```
1 import React from 'react';
  import './App.css';
4 type FeeClassification = {
5
    name: string;
6
    description: string;
7
    unitPrice: number;
8
    numOfPeople: number;
9
    totalPrice: number;
10 }
11
12 type DetailProps = {
13
    classification: FeeClassification;
14
    onNumOfPeopleChange: (num: number) => void;
15 }
16
17
  const Detail: React.FC<DetailProps> = props => {
    const\ on Num Of People Change = (e: React. Change Event < HTML Select Element>) \implies \{
18
19
       const num: number = Number(e.target.value);
20
       props. onNumOfPeopleChange (num);
21
22
23
    return (
       <div >
24
25
         <div className="classification-name">{props.classification.name}</div>
26
         <div className="description">{props. classification. description}</div>
27
         <div className="unit-price">{props. classification. unitPrice} 円</div>
28
         <div className="num-people">
29
           <select value={props.classification.num0fPeople} onChange={e => onNum0fPeopleChange(e)}>
30
             <option value="0">0</option>
31
             <option value="1">1</option>
32
             <option value="2">2</option>
33
             <option value="3">3</option>
34
             <option value="4">4</option>
35
           </select>
36
           <span>名</span>
37
         </div>
38
       </div>
39
    );
40 }
41
42 type SummaryProps = {
43
    numOfPeople: number;
44
    totalAmount: number;
45 }
46
47
  const Summary: React.FC<SummaryProps> = props => {
48
    return (
49
50
         <div className="party">
           <input type="text" className="party" value={props.numOfPeople} />
51
52
           <span>名様</span>
53
         </div>
54
         <div className="total-amount">
55
           <span>合計</span>
56
           <input type="text" className="total-amount" value={props.totalAmount} />
57
           <span>円</span>
58
         </div>
59
       </div>
    );
60
61 }
62
63 type AdmissionFeeCalculatorState = {
   feeClassifications: FeeClassification[];
```

```
App. tsx
 65 }
 66
 67
   |class AdmissionFeeCalculator extends React.Component<{}}, AdmissionFeeCalculatorState> {
 68
 69
      constructor(props: {}) {
 70
        super (props);
 71
        const adults: FeeClassification = {
          name: "大人",
 72
          description: ""
 73
 74
          unitPrice: 1000,
 75
          numOfPeople: 0,
 76
          totalPrice: 0,
 77
        }:
 78
        const students: FeeClassification = {
          name: "学生",
description: "中学生・高校生",
 79
 80
 81
          unitPrice: 700,
 82
          numOfPeople: 0,
 83
          totalPrice: 0,
 84
        };
 85
        const children: FeeClassification = {
          name: "子ども",
 86
          description: "小校生",
 87
          unitPrice: 300,
 88
          numOfPeople: 0,
 89
          totalPrice: 0,
 90
 91
        };
 92
        const infants: FeeClassification = {
 93
          name: "幼児",
          description: "未就学".
 94
 95
          unitPrice: 0,
 96
          numOfPeople: 0,
 97
          totalPrice: 0,
 98
        };
99
        this.state = { feeClassifications: [adults, students, children, infants] };
100
101
102
      handleNumOfPeopleChange(idx: number, num: number) {
103
        const currentFC = this.state.feeClassifications[idx];
104
        const newTotalPrice = currentFC.unitPrice * num;
105
        // 人数と合計額以外は既存の値をコピー
106
        const newFC: FeeClassification =
          Object.assign({}, currentFC, { numOfPeople: num, totalPrice: newTotalPrice });
107
        // 新たな配列を生成
108
109
        const feeClassifications = this.state.feeClassifications.slice();
        feeClassifications[idx] = newFC;
110
111
112
        // stateの更新
113
        this.setState({ feeClassifications: feeClassifications });
114
115
116
      render() {
        const details = this. state. feeClassifications. map((fc, idx) \Rightarrow {
117
118
          return (
            <Detail key={idx.toString()} classification={fc}</pre>
119
120
              onNumOfPeopleChange=\{n \Rightarrow this.handleNumOfPeopleChange(idx, n)\} />
121
          );
        });
122
        const numOfPeople = this.state.feeClassifications.map(fc \Rightarrow fc.numOfPeople).reduce((p, c) \Rightarrow p + c);
123
        const totalAmount = this.state.feeClassifications.map(fc \Rightarrow fc.totalPrice).reduce((p, c) \Rightarrow p + c);
124
125
126
        return (
127
```

{details}

128

```
\mbox{\rm App.}\ \mbox{\rm tsx}
129
              \langle Summary numOfPeople=\{numOfPeople\} totalAmount=\{totalAmount\} / \rangle
130
         );
131
     }
132
133 }
134
135 const App: React.FC = () \Rightarrow {
136 return (
        <div className="main">
137
138
            \langle AdmissionFeeCalculator / \rangle
139
       </div>
140 );
141 }
142
143 export default App;
```