

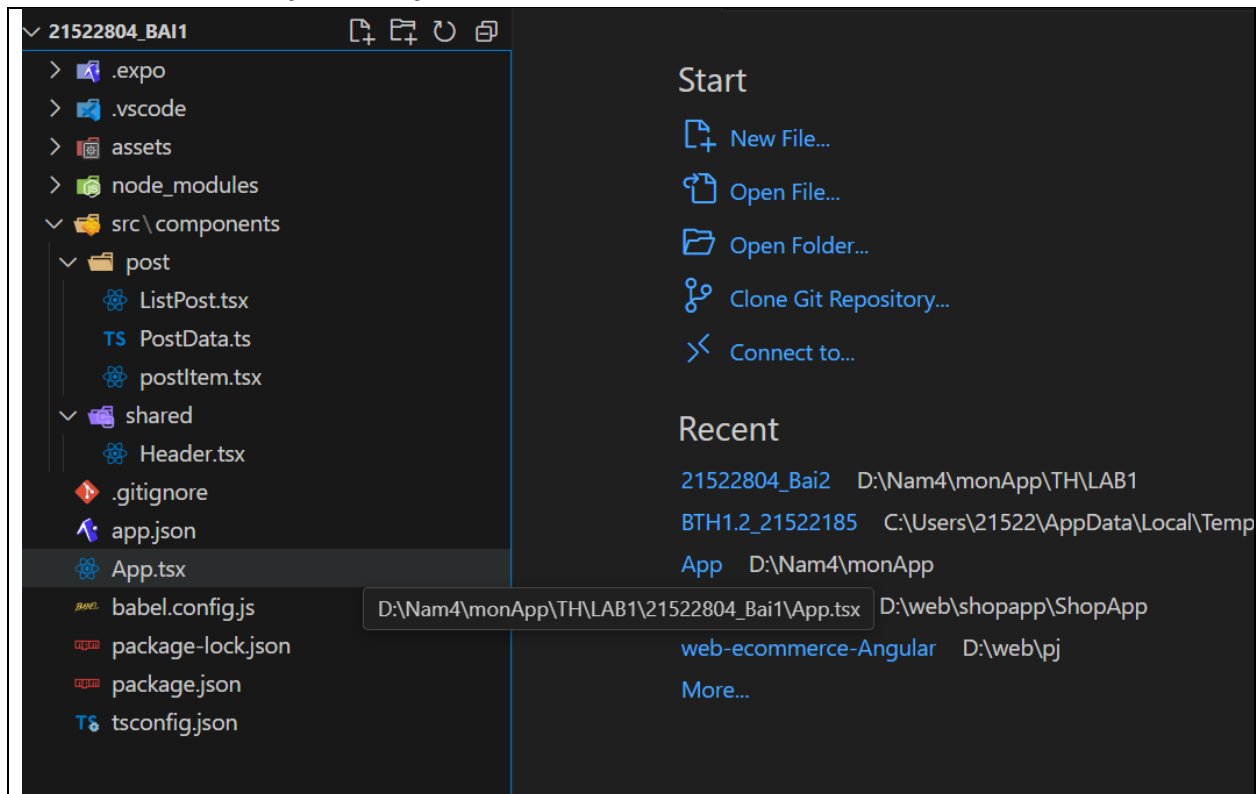
BÀI TẬP THỰC HÀNH 1

Họ Tên: Phạm Hoài Vũ

MSSV: 21522804

Bài 1: Social Media

- *Cấu trúc các folders / files của dự án.*



- *Nội dung code của các file:*

1. App.tsx

```
1 // Pham Hoai Vu - 21522804
2 import { StyleSheet, Text, View } from 'react-native';
3 import Header from './src/components/shared/Header';
4 import Posts from './src/components/post/ListPost';
5 export default function App() {
6   return (
7     <View style={styles.container}>
8       <Header/>
9       <Posts/>
10    </View>
11  );
12 }
13
14 const styles = StyleSheet.create({
15   container: {
16     flex: 1,
17     backgroundColor: '#fff',
18     alignItems: 'center',
19     justifyContent: 'center',
20   },
21 });
```

2. Components

2.1. Header.tsx

```
1 // Pham Hoai Vu - 21522804
2 import { View, Text, StyleSheet } from 'react-native';
3
4 const Header = () => {
5   return (
6     <View style={styles.headerContainer}>
7       <Text style={styles.headerText}>Social Media</Text>
8     </View>
9   );
10 }
11
12 const styles = StyleSheet.create({
13   headerContainer: {
14     height: 60,
15     width: '100%',
16     justifyContent: 'center',
17     alignItems: 'center',
18     backgroundColor: '#2563eb',
19   },
20   headerText: {
21     fontSize: 24,
22     color: 'white',
23     fontWeight: 'bold',
24   },
25 });
26
27 export default Header;
```

