

# GET RICH QUICK WITH...



Patrick Hund | frontend developer at eBay Tech Berlin | @wiekatz



```
1 import React from 'react';
2 import './App.css';
3 import config from './config';
4 import { AdvertisingProvider, AdvertisingSlot } from './react-pr
5
6 function App() {
7   return (
8     <div className="App">
9       <header className="App-header">
10         <h1 className="App-title">Context</h1>
11       </header>
12       <article className="App-article">
13         <p>
14           <strong>
15             Context provides a way to pass data through the co
16             without having to pass props down manually at ever
17           </strong>
18         </p>
19         <p>
20           In a typical React application, data is passed top-d
21             child) via props, but this can be cumbersome for cer
22             props (e.g. locale preference, UI theme) that are re
23             components within an application. Context provides a
24             values like this between components without having t
25             pass a prop through every level of the tree.
26         </p>
27         <h2>When to Use Context</h2>
28         <p>
29           Context is designed to share data that can be consid
30             for a tree of React components, such as the current
31             user, theme, or preferred language.
32         </p>
```

< > ⌂ https://5v34q9j9ln.codesandbox.io/

# Context

**Context provides a way to pass data through the component tree without having to pass props down manually at every level.**

In a typical React application, data is passed top-down (parent to child) via props, but this can be cumbersome for certain types of props (e.g. locale preference, UI theme) that are required by many components within an application. Context provides a way to share values like this between components without having to explicitly pass a prop through every level of the tree.

## When to Use Context

Context is designed to share data that can be considered “global” for a tree of React components, such as the current authenticated user, theme, or preferred language.

**Note**

Don’t use context just to avoid passing props a few levels down. Stick to cases where the same data needs to be accessed in many components at multiple levels.

```
13 <article className="App-article">
14   <p>
15     <strong>
16       Context provides a way to pass data through the co
17       without having to pass props down manually at ever
18     </strong>
19   </p>
20   <p>
21     In a typical React application, data is passed top-d
22     child) via props, but this can be cumbersome for cer
23     props (e.g. locale preference, UI theme) that are re
24     components within an application. Context provides a
25     values like this between components without having t
26     pass a prop through every level of the tree.
27   </p>
28   <h2>When to Use Context</h2>
29   <p>
30     Context is designed to share data that can be consid
31     for a tree of React components, such as the current
32     user, theme, or preferred language.
33   </p>
34   <p>
35     <strong>Note</strong>
36   </p>
37   <p>
38     Don't use context just to avoid passing props a few
39     Stick to cases where the same data needs to be acces
40     components at multiple levels.
41   </p>
42 </article>
43 <
```

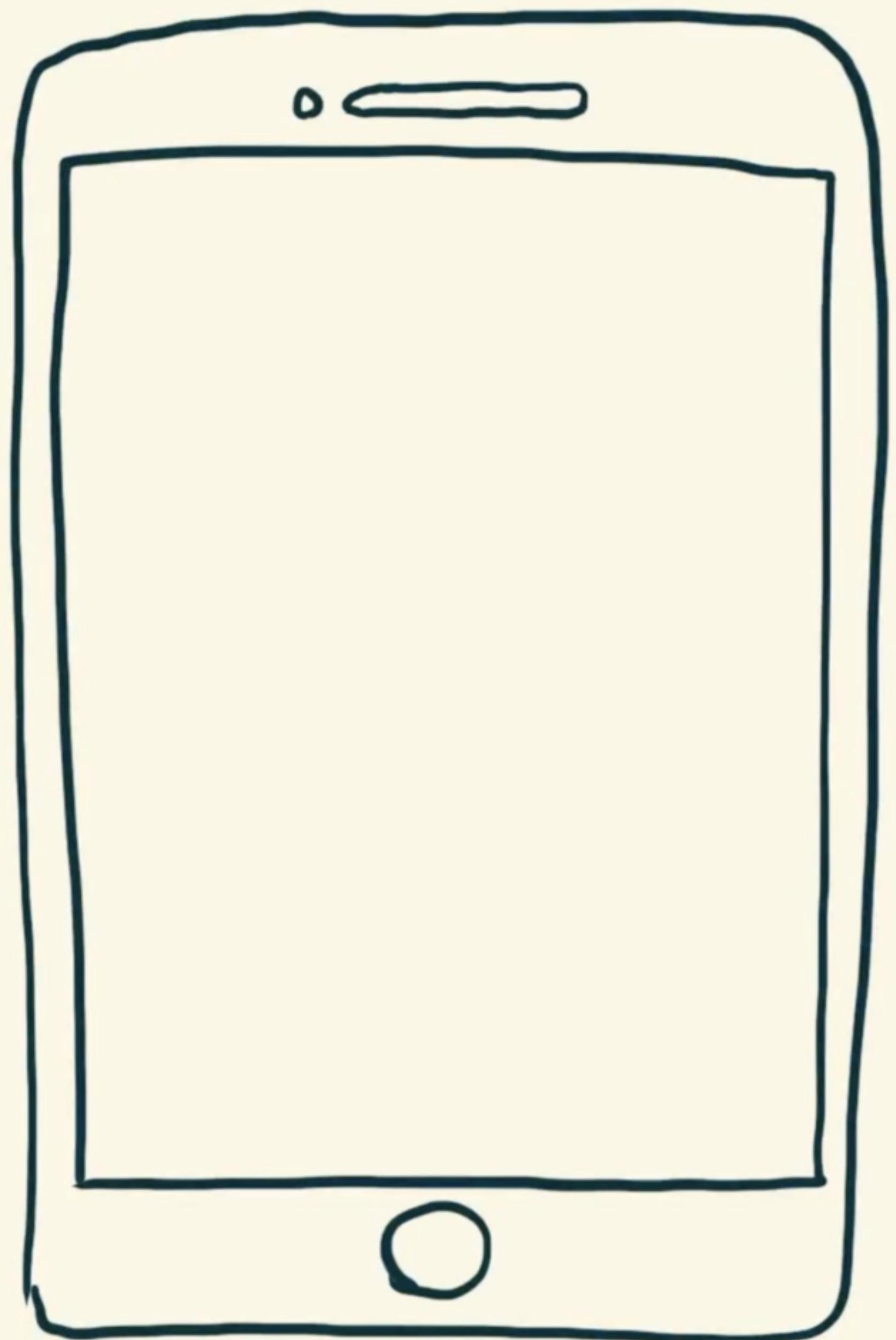
< > ⌂ https://5v34q9j9ln.codesandbox.io/

