CS3219 Task B

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Simple Web app functioning like 'yellow pages' hosted on AWS Elastic Beanstalk

Instructions for testing on localhost

1. Clone this repository and navigate to backend root `./backend`
2. Run `npm install`
3. Run `npm start`
4. Using Postman, send 'GET', 'POST', 'PUT', 'DELETE' requests to http://localhost:8080/
    1. Import Postman Collection.json to postman
    2. Change variable `URL` to local endpoint
    3. Run collection
    4. *** - Setup: Ignore, used to set up for some tests
    5. *** - Valid: Should return HTTP codes 200+
    6. *** - Invalid: Should return HTTP codes 400+
5. To run tests, run `npm test`

Instructions for testing on deployed endpoint

1. Using Postman, send 'GET', 'POST', 'PUT', 'DELETE' requests to http://mytestapp25846-env.eba-2byxqhms.ap-southeast-1.elasticbeanstalk.com/
    1. Import Postman Collection.json to postman
    2. Change variable `URL` to deployed endpoint
    3. Run collection
    4. *** - Setup: Ignore, used to set up for some tests
    5. *** - Valid: Should return HTTP codes 200+
    6. *** - Invalid: Should return HTTP codes 400+
2. To view CI test results, go to: link
3. Click on specified workflow -> Continuous Testing -> Run workflow

Instruction to set up frontend

1. Clone this repository and navigate to frontend root `./frontend`
2. Run `npm install --force`
3. Run `npm start`

Serverless Function

1. This serverless function pulls all exchange rates around the world for the past 3 months and returns the currencies whose current rates are better than 1.05x the average of the past 3 months.
2. Function URL: here
3. Data is displayed at the top of the frontend for easy viewing

Task B1 - Backend

- ☑ Successful GET, POST, PUT, DELETE API calls on localhost
- ☑ Successful GET, POST, PUT, DELETE API calls to deployed endpoints (AWS)
- ☑ Handle common edge cases and error-resiliency

Task B2.1 - Continuous Testing

- ☑ Successful testing for API using Mocha/Chai
- ☑ Use Github Actions to automate testing

Task B2.2 - Continuous Deployment

- ☑ Use Github Actions to automatically deploy to AWS Elastic Beanstalk

Task B3 - Frontend

- ☑ Interact with the API using the frontend
- ☑ Implementation of style e.g., using Bootstrap

Task B4 - Pull data from serverless function

- ☑ Deploying a serverless function to AWS Lambda
- ☑ Ability to interact with the serverless API using the frontend