2.2. Post.tsx

```
App.tsx | Header.tsx | postitem.tsx X
src > components > post > postitem.tsx > PostItemProps > shares
1 // Pham Hosi VO - 21522804
2 import React from "react";
3 import Icon from "react-native-vector-icons/FontAwesome"
4 import { View, Text, Image, TouchableOpacity, StyleSheet } from "react-native"
5 interface status {
6   LIKE: boolean
7 }
8 interface interactProps {
9   like: number
10  comment: number
11  share: number
12 }
13 interface PostItemProps {
14  username: string
15  title: string
16  imageUrl: string
17  likes: number
18  comments: number
19  shares: number
20 }
21 const PostItem = (props: PostItemProps) => {
22  const { username, title, imageUrl, likes, comments, shares } = props
23  const [status, setStatus] = React.useState<status>({
24    LIKE: false,
25  })
26  const [interact, setInteract] = React.useState<interactProps>({
27    like: likes,
28    comment: comments,
29    share: shares,
30  })
31
32  const handleInteract = (nameText: string) => {
33    if (nameText === "like") {
34      setStatus((preState) => ({ ...preState, LIKE: !preState.LIKE }))
35      setInteract((preState) => ({
36        ...preState,
37        like: status.LIKE ? preState.like - 1 : preState.like + 1,
38      }))
39    }
40    if (nameText === "comment") {
41      setInteract((preState) => ({
42        ...preState,
43        comment: preState.comment + 1,
44      }))
45    }
46    if (nameText === "share") {
47      setInteract((preState) => ({
48        ...preState,
49        share: preState.share + 1,
50      }))
51    }
52  }
53
54  return (
55    <View style={styles.container}>
56      <View style={styles.header}>
57        <View style={styles.avatarContainer}>
58          <Image
59            source={{
60              uri: "https://i.pinimg.com/474x/a9/b8/43/a9b843b45b13d39
61            }}
62            style={styles.avatar}
63          />
64        </View>
65        <Text style={styles.username}>{username}</Text>
66      </View>
67      <Text style={styles.title}>{title}</Text>
68      <Image
69        source={{
70          uri: imageUrl,
71        }}
72        style={styles.postImage}
73      />
74      <View style={styles.interactContainer}>
75        <Text style={styles.likes}>{interact.like} Likes</Text>
76        <Text style={styles.comments}>{interact.comment} Comments</Text>
77        <Text style={styles.shares}>{interact.share} Shares</Text>
78      </View>
79      <View style={styles.divider} />
80      <View style={styles.actionsContainer}>
81        <TouchableOpacity onPress={() => handleInteract("like")}>
82          <Text
83            style={
84              styles.actionText,
85              status.LIKE ? styles.liked : styles.unliked,
86            }
87          >
88            <Icon
89              style={
90                styles.actionIcon,
91                status.LIKE ? styles.liked : styles.unliked,
92              }
93              name={status.LIKE ? "heart" : "heart-o"}
94              size={24}
95            />
96          </Text>
97        </TouchableOpacity>
98        <TouchableOpacity onPress={() => handleInteract("comment")}>
99          <Text
100            style={
101              styles.actionText,
102              status.LIKE ? styles.liked : styles.unliked,
103            }
104          >
105            <Icon
106              style={
107                styles.actionIcon,
108                status.LIKE ? styles.liked : styles.unliked,
109              }
110              name="comment"
111              size={24}
112            />
113          </Text>
114        </TouchableOpacity>
115        <TouchableOpacity onPress={() => handleInteract("share")}>
116          <Text
117            style={
118              styles.actionText,
119              status.LIKE ? styles.liked : styles.unliked,
120            }
121          >
122            <Icon
123              style={
124                styles.actionIcon,
125                status.LIKE ? styles.liked : styles.unliked,
126              }
127              name="share"
128              size={24}
129            />
130          </Text>
131        </TouchableOpacity>
132      </View>
133    </View>
134  )
135 }
136
137 const styles = StyleSheet.create({
138   container: {
139     padding: 10,
140     backgroundColor: "#f8f8f8",
141   },
142   header: {
143     flexDirection: "row",
144     alignItems: "center",
145     marginBottom: 10,
146   },
147   avatarContainer: {
148     width: 50,
149     height: 50,
150     borderRadius: 25,
151   },
152   avatar: {
153     width: 50,
154     height: 50,
155     borderRadius: 25,
156   },
157   username: {
158     fontweight: "bold",
159     fontSize: 16,
160   },
161   title: {
162     fontweight: "bold",
163     fontSize: 16,
164   },
165   postImage: {
166     width: 100,
167     height: 100,
168     borderRadius: 10,
169   },
170   interactContainer: {
171     margin: 10,
172     display: "flex",
173     justify-content: "space-between",
174     padding: 0 10,
175   },
176   divider: {
177     height: 1,
178     backgroundColor: "#ccc",
179     margin: 10 0,
180   },
181   actionsContainer: {
182     display: "flex",
183     justify-content: "space-between",
184     padding: 10 0,
185   },
186   actionText: {
187     fontweight: "bold",
188     display: "flex",
189     alignItems: "center",
190   },
191   liked: {
192     color: "#e1056e",
193   },
194   disliked: {
195     color: "black",
196   },
197 })
198
199 export default PostItem;
```