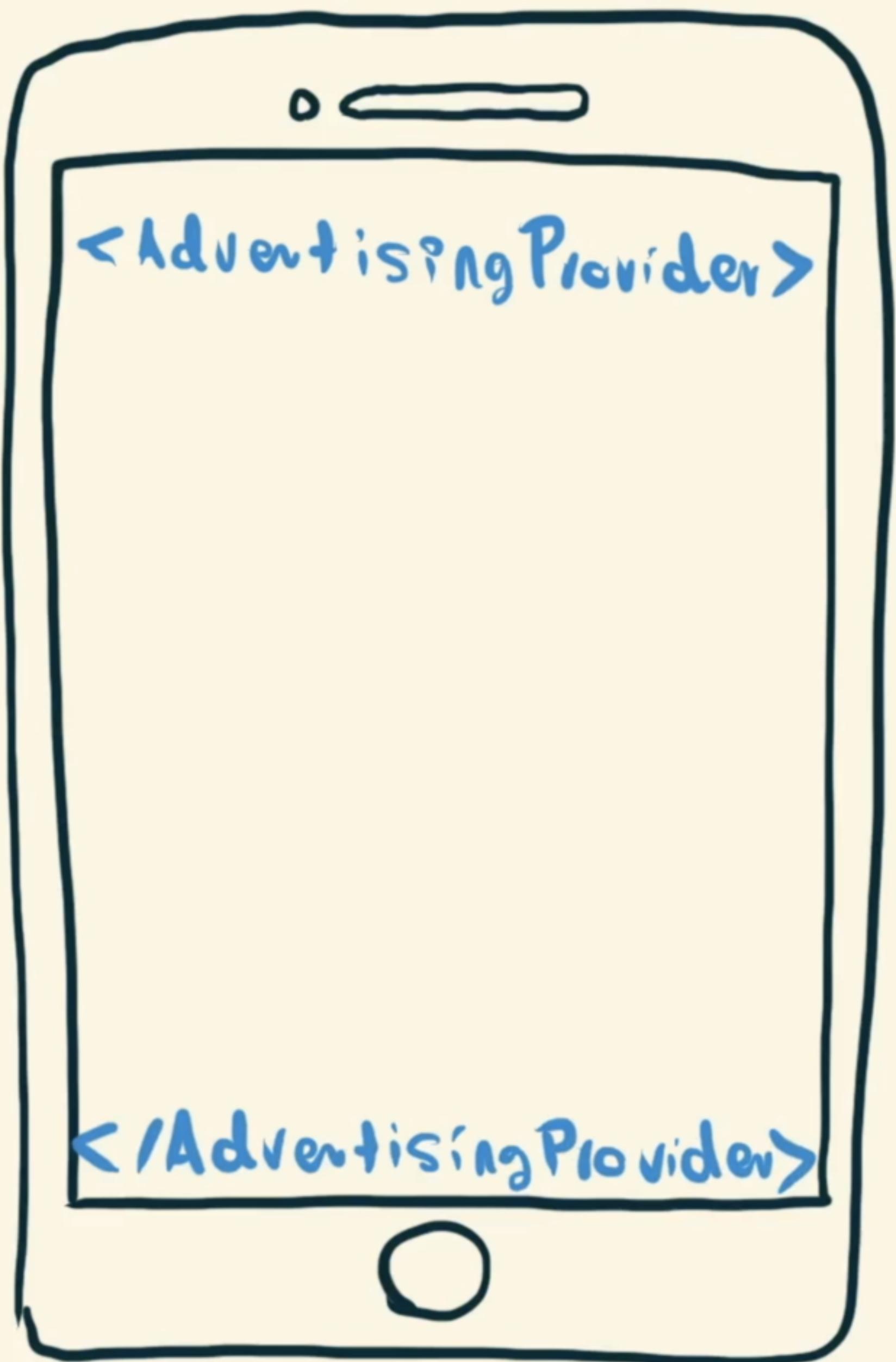
## SyntaxError

/src/App.js: Unterminated JSX contents (43:10)

