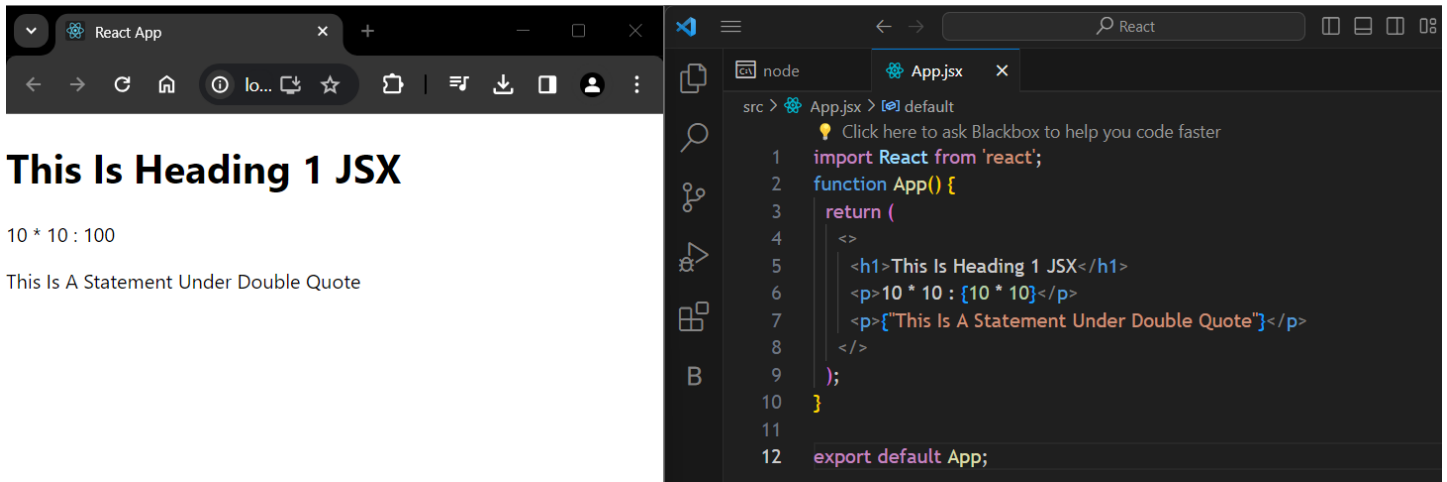
createRoot(): The createRoot() function takes one argument, an HTML element. The purpose of the function is to define the HTML element where a React component should be displayed.

Render(): The render() method is then called to define the React component that should be rendered.