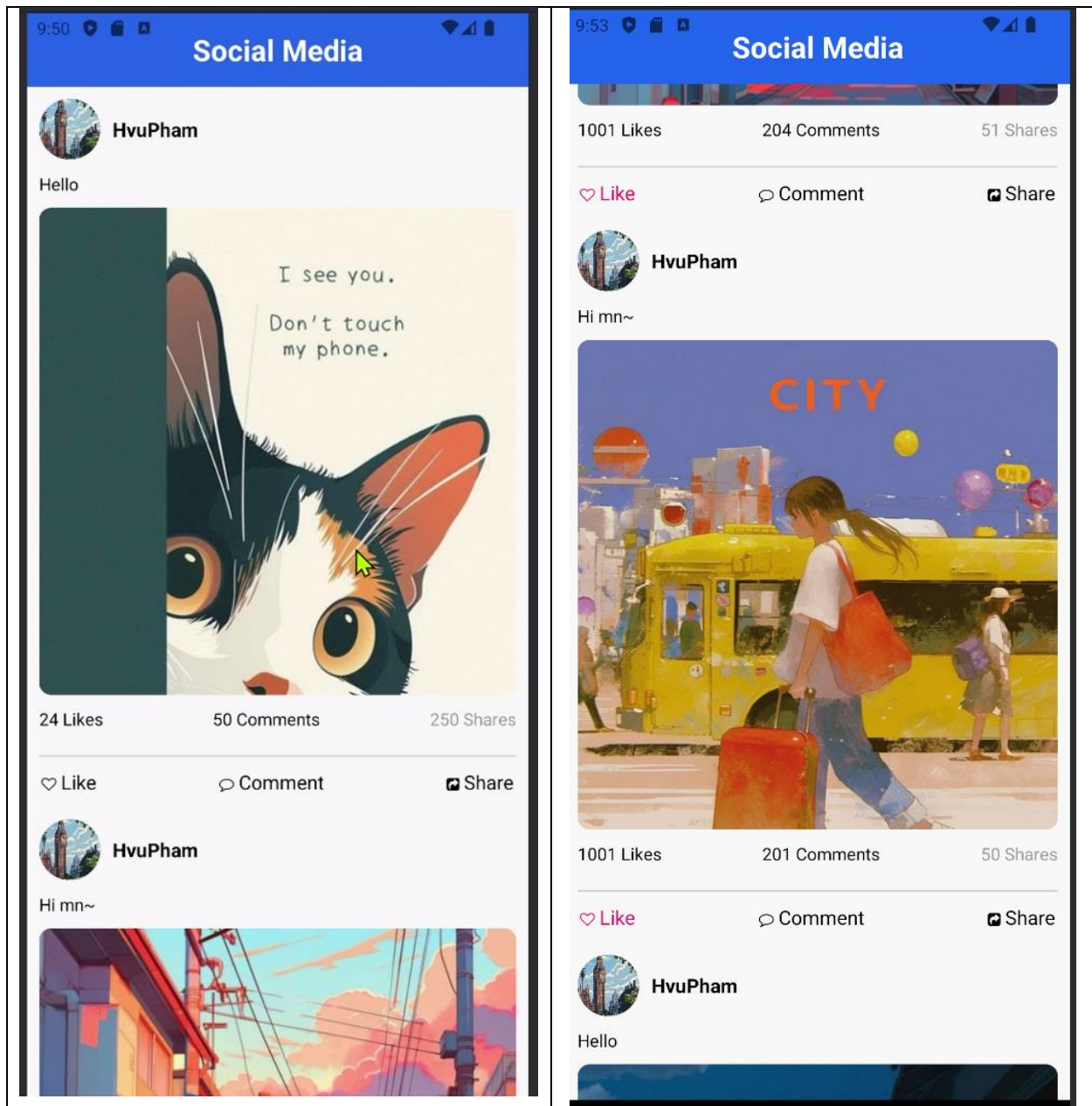
Hình 2.2.a. Post.tsx

```
App.tsx | Header.tsx | postitem.tsx X
src > components > post > postitem.tsx > PostItemProps > shares
21 const PostItem = (props: PostItemProps) => {
22   const { username, title, imageUrl, likes, comments, shares } = props
23   const [status, setStatus] = React.useState<status>({
24     LIKE: false,
25   })
26   const [interact, setInteract] = React.useState<interactProps>({
27     like: likes,
28     comment: comments,
29     share: shares,
30   })
31
32   const handleInteract = (nameText: string) => {
33     if (nameText === "like") {
34       setStatus((preState) => ({ ...preState, LIKE: !preState.LIKE }))
35       setInteract((preState) => ({
36         ...preState,
37         like: status.LIKE ? preState.like - 1 : preState.like + 1,
38       }))
39     }
40     if (nameText === "comment") {
41       setInteract((preState) => ({
42         ...preState,
43         comment: preState.comment + 1,
44       }))
45     }
46     if (nameText === "share") {
47       setInteract((preState) => ({
48         ...preState,
49         share: preState.share + 1,
50       }))
51     }
52   }
53
54   return (
55     <View style={styles.container}>
56       <View style={styles.header}>
57         <View style={styles.avatarContainer}>
58           <Image
59             source={{
60               uri: "https://i.pinimg.com/474x/a9/b8/43/a9b843b45b13d39
61             }}
62             style={styles.avatar}
63           />
64         </View>
65         <Text style={styles.username}>{username}</Text>
66       </View>
67       <Text style={styles.title}>{title}</Text>
68       <Image
69         source={{
70           uri: imageUrl,
71         }}
72         style={styles.postImage}
73       />
74       <View style={styles.interactContainer}>
75         <Text style={styles.likes}>{interact.like} Likes</Text>
76         <Text style={styles.comments}>{interact.comment} Comments</Text>
77         <Text style={styles.shares}>{interact.share} Shares</Text>
78       </View>
79       <View style={styles.divider} />
80       <View style={styles.actionsContainer}>
81         <TouchableOpacity onPress={() => handleInteract("like")}>
82           <Text
83             style={
84               styles.actionText,
85               status.LIKE ? styles.liked : styles.unliked,
86             }
87           >
88             <Icon
89               style={
90                 styles.actionIcon,
91                 status.LIKE ? styles.liked : styles.unliked,
92               }
93               name={status.LIKE ? "heart" : "heart-o"}
94               size={24}
95             />
96           </Text>
97         </TouchableOpacity>
98         <TouchableOpacity onPress={() => handleInteract("comment")}>
99           <Text
100             style={
101               styles.actionText,
102               status.LIKE ? styles.liked : styles.unliked,
103             }
104           >
105             <Icon
106               style={
107                 styles.actionIcon,
108                 status.LIKE ? styles.liked : styles.unliked,
109               }
110               name="comment"
111               size={24}
112             />
113           </Text>
114         </TouchableOpacity>
115         <TouchableOpacity onPress={() => handleInteract("share")}>
116           <Text
117             style={
118               styles.actionText,
119               status.LIKE ? styles.liked : styles.unliked,
120             }
121           >
122             <Icon
123               style={
124                 styles.actionIcon,
125                 status.LIKE ? styles.liked : styles.unliked,
126               }
127               name="share"
128               size={24}
129             />
130           </Text>
131         </TouchableOpacity>
132       </View>
133     </View>
134   )
135 }
136
137 const styles = StyleSheet.create({
138   container: {
139     padding: 10,
140     backgroundColor: "#f8f8f8",
141   },
142   header: {
143     flexDirection: "row",
144     alignItems: "center",
145     marginBottom: 10,
146   },
147   avatarContainer: {
148     width: 50,
149     height: 50,
150     borderRadius: 25,
151   },
152   avatar: {
153     width: 50,
154     height: 50,
155     borderRadius: 25,
156   },
157   username: {
158     fontweight: "bold",
159     fontSize: 16,
160   },
161   title: {
162     fontweight: "bold",
163     fontSize: 16,
164   },
165   postImage: {
166     width: 100,
167     height: 100,
168     borderRadius: 10,
169   },
170   interactContainer: {
171     margin: 10,
172     display: "flex",
173     justify-content: "space-between",
174     padding: 0 10,
175   },
176   divider: {
177     height: 1,
178     backgroundColor: "#ccc",
179     margin: 10 0,
180   },
181   actionsContainer: {
182     display: "flex",
183     justify-content: "space-between",
184     padding: 10 0,
185   },
186   actionText: {
187     fontweight: "bold",
188     display: "flex",
189     alignItems: "center",
190   },
191   liked: {
192     color: "#e1056e",
193   },
194   disliked: {
195     color: "black",
196   },
197 })
198
199 export default PostItem;
```