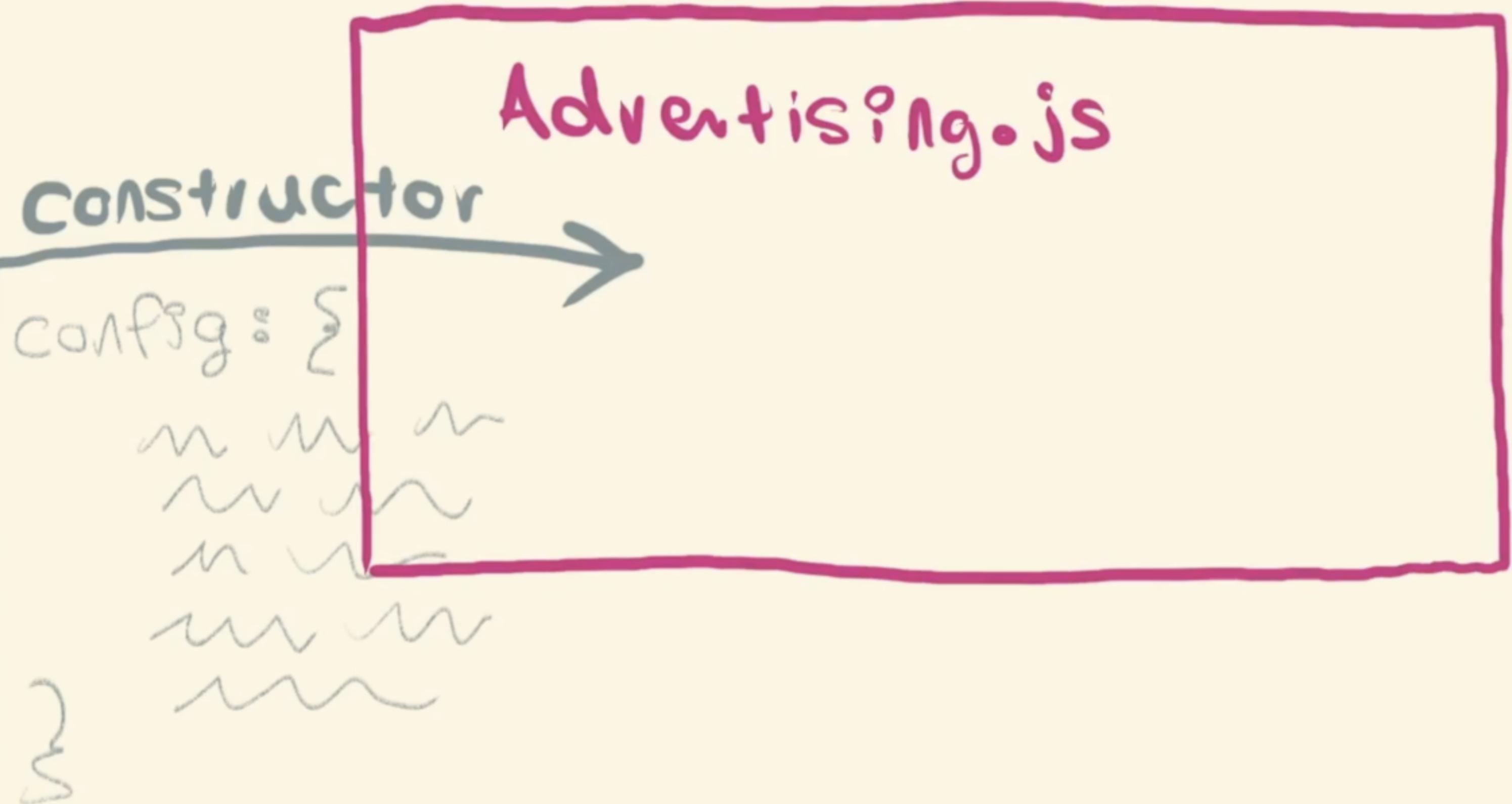
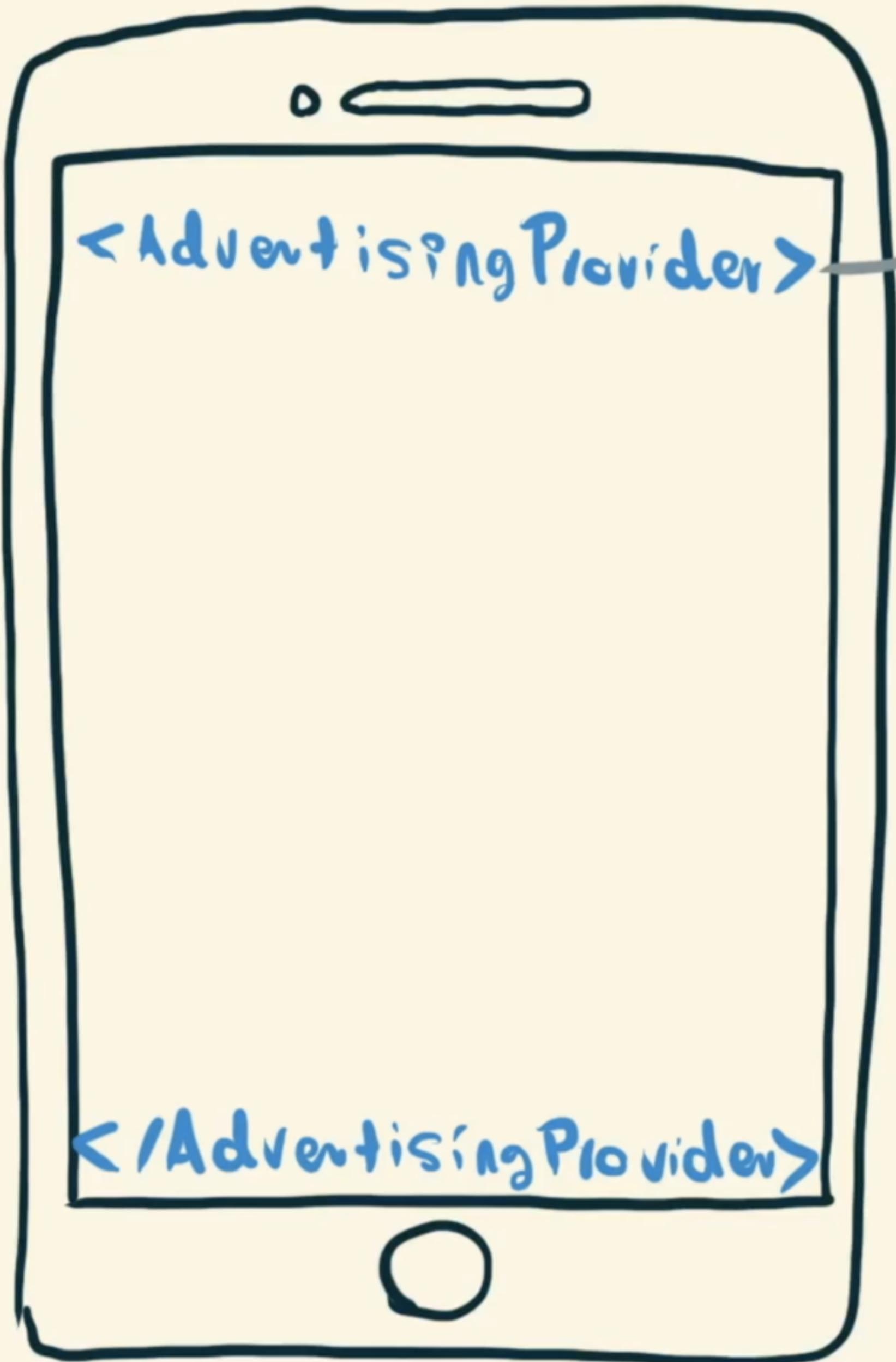
```
n
https://codesandbox.io/static/js/sandbox.2c1b959b.js:3899:50
r.<anonymous>
https://codesandbox.io/static/js/sandbox.2c1b959b.js:3900:4068
n
https://codesandbox.io/static/js/common-sandbox.5c75aa32.js:2847:811
Generator._invoke
https://codesandbox.io/static/js/common-sandbox.5c75aa32.js:2847:599
Generator.e.(anonymous function) [as next]
https://codesandbox.io/static/js/common-sandbox.5c75aa32.js:2847:990
o
https://codesandbox.io/static/js/common-sandbox.5c75aa32.js:3049:316
(anonymous function)
https://codesandbox.io/static/js/common-sandbox.5c75aa32.js:3049:464
new t
https://codesandbox.io/static/js/common-sandbox.5c75aa32.js:678:776
Worker.<anonymous>
https://codesandbox.io/static/js/common-sandbox.5c75aa32.js:3049:258
```