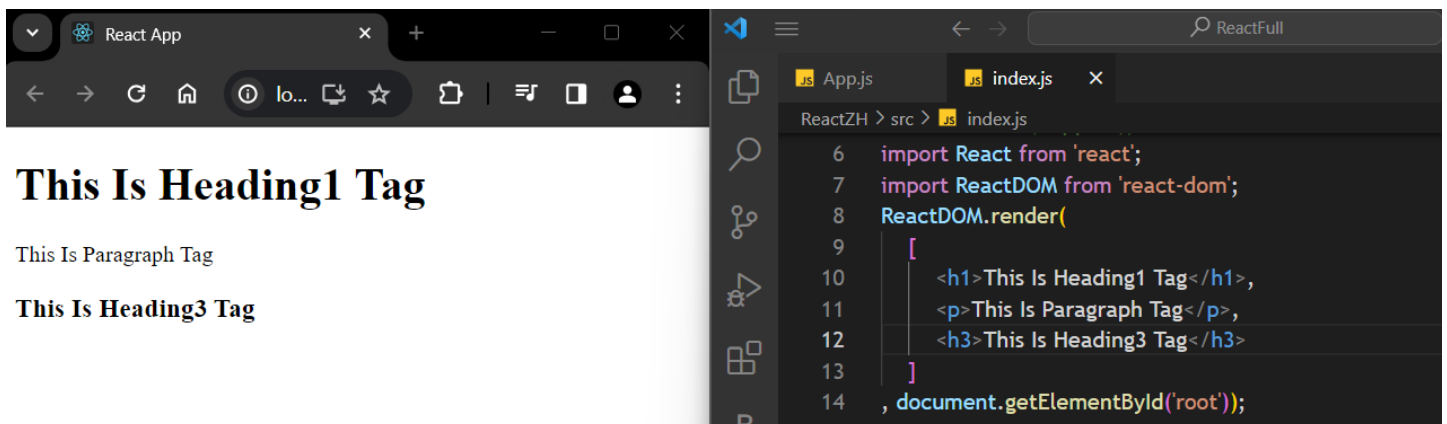
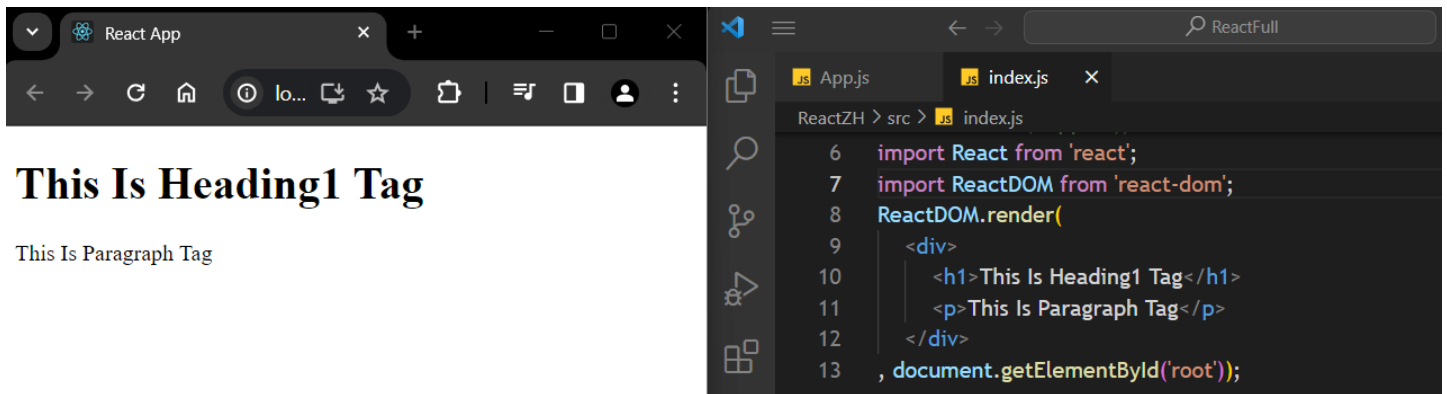
But **render where?** There is another folder in the root directory of your React project, named "public". In this folder, there is an index.html file. You'll notice a single <div> in the body of this file. This is where our React application will be rendered.

JSX(JavaScript XML):