3. Data

```
src > components > post > TS PostData.ts > [0] itemList
1  const itemList = [
2
3      {
4          username: "HvuPham",
5          title: "Hello",
6          imgUrl:
7              "https://i.pining.com/control/474x/67/76/c5/6776c56e89f1a6df32c00775b07845d8.jpg",
8          likes: 24,
9          comments: 50,
10         shares: 250,
11     },
12     {
13         username: "HvuPham",
14         title: "Hi mn~",
15         imgUrl:
16             "https://i.pining.com/474x/bd/51/ea/bd51eade201d05259b4fb72ff3053540.jpg",
17         likes: 1000,
18         comments: 200,
19         shares: 50,
20     },
21     {
22         username: "HvuPham",
23         title: "Hi mn~",
24         imgUrl: "https://i.pining.com/474x/0d/e6/87/0de6879366b7276f8857ad64836794ca.jpg",
25         likes: 1000,
26         comments: 200,
27         shares: 50,
28     },
29     {
30         username: "HvuPham",
31         title: "Hello",
32         imgUrl: "https://i.pining.com/474x/5e/80/0a/5e800a947e87f35dd0be0c0c5adf235.jpg",
33         likes: 24,
34         comments: 50,
35         shares: 250,
36     }
37 ]
```

- Màn hình kết quả:

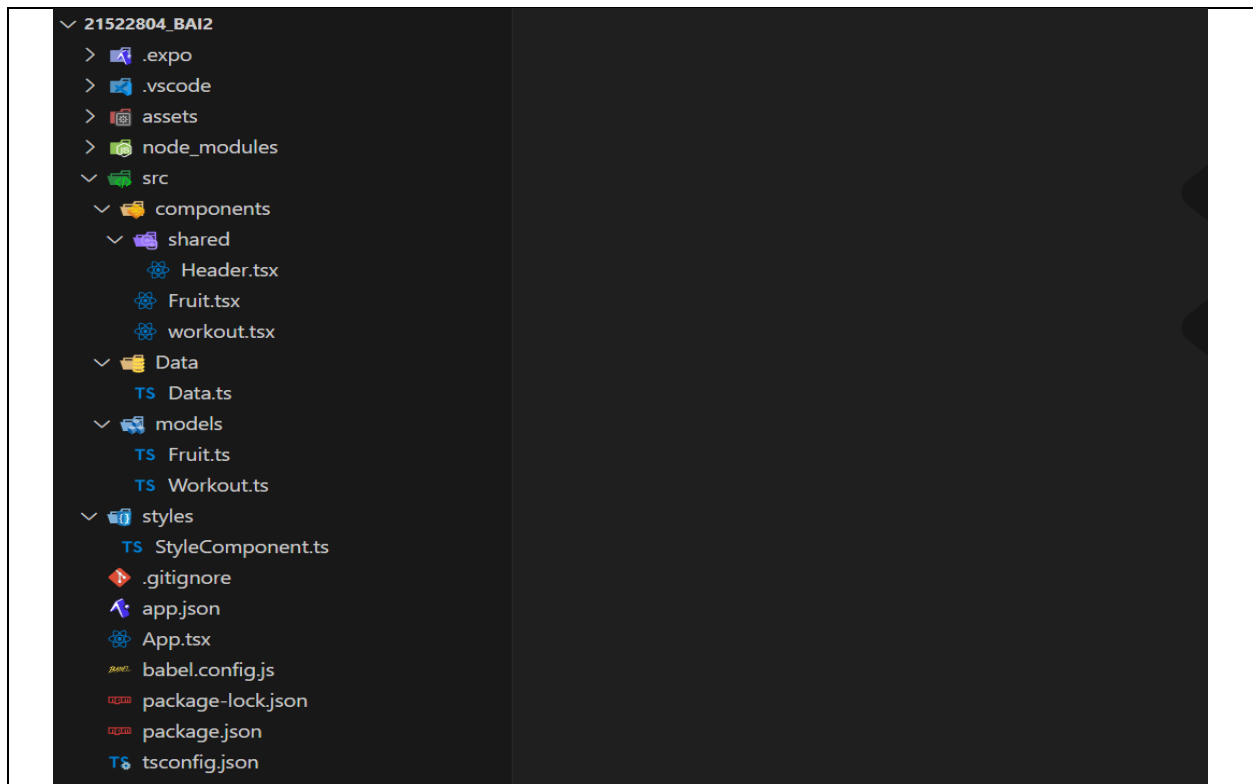


- *Link video màn hình kết quả:*

<https://drive.google.com/drive/folders/1bVoVq56EB9kzqz4OcQDbYHqgqJBgzTlH?usp=sharing>