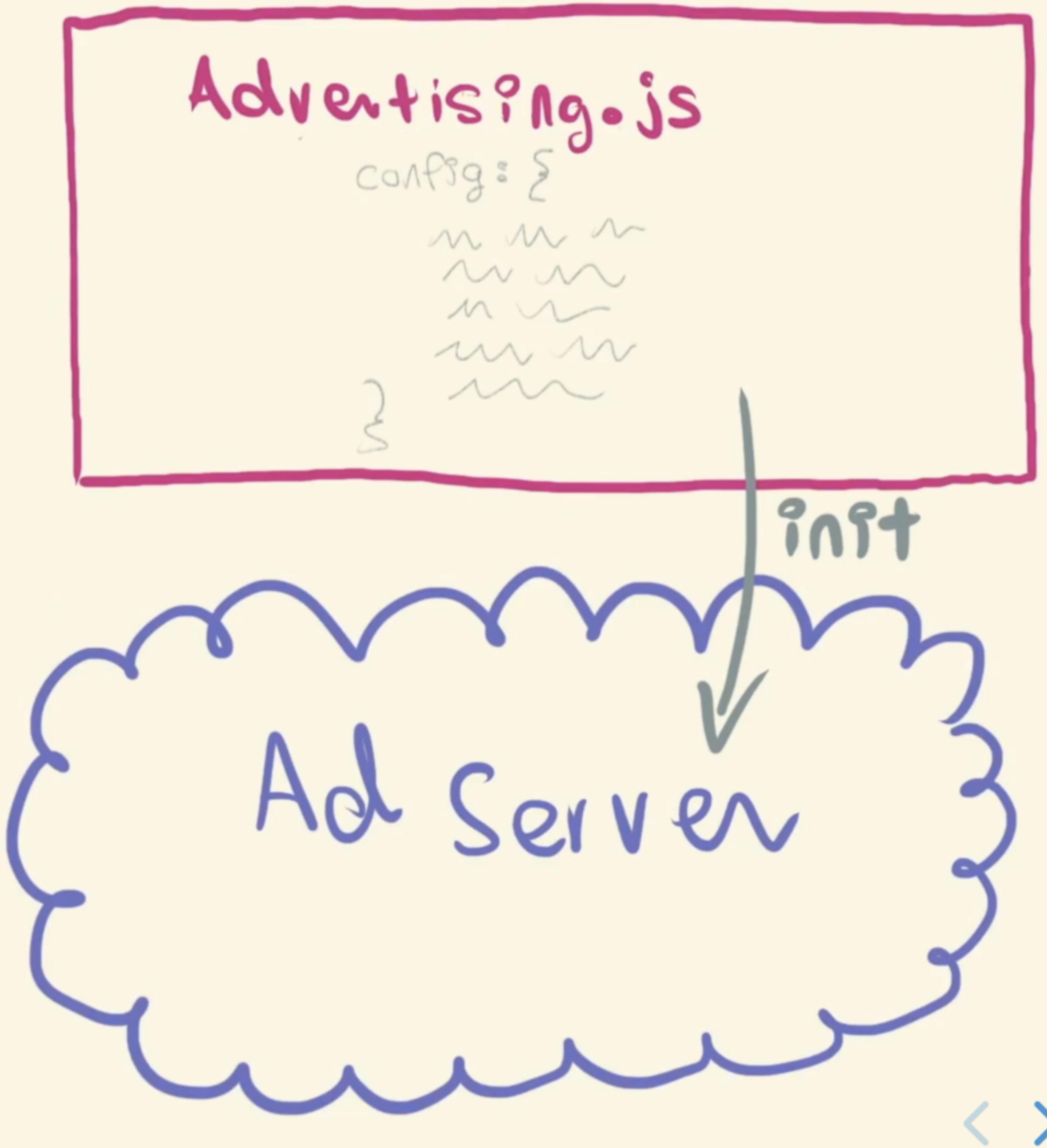
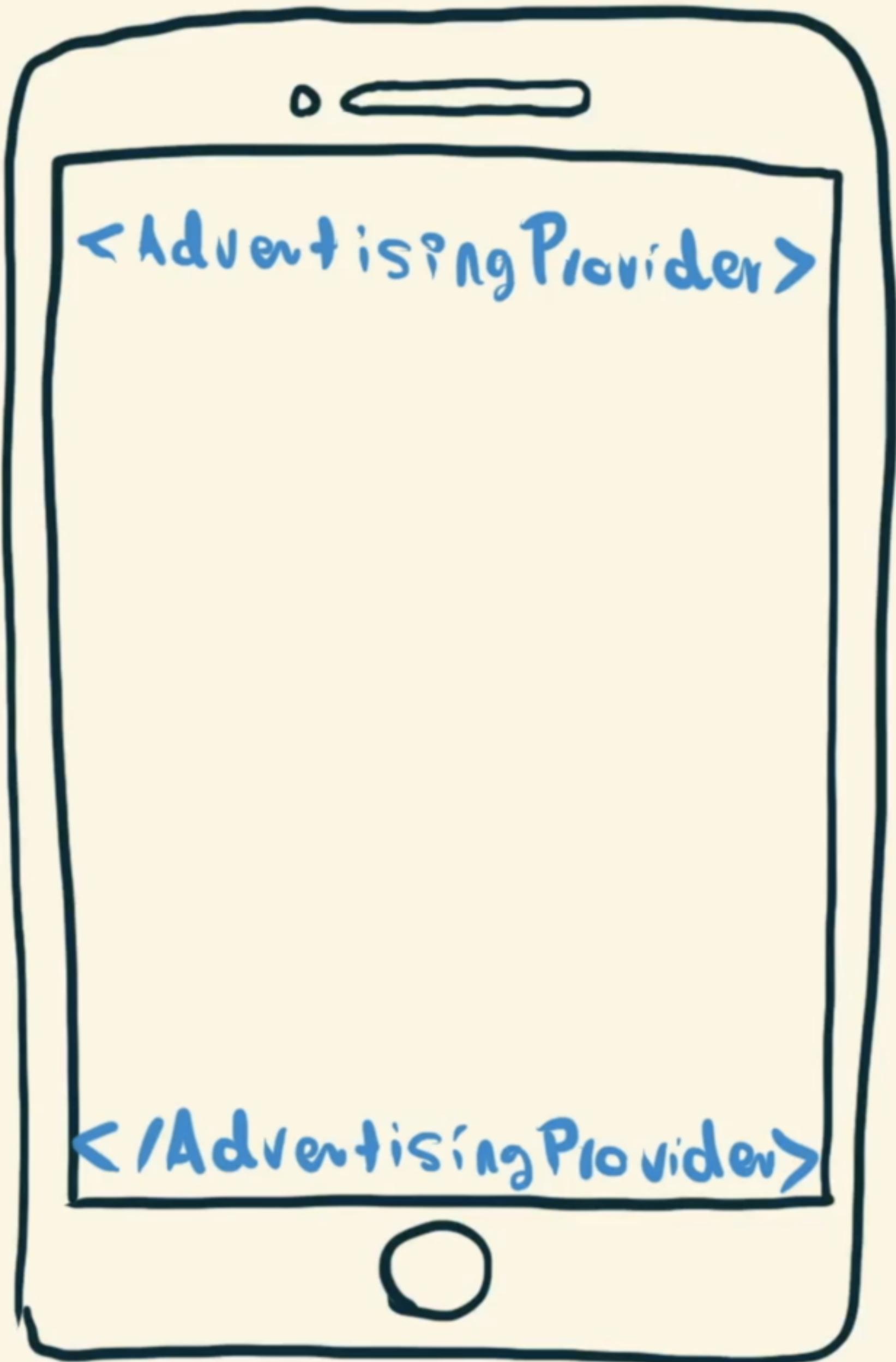
This screen is visible only in development. It will not appear if the app crashes in production.  
Open your browser's developer console to further inspect this error.  
This error overlay is powered by `react-error-overlay` used in `create-react-app`.



