Assignment AN-A7

Point to Note
a) The code should be properly indented.
b) The names of the variables and functions should be appropriate.
c) There should be no unnecessary code.
d) The application should look and behave as shown.
e) Test the code properly. Think about all the test cases and make sure that you have tested it.
f) With the code also submit a test report. This testing report should have all the errors in the application. It should cover all the functionality and appearance. If any feature has not been implemented, it should be stated in the testing report.
g) 20% of the marks are for the test report.
h) Any submission without the test report will not be accepted.

SECTION A
This section carries 40 marks.

Make the React app as shown in the demo at **https://youtu.be/CgFE8LOlshc**

Note that the years in the dropdown are from 1900 to 2025.

Ensure that the app has the proper UI as shown in the video. Also test it thoroughly. Create a detailed testing report. This testing report should have all the errors in the application. It should cover all the functionality and appearance. If any feature has not been implemented should be stated in the testing report.

The initial data used in the app is given in Appendix 1.

SECTION B
This section carries 10 marks.

Define a Javascript function that takes two parameters, a string and an array of JSON. Each JSON in the array has a field price. Given the string and the array as parameters, the function has to return an array of all the elements in the array that satisfy the condition in the string.
The string has three types of types –
- Greater than a value – e.g. ">100", ">158", ">9", ">1200"
- Less than a value – e.g. "<95", "<160", "<1000"
- Between two values (both the starting and ending values are included) – e.g. "30-85" , "0-240", "156-4100"

Use the array in the Appendix 2 and test it extensively.

Appendix 1

Brands

["Nestle", "Haldiram", "Pepsi", "Coca Cola", "Britannia", "Cadburys", "P&G", "Colgate", "Parachute", "Gillete", "Dove", "Levis", "Van Heusen", "Manyavaar", "Zara"]

Products

```
[
    {
      code: "PEP1253", price: 20, brand: "Pepsi", category: "Food",
      specialOffer: false, limitedStock: false, quantity: 25
    },
    {
      code: "MAGG021", price: 25, brand: "Nestle", category: "Food",
      specialOffer: true, limitedStock: true, quantity: 10
    },
    {
      code: "LEV501", price: 1000, brand: "Levis", category: "Apparel",
      specialOffer: true, limitedStock: true, quantity: 3
    },
    {
      code: "CLG281", price: 60, brand: "Colgate", category: "Personal Care",
      specialOffer: true, limitedStock: true, quantity: 5
    },
    {
      code: "MAGG451", price: 25, brand: "Nestle", category: "Food",
      specialOffer: true, limitedStock: true, quantity: 0
    },
    {
      code: "PAR250", price: 40, brand: "Parachute", category: "Personal Care",
      specialOffer: true, limitedStock: true, quantity: 5
    }
]
```

Appendix 2

```
[
    {code: "A101', price : 150},
    {code: "A452', price : 450},
    {code: "B671', price : 52},
    {code: "H887', price : 17},
    {code: "V693, price : 188},
    {code: "A645', price : 306},
    {code: "J034', price : 109},
    {code: "N299', price : 75},
    {code: "M472', price : 250},
    {code: "R077", price : 300},
    {code: "B297', price : 150},
    {code: "A489', price : 160},
    {code: "A507', price : 25},
    {code: "K563', price : 45},
    {code: "M833', price : 80},
    {code: "T672", price : 100},
    {code: "B934', price : 200}
]
```