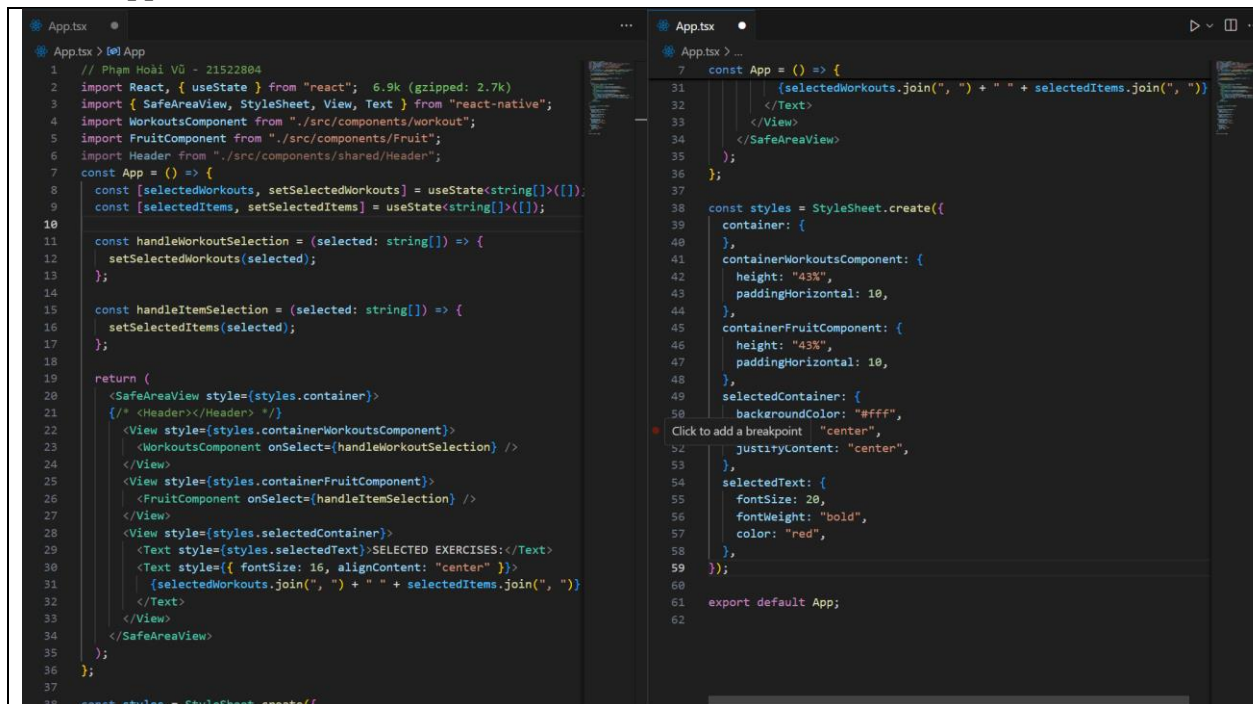
Bài 2: Workouts, Fruits and Vegetables

- *Cấu trúc các folders / files của dự án.*



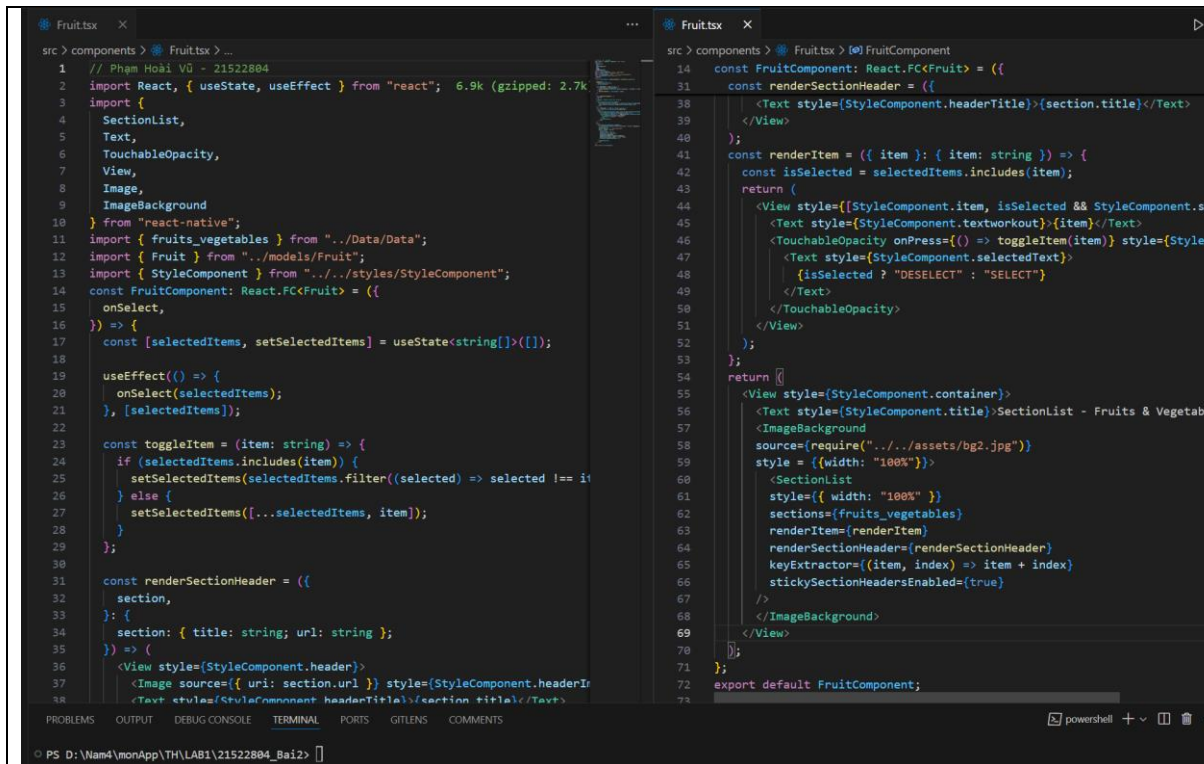
- *Nội dung code của các file:*

1. App.tsx



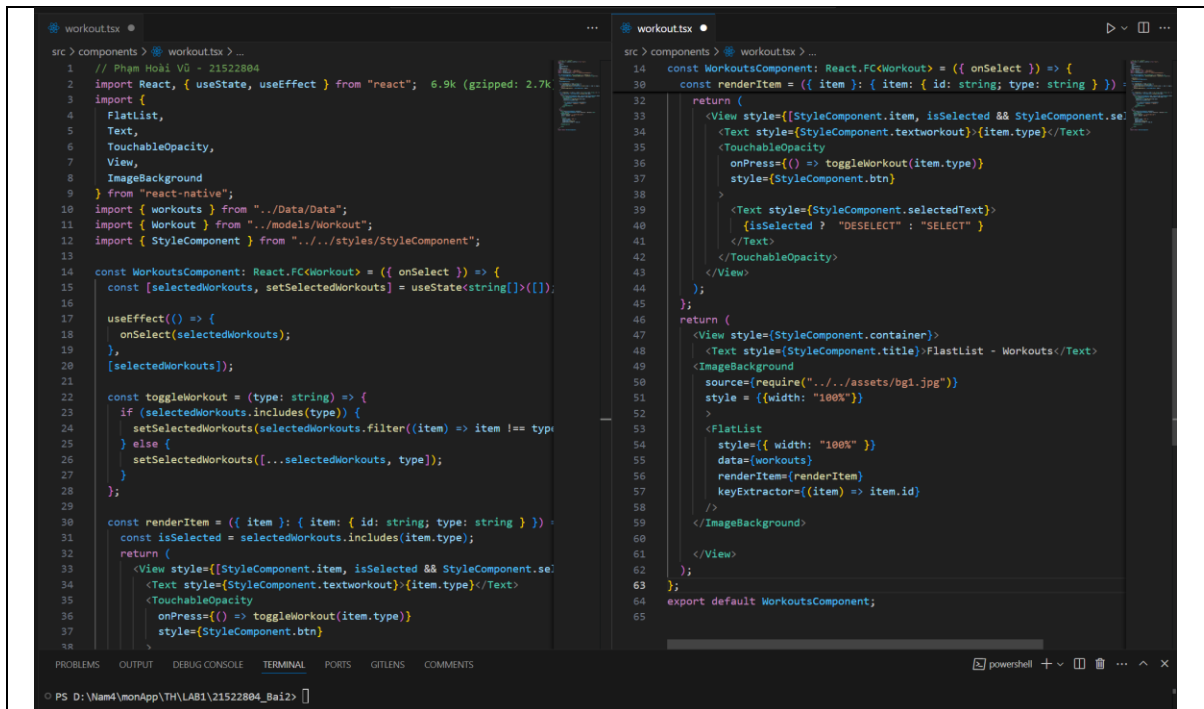
2. Components

2.1. Fruit.tsx



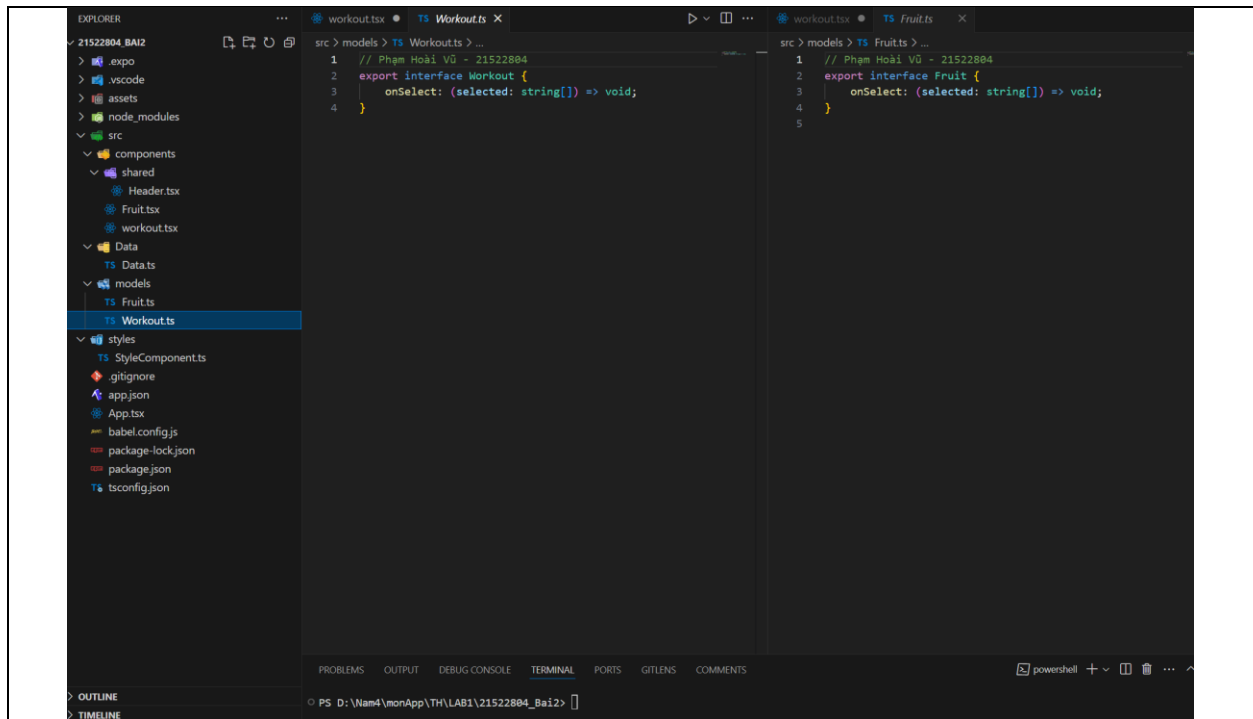
```
src > components > Fruit.tsx > ...
1 // Phạm Hoài Vũ - 21522804
2 import React, { useState, useEffect } from "react"; // 6.9k (gzipped: 2.7k)
3 import {
4   SectionList,
5   Text,
6   TouchableOpacity,
7   View,
8   Image,
9   ImageBackground
10 } from "react-native";
11 import { fruits_vegetables } from "../Data/Data";
12 import { Fruit } from "../models/Fruit";
13 import { StyleComponent } from "../styles/StyleComponent";
14 const FruitComponent: React.FC<Fruit> = ({
15   onSelect,
16 }) => {
17   const [selectedItems, setSelectedItems] = useState<string[]>([]);
18
19   useEffect(() => {
20     onSelect(selectedItems);
21   }, [selectedItems]);
22
23   const toggleItem = (item: string) => {
24     if (selectedItems.includes(item)) {
25       setSelectedItems(selectedItems.filter((selected) => selected !== item));
26     } else {
27       setSelectedItems([...selectedItems, item]);
28     }
29   };
30
31   const renderSectionHeader = ({
32     section,
33   }): {
34     section: { title: string; url: string };
35   } => {