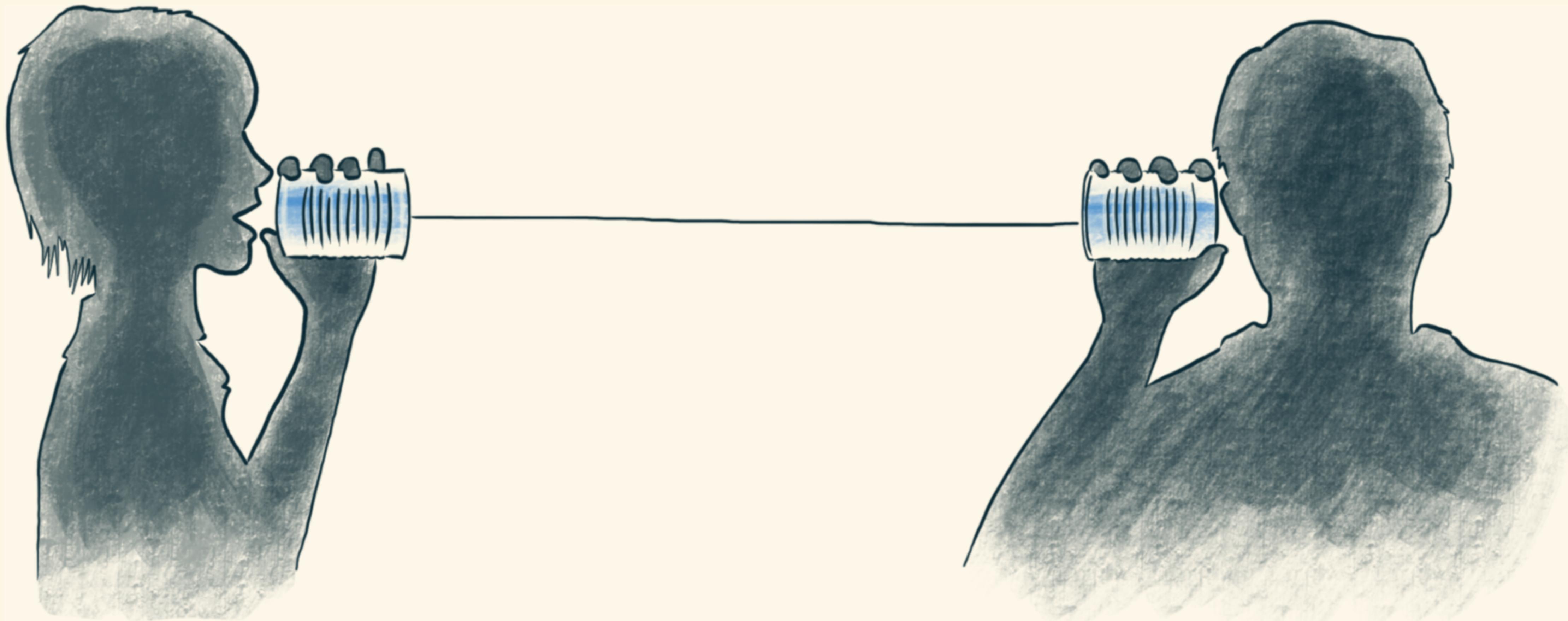


< >



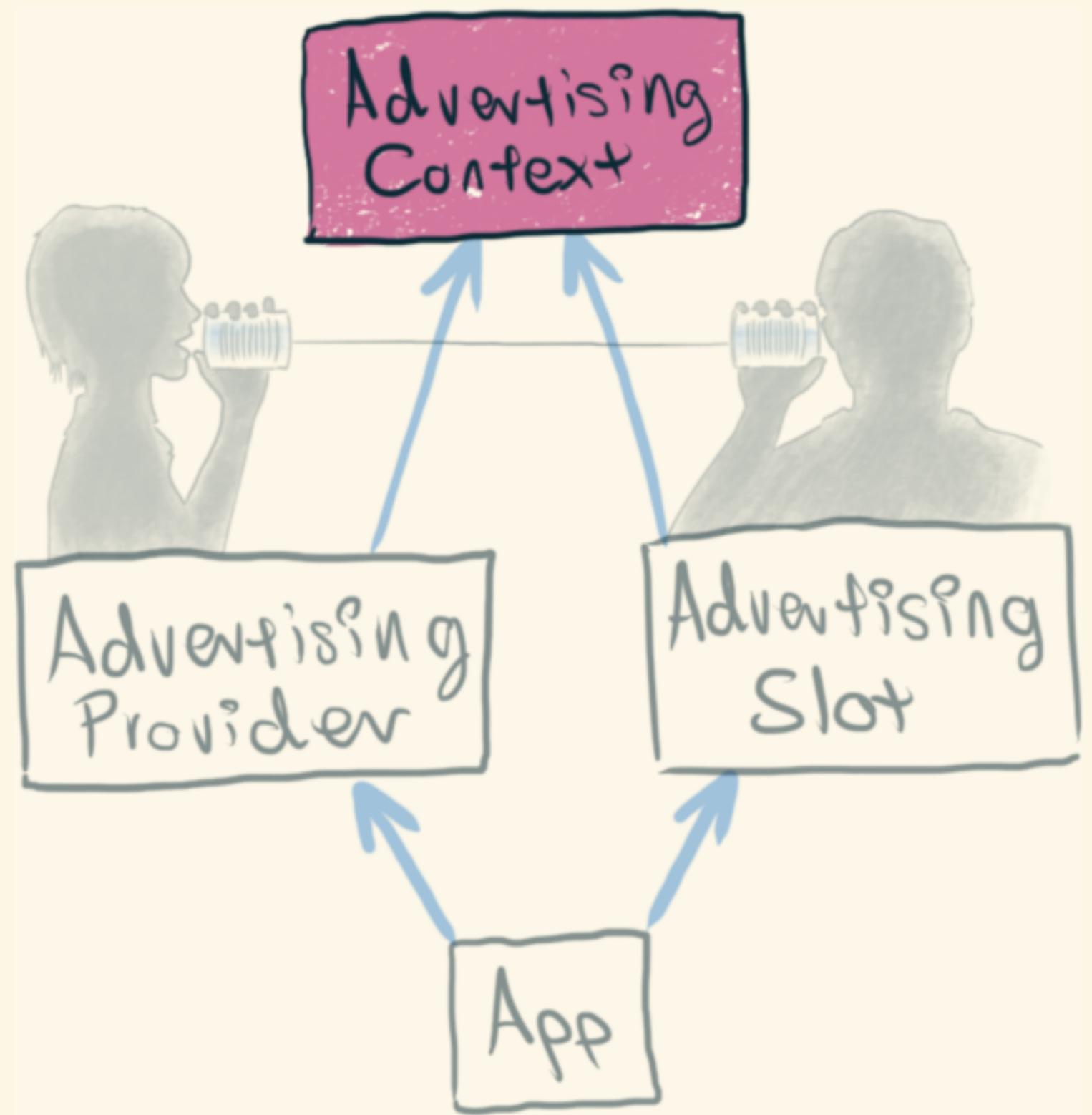


```
const { Provider, Consumer } =  
React.createContext(defaultValue);
```