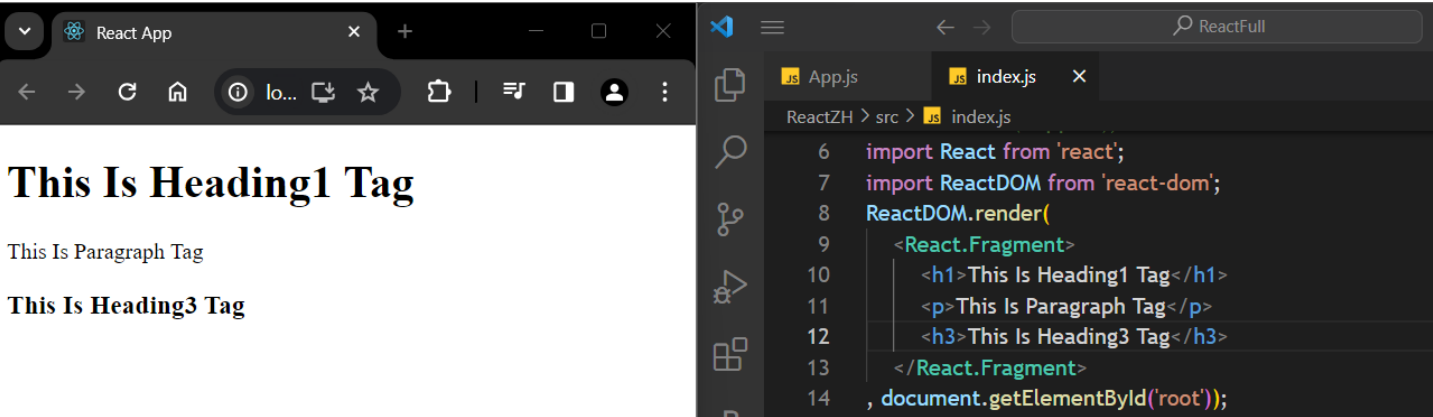
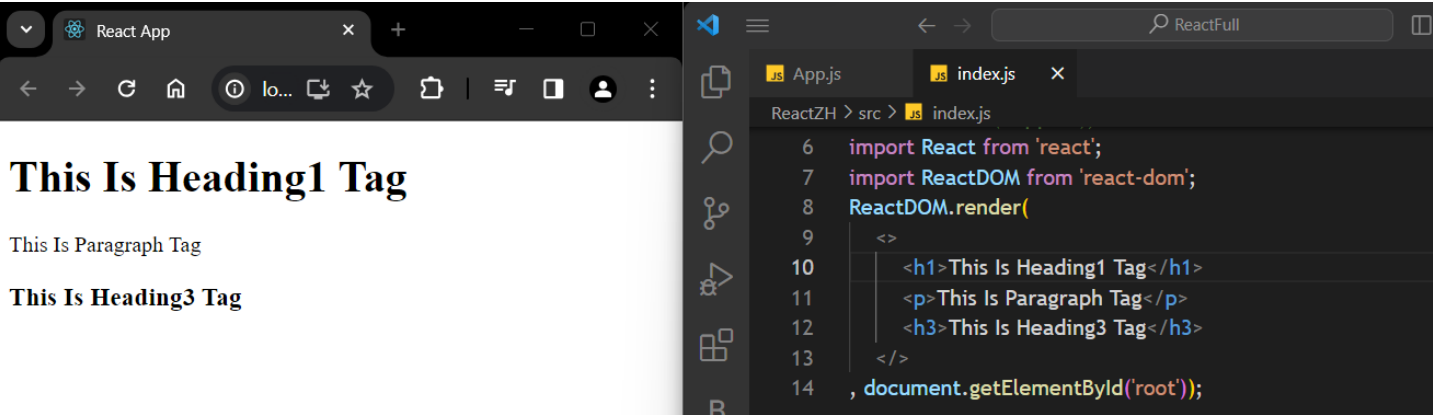
JSX stands for JavaScript XML. JSX allows us to write HTML in React. JSX makes it easier to write and add HTML in React. JSX allows us to write HTML elements in JavaScript and place them in the DOM without any createElement() and/or appendChild() methods. JSX converts HTML tags into react elements. With JSX you can write expressions inside curly braces { }. The expression can be a React variable, or property, or any other valid JavaScript expression. JSX will execute the expression and return the result. JSX solved this by using className instead. When JSX is rendered, it translates className attributes into class attributes.



Render Multiple Elements:

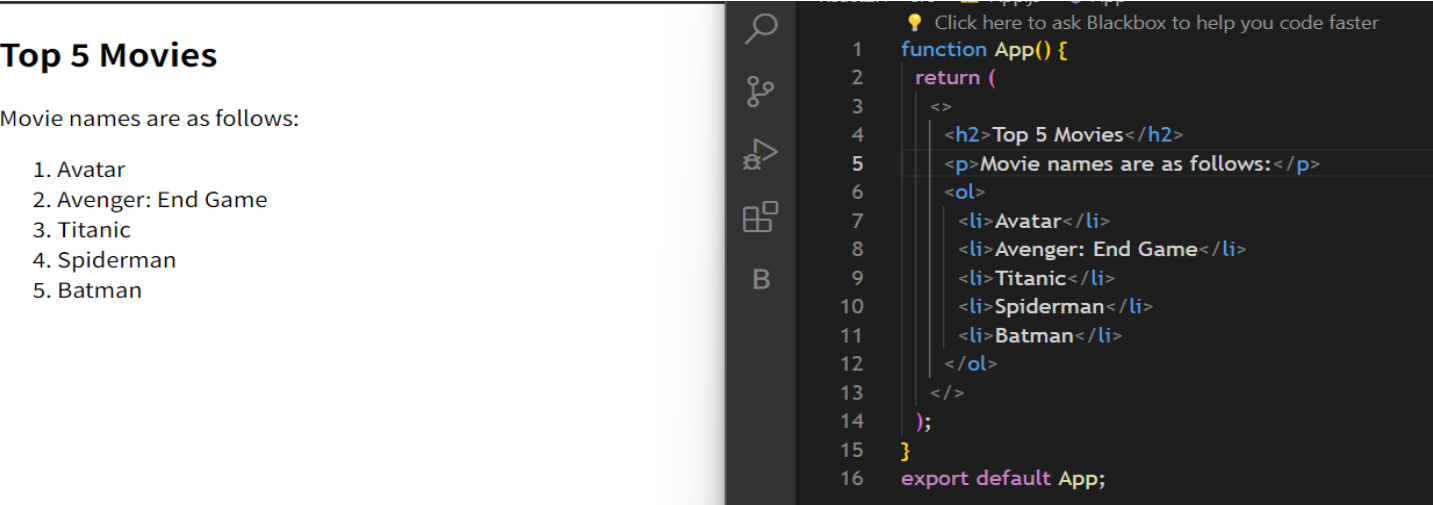


React Fragment:

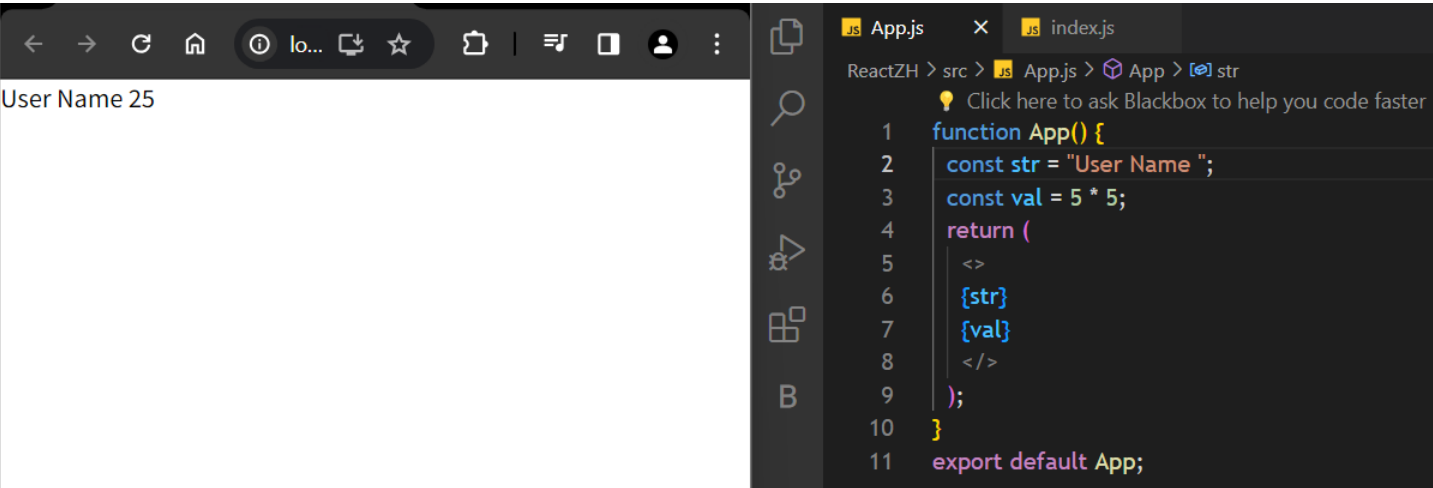


Challenge 01:

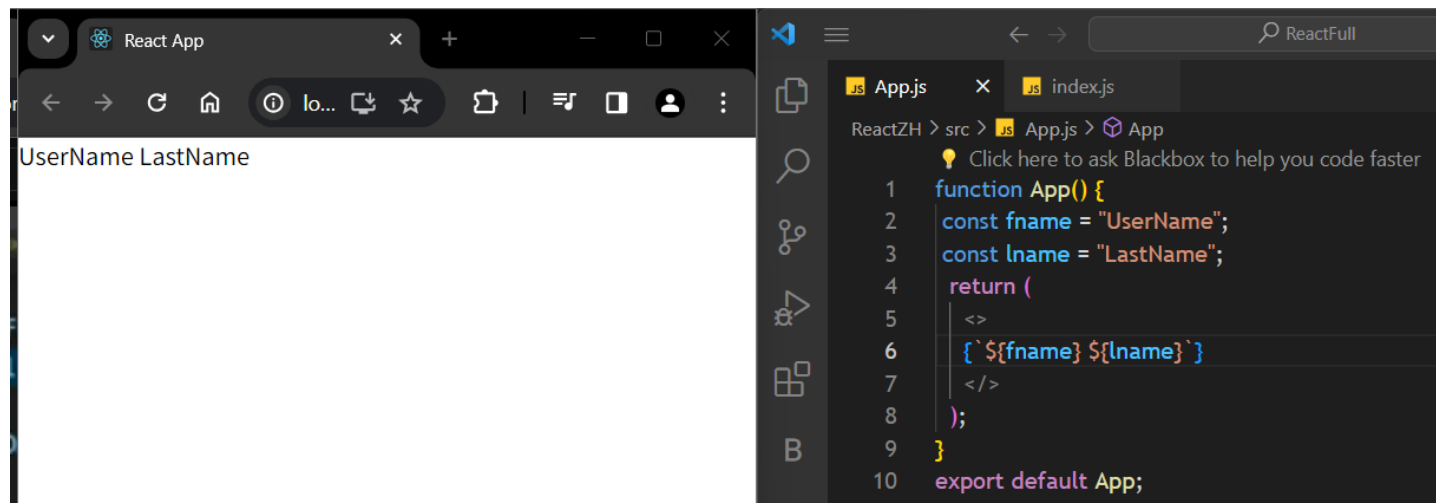
Q. Create a simple web app on top 5 movies in list using JSX?



JSX Expression In JSX:

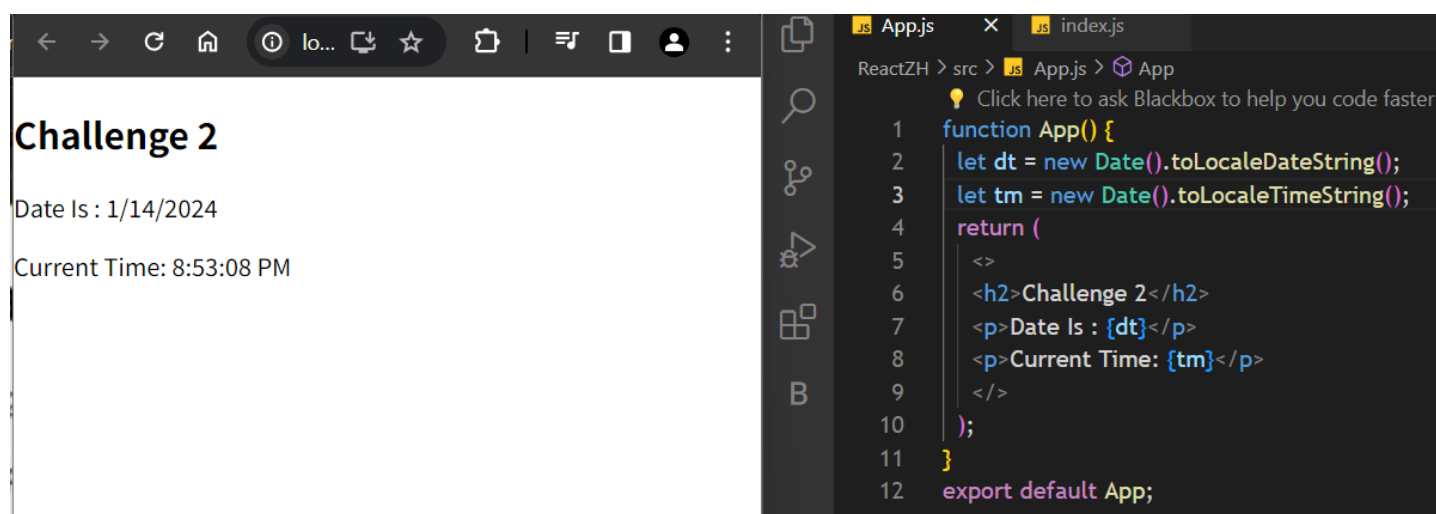


Template Literal In React:

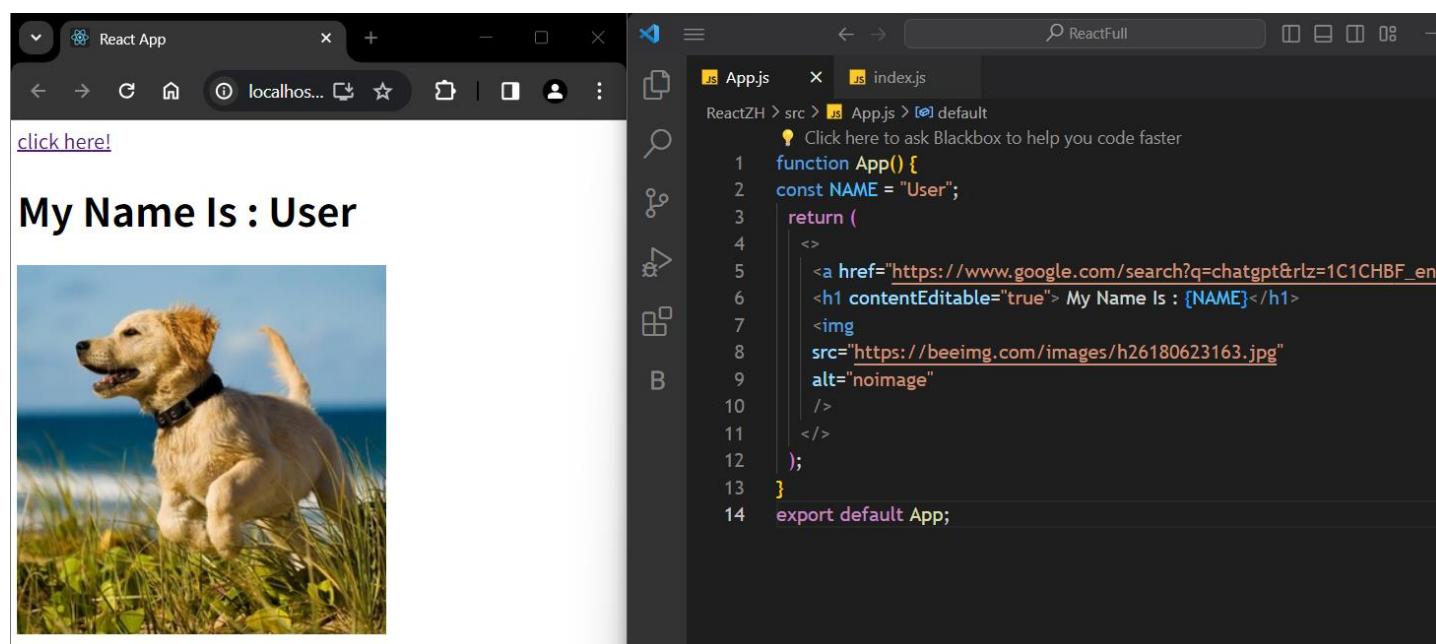


Challenge 02:

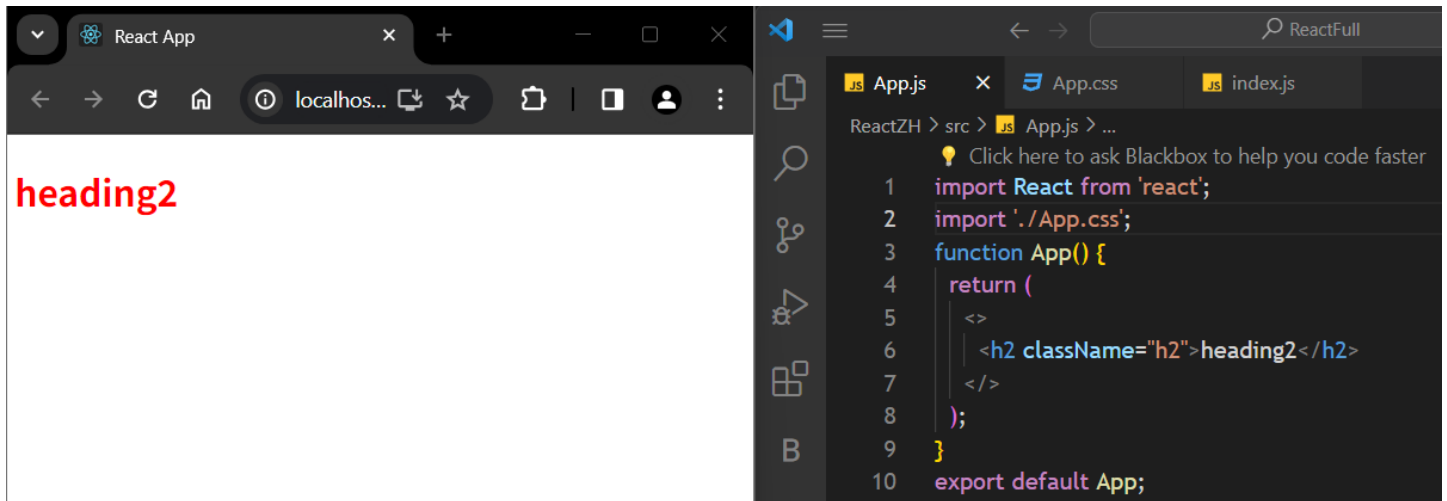
Q. Create a simple web app to display current date and time in JSX?