36     <View style={StyleComponent.header}>
37       <Image source={{ uri: section.url }} style={StyleComponent.headerImage}
38         <Text style={StyleComponent.headerTitle}>{section.title}</Text>
39     </View>
40   };
41
42   const renderItem = ({ item }: { item: string }) => {
43     const isSelected = selectedItems.includes(item);
44     return (
45       <View style={StyleComponent.item, isSelected && StyleComponent.selectedItem}>
46         <Text style={StyleComponent.textworkout}>{item}</Text>
47         <TouchableOpacity onPress={() => toggleItem(item)} style={StyleComponent.selectedText}>
48           {isSelected ? "DESELECT" : "SELECT"}
49         </Text>
50       </TouchableOpacity>
51     </View>
52   );
53 };
54
55 return (
56   <View style={StyleComponent.container}>
57     <Text style={StyleComponent.title}>SectionList - Fruits & Vegetables</Text>
58     <ImageBackground
59       source={require("../assets/bg2.jpg")}
60       style={{ width: "100%" }}
61     >
62       <SectionList
63         style={{ width: "100%" }}
64         sections={fruits_vegetables}
65         renderItem={renderItem}
66         renderSectionHeader={renderSectionHeader}
67         keyExtractor={(item, index) => item + index}
68         stickySectionHeadersEnabled={true}
69       />
80     </ImageBackground>
81   </View>
82 );
83
84 export default FruitComponent;
```