# AdvertisingContext.js

```
import { createContext } from 'react';
export default createContext(() => {});
```

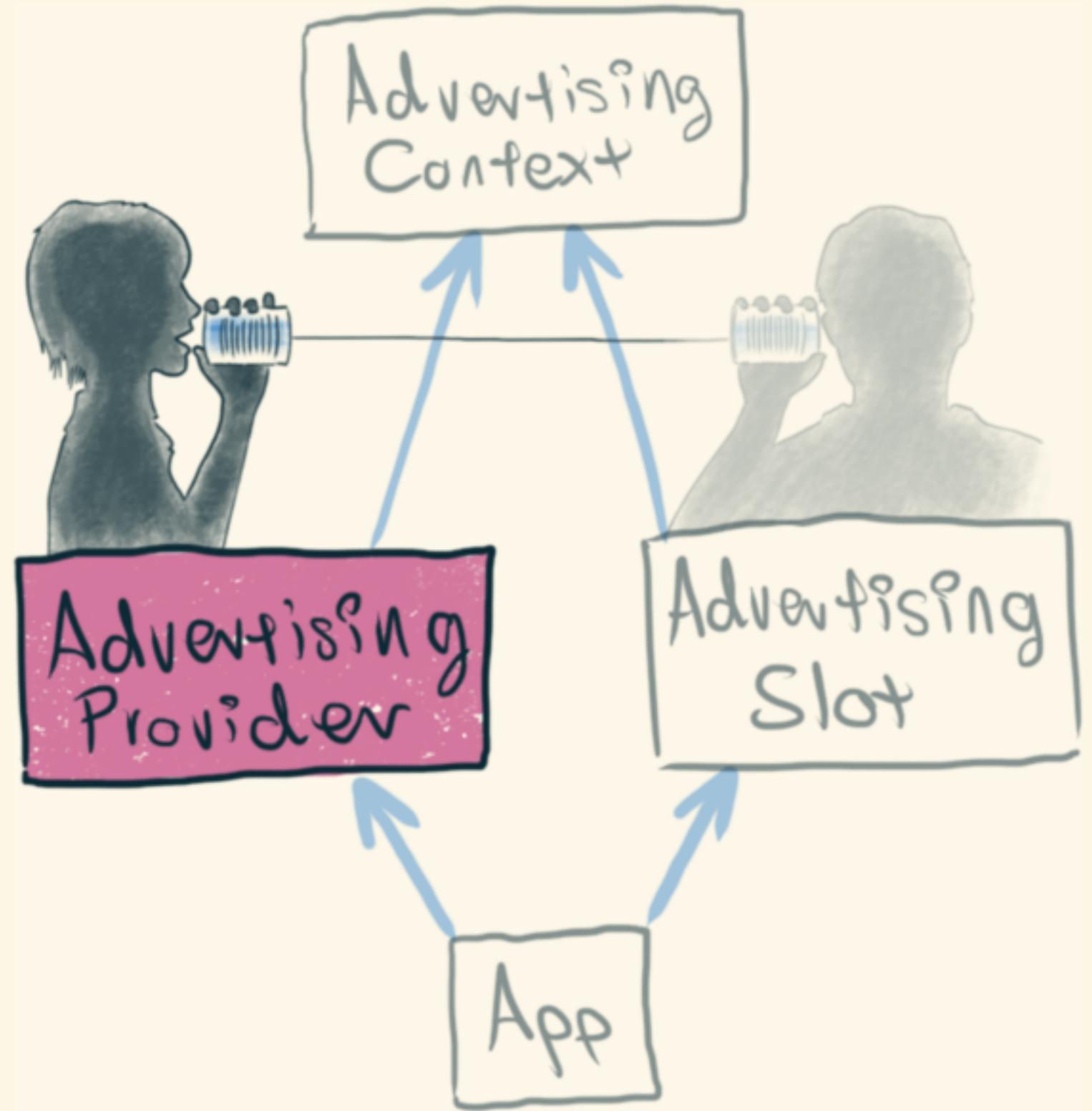


# AdvertisingProvider.js

```
import React, { Component } from 'react';
import AdvertisingContext from './AdvertisingContext';
import Advertising from './Advertising';

export default class extends Component {
  constructor(props) {
    super(props);
    this.advertising = new Advertising(props.config);
  }

  render() {
    return (
      <AdvertisingContext.Provider value={this.advertising.activate}>
        {this.props.children}
      </AdvertisingContext.Provider>
    );
  }
}
```



