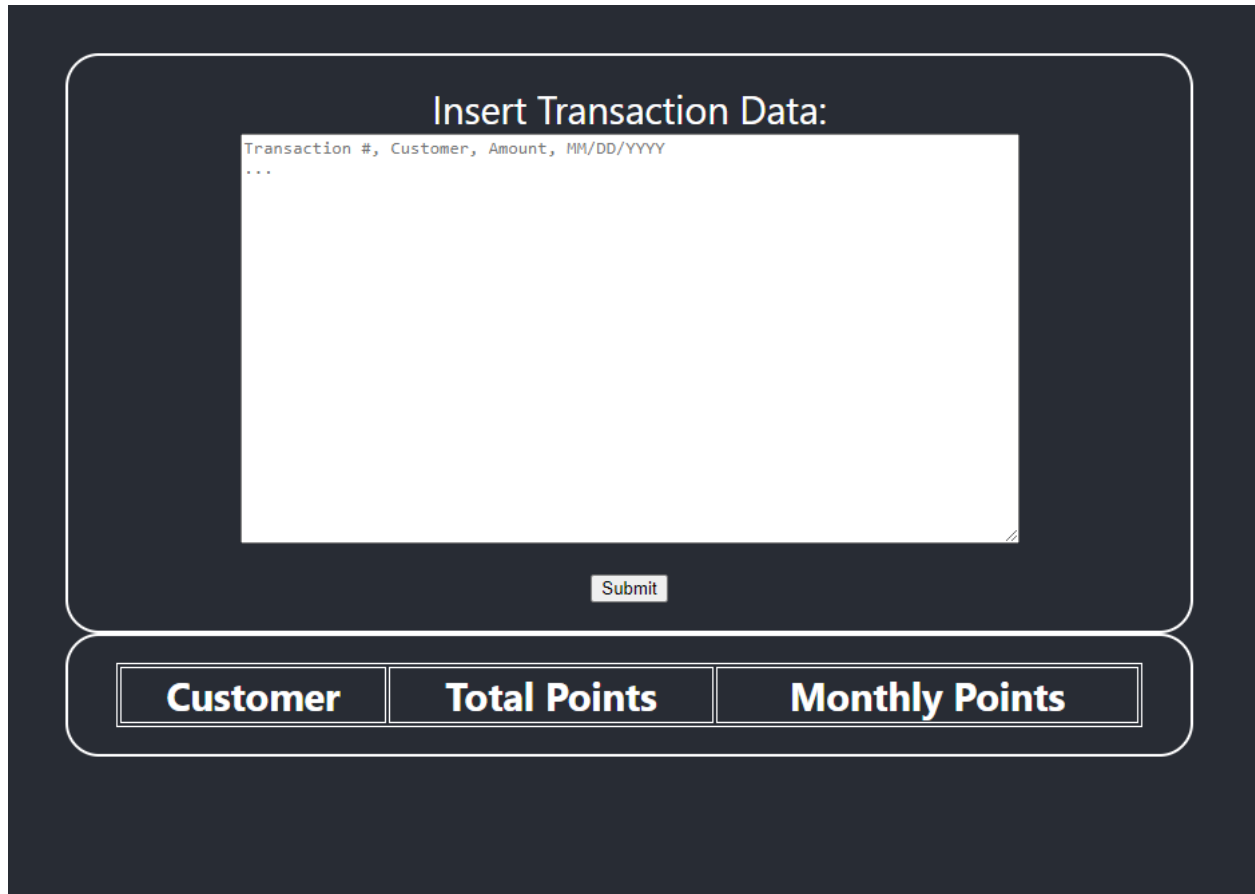


Rewards Calculator

RUNNING THE APPLICATION:



The screenshot shows a web application interface for a 'Rewards Calculator'. It features a dark blue background with a central white rounded rectangle containing a form. The form is titled 'Insert Transaction Data:' and includes a text input area with a placeholder 'Transaction #, Customer, Amount, MM/DD/YYYY' and a 'Submit' button. Below the form, there are three buttons labeled 'Customer', 'Total Points', and 'Monthly Points'.

You may find the app hosted at <https://rewardscalc.netlify.app/>

Otherwise, to run the webapp from a developer / source code perspective, first make sure you have Node.js and node package manager(npm) installed.

In your CLI, navigate to the app's directory and run:

npm start

-OR-

npm run start

This will start a local node server and open the app in your web browser.

If it does not open immediately, you can visit 'localhost:3000' in your browser to access it.

