

Arine Front End Take Home Assignment

Arine Software Engineer - React

Problem

Look up and display stock quote results.

Solution

Build a single page application which allows input of a stock ticker and displays the following for the date range 1/1/2020 until 12/31/2020.

- A. Average stock price in the given range (in this example it is from 1/1/2020 until 12/31/2020).
- B. Maximum/Minimum volume in the given range
- C. Maximum/Minimum stock price in the given range

WireFrame

Enter a Stock Ticker Search

Item	Maximum	Minimum	Average
Price	\$500	\$100	\$300
Volume	1000	500	700

Constraints and Requirements

1. The React App should be composed of two components with a parent child relationship. The parent component should pass the ticker to be searched to a child component which displays the results.
2. CSS or SCSS for styling is preferred.
3. The use of React Hooks is required.
4. The use of Redux to store the result of the API is required.
5. Generate report function:
6. Given this API:
https://api.polygon.io/v2/aggs/ticker/AAPL/range/1/day/2020-01-01/2020-12-31?apiKey=taIMgMrmnZ8SUZmdp9_7ANRDxw3IPIx
7. No need to parameterize the dates range or the stock ticker in the api call

API RESPONSE OBJECT

```
{  
  "ticker": "AAPL",  
}
```

```
"status": "OK",
"queryCount": 1,
"resultsCount": 1,
"adjusted": true,
"results": [
  {
    "T": "AAPL",
    "v": 131704427,
    "vw": 116.3058,
    "o": 115.55,
    "c": 115.97,
    "h": 117.59,
    "l": 114.13,
    "t": 1605042000000
  }
],
"request_id": "6a7e466379af0a71039d60cc78e72282"
}
```

Where:

- Results array
- O number: The open price for the symbol in the given time period.
- H number - The highest price for the symbol in the given time period.
- L number - The lowest price for the symbol in the given time period.
- C number - The close price for the symbol in the given time period.
- V number - The trading volume of the symbol in the given time period.
- VW number - The volume weighted average price.
- T integer - The Unix Msec timestamp for the start of the aggregate window.
- N number - The number of items in the aggregate window.

Expected Deliverables

1. A working demo (which can run on your local machine).
2. A Zoom mtg to walk through your code.

This assignment should take 2 hours to complete..

If you have any questions, please contact me at jrose@arine.io