JSX Attribute In React:



Class VS Classname In React:



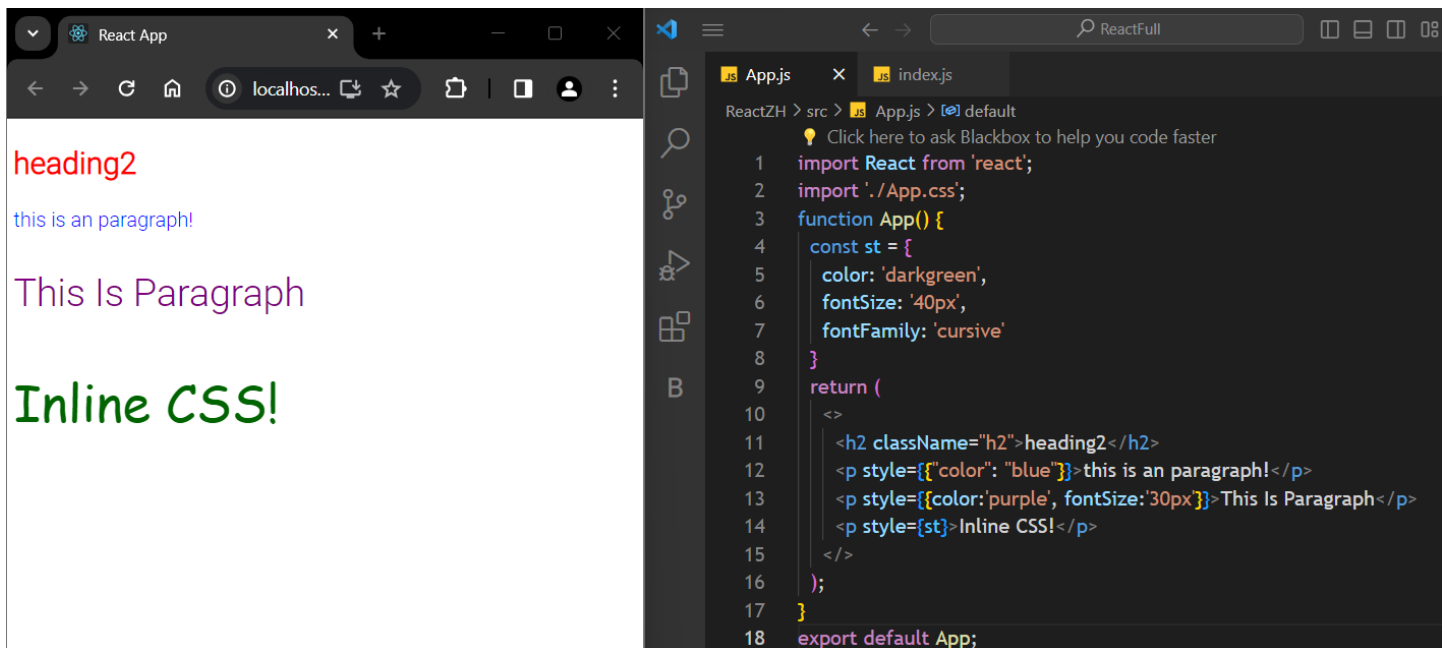
Class:

class is a standard HTML attribute used to define one or more class names for an HTML element. In React, when JSX is used to define components, class is reserved in JavaScript for defining classes, so it cannot be directly used to assign CSS classes in JSX. Instead, you would use className.

ClassName:

className is a special attribute in React used to assign CSS classes to a JSX element. Since class is a reserved keyword in JavaScript, React uses className to avoid conflicts.

Internal CSS & Inline CSS:



Challenge 03:

Create a react web app when it will greet you as per the time.