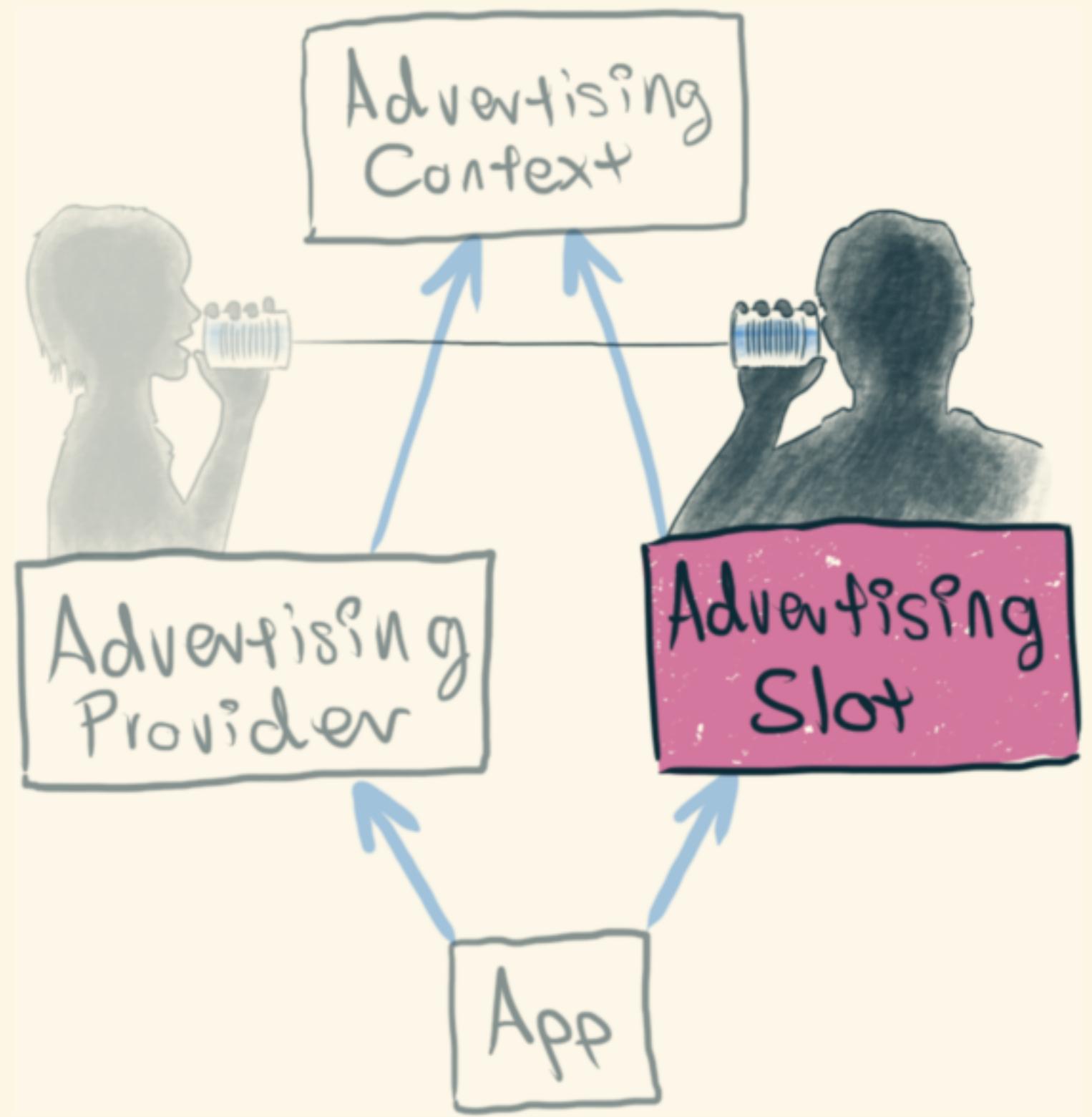
# AdvertisingSlot.js

```
import React, { Component } from 'react';
import AdvertisingContext from './AdvertisingContext';

class AdvertisingSlot extends Component {
  componentDidMount() {
    const { activate, id } = this.props;
    activate(id);
  }

  render() {
    return <div id={this.props.id} />
  }
}

export default props => (
  <AdvertisingContext.Consumer>
    {activate => <AdvertisingSlot {...props} activate={activate} />}
  </AdvertisingContext.Consumer>
);
```



```
// Old context API
import React, { Component } from 'react';
import PropTypes from 'prop-types';

class MyProvider extends Component {
  getChildContext() {
    return { message: 'hello world' };
  }
  render() {
    return this.props.children;
  }
}

MyProvider.childContextTypes = {
  message: PropTypes.string
};

class MyConsumer extends Component {
  render() {
    return <h1>{this.context.message}</h1>
  }
}

MyConsumer.contextTypes = {
  message: PropTypes.string
};

export default () => (
  <MyProvider>
    <MyConsumer />
  </MyProvider>
);
```

```
// New context API
import React, {
  Component,
  createContext
} from 'react';

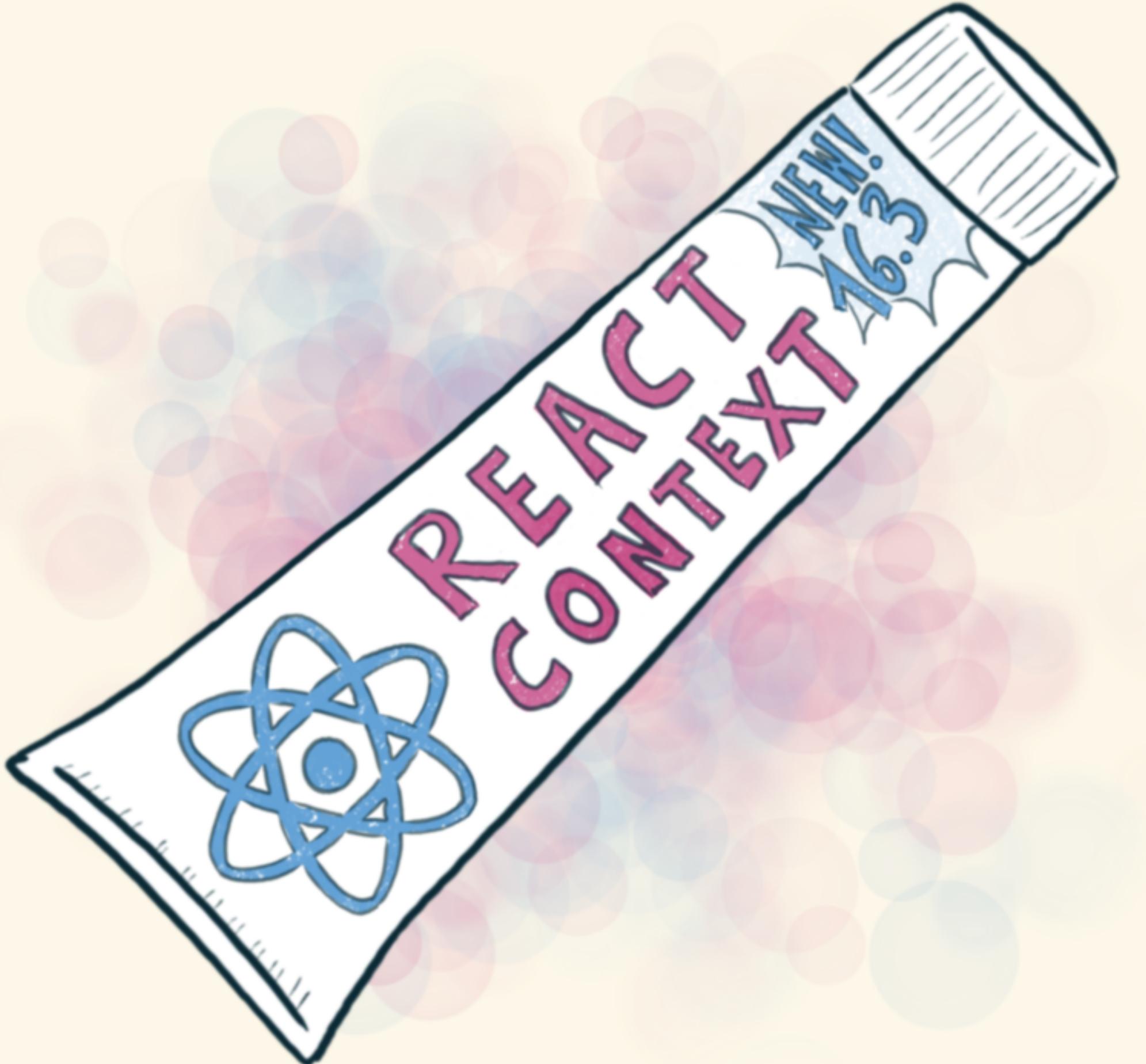
const { Provider, Consumer } = createContext();

function MyProvider({ children }) {
  return (
    <Provider value="hello world">
      {children}
