

Voucher Claim

Git repo: <https://github.com/atomz520/voucher-claim>

The database runs with `sequelize` and `sqlite3`. `express` framework was used as the backbone of the application. The dev database is stored in the `voucher-claim.sqlite` file