2.2. workout.tsx

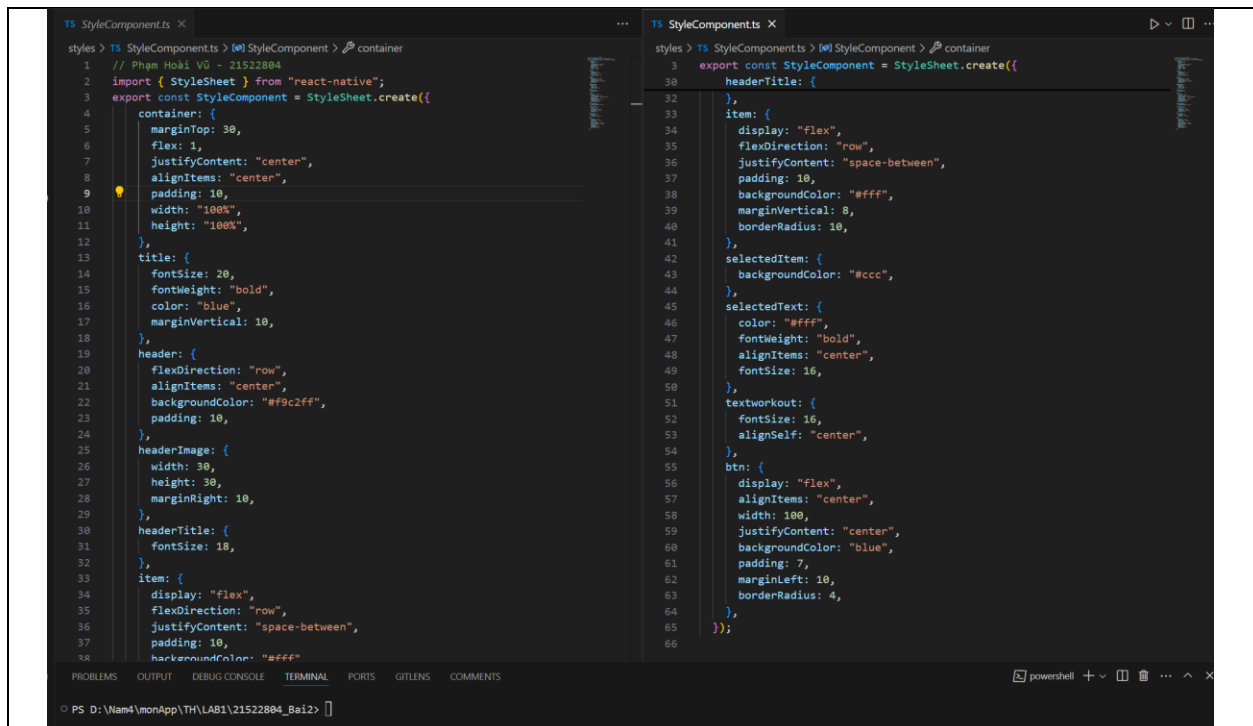


```
src > components > workout.tsx > ...
1 // Phạm Hoài Vũ - 21522804
2 import React, { useState, useEffect } from "react"; // 6.9k (gzipped: 2.7k)
3 import {
4   FlatList,
5   Text,
6   TouchableOpacity,
7   View,
8   ImageBackground
9 } from "react-native";
10 import { workouts } from "../Data/Data";
11 import { Workout } from "../models/Workout";
12 import { StyleComponent } from "../styles/StyleComponent";
13
14 const WorkoutsComponent: React.FC<Workout> = ({ onSelect }) => {
15   const [selectedWorkouts, setSelectedWorkouts] = useState<string[]>([]);
16
17   useEffect(() => {
18     onSelect(selectedWorkouts);
19   }, [selectedWorkouts]);
20
21   const toggleWorkout = (type: string) => {
22     if (selectedWorkouts.includes(type)) {
23       setSelectedWorkouts(selectedWorkouts.filter((item) => item !== type));
24     } else {
25       setSelectedWorkouts([...selectedWorkouts, type]);
26     }
27   };
28
29   const renderItem = ({ item }: { item: { id: string; type: string } }) => {
30     const isSelected = selectedWorkouts.includes(item.type);
31     return (
32       <View style={StyleComponent.item, isSelected && StyleComponent.selectedItem}>
33         <Text style={StyleComponent.textworkout}>{item.type}</Text>
34         <TouchableOpacity
35           onPress={() => toggleWorkout(item.type)}
36           style={StyleComponent.btn}
37         >
38           <Text style={StyleComponent.selectedText}>
39             {isSelected ? "DESELECT" : "SELECT"}
40           </Text>
41         </TouchableOpacity>
42       </View>
43     );
44   };
45
46   return (
47     <View style={StyleComponent.container}>
48       <Text style={StyleComponent.title}>Flatlist - Workouts</Text>
49       <ImageBackground
50         source={require("../assets/bg1.jpg")}
51         style={{ width: "100%" }}
52       >
53         <FlatList
54           style={{ width: "100%" }}
55           data={workouts}
56           renderItem={renderItem}
57           keyExtractor={(item) => item.id}
58         />
59       </ImageBackground>
60     </View>
61   );
62 };
63
64 export default WorkoutsComponent;
```