OPERATION:

Once you have the application open, you can input transaction data in the format specified inside of the text box (TransactionID, Customer, TransactionAmount, Date)

Insert Transaction Data:

```
288, Chris Wrede, 634, 8/1/2021
289, Angla Kroger, 69.08, 8/1/2021
290, Hanh Hennigan, 816, 8/1/2021
291, Ashlee Holmes, 54.15, 8/2/2021
292, Nora Nosal, 52.31, 8/2/2021
293, Catharine Dyer, 36.88, 8/3/2021
294, Angelyn Cavalier, 71.41, 8/3/2021
295, Ashlyn Wagers, 15.36, 8/4/2021
296, Norene Pemberton, 372, 8/4/2021
297, Ashlyn Wagers, 85.39, 8/4/2021
298, Belia Baillie, 37.2, 8/4/2021
299, Etha Beall, 1424, 8/5/2021
300, Truman Lady, 60.07, 8/5/2021
301, Alisa Fergerson, 29.53, 8/5/2021
302, Afton Ridgley, 70.29, 8/5/2021
303, Afton Ridgley, 58.21, 8/6/2021
304, Arnold Oatman, 81.9, 8/6/2021
305, Mariam Weeks, 58.51, 8/6/2021
306, Tyrone Putnam, 65.73, 8/7/2021
307, Marlana Fonte, 85.3, 8/7/2021
```

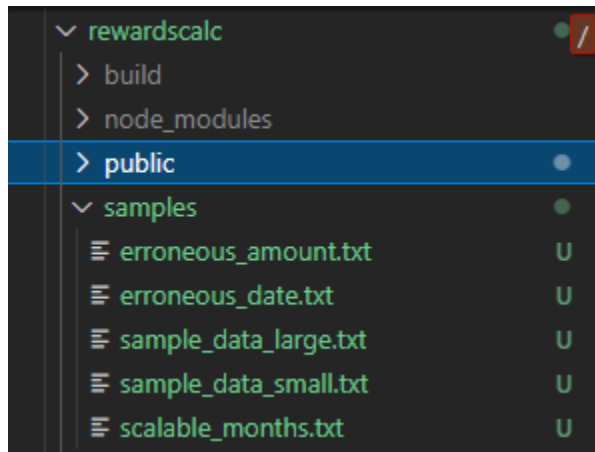
Submit

Customer	Total Points	Monthly Points
Chris Wrede	1167 pts	August 2021: 1118 pts September 2021: 27 pts November 2021: 22 pts
Angla Kroger	7184 pts	August 2021: 2794 pts September 2021: 86 pts October 2021: 4286 pts November 2021: 18 pts
Hanh Hennigan	2519 pts	August 2021: 1520 pts September 2021: 79 pts October 2021: 920 pts

Then, upon clicking the submit button, the calculated rewards points totals each customer has earned over the given transaction data will be listed out below the input area, according to the formula:

2 points for every dollar spent over \$100 in each transaction, plus 1 point for every dollar spent over \$50 in each transaction

SAMPLE DATA:



Some sample data is provided in the /samples directory, which may be pasted directly into the app's text box:

- sample_data_small.txt:** A small dataset to quickly test with
- sample_data_large.txt:** A larger (500 entries) dataset to better represent more realistic inputs
- erroneous_amount.txt:** A collection of entries which contain mistakes in the amount value that the web app will alert the user for.
- erroneous_date.txt:** A collection of entries which contain mistakes in the date value that the web app will alert the user for.
- scalable_months.txt:** A set containing a few entries that show that a customer may have many months of reward point values displayed.

localhost:3000 says
Transaction amount out of range (Maximum 1000000):
"123123, 314159265357950288419, -1, 10/5/2020"
OK

Insert Transaction Data:

123122, 314159265357950288419, 28.99, 10/3/2020
123123, 314159265357950288419, -1, 10/5/2020
123124, John Doe, 100000000, 10/27/2020
123125, 314159265357950288419, 26asdf.99, 11/2/2020

Submit

Customer

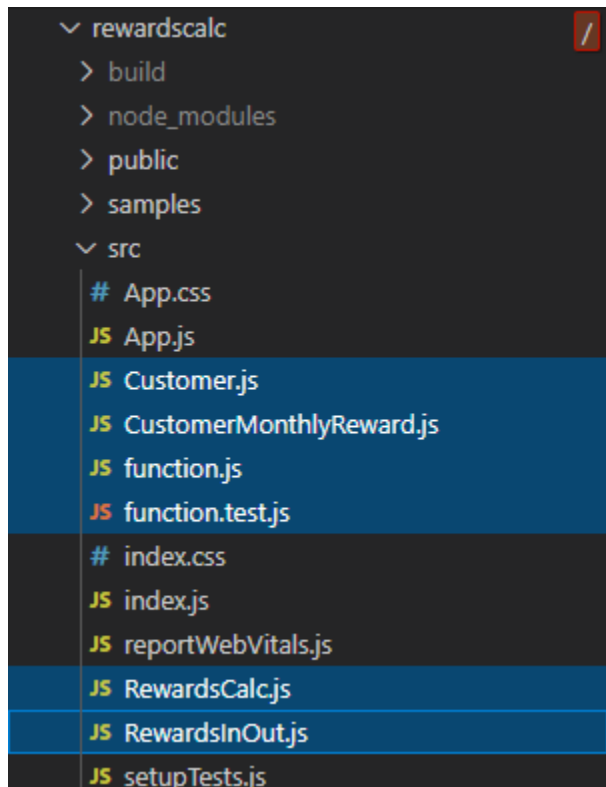
Total Points

Monthly Points

Example of an alert.

SOURCE FILES:

The main javascript source code files of interest are located within the /src folder:



-RewardsInOut.js, RewardsCalc.js, Customer.js, and CustomerMonthlyReward.js as a hierarchy of React components

-function.js: Contains most of the methods doing the heavy lifting for calculation.

Unit tests included in "function.test.js" may be accessed by running the test script:

npm test

-OR-

npm run test