    </Provider>
  );
}

function MyConsumer(props) {
  return (
    <Consumer>
      {message => <h1>{message}</h1>}
    </Consumer>
  );
}

export default () => (
  <MyProvider>
    <MyConsumer />
  </MyProvider>
);
```





## DON'T USE IT FOR EVERYTHING!

Other usecase examples  
besides *getting rich quick*:

- Internationalization
- Layout themes
- Tracking



## react-prebid

Library for ad placements with [Prebid](#) header bidding in [React](#) applications.

To use it, you need to have a [DoubleClick for Publishers](#) (DFP) ad server set up, along with configuration to use Prebid in place. Please refer to the [Prebid documentation](#) for details.

## Usage

### Installing the Package

Assuming you already have an application that uses React, install the *react-prebid* package as a production dependency with npm:

```
npm install --save react-prebid
```

# THANK YOU!

Follow me on Twitter:  
[@wiekatz](https://twitter.com/wiekatz)

Patrick Hund, frontend developer at [eBay Tech Berlin](https://tech.ebay.de)

View the slides:  
[technology-ebay-de.github.io/get-rich-quick-with-react-context/](https://technology-ebay-de.github.io/get-rich-quick-with-react-context/)

View the code examples:  
[codesandbox.io/s/488y5n5kw](https://codesandbox.io/s/488y5n5kw)  
[codesandbox.io/s/3rz877y8jm](https://codesandbox.io/s/3rz877y8jm)