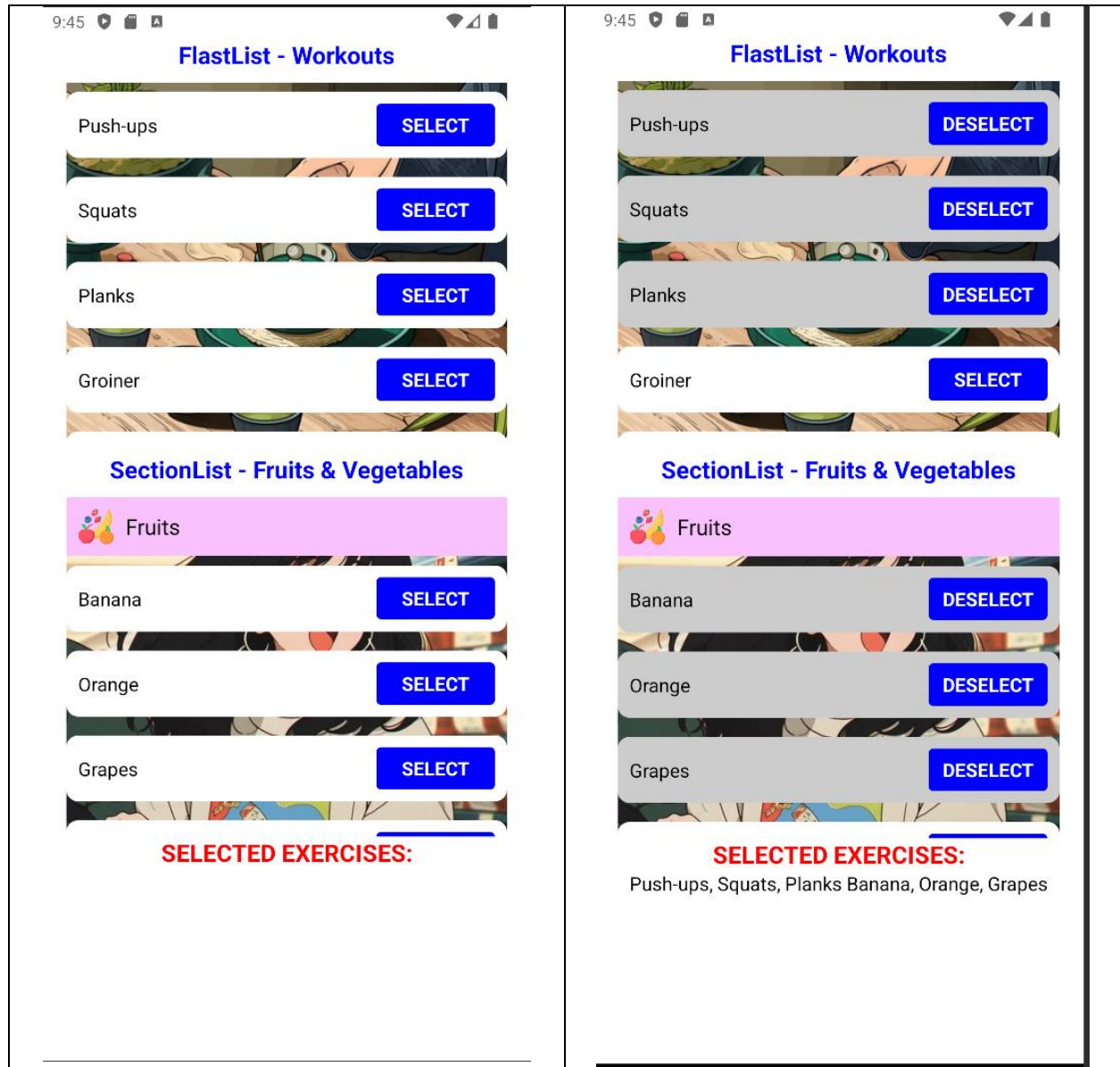
3. Models (Fruit.ts, Workout.ts)



4. StyleComponent.tsx



- *Màn hình kết quả:*



- *Link video màn hình kết quả:*

<https://drive.google.com/drive/folders/1bVoVq56EB9kzqz4OcQDbYHqgqJBgzTlH?usp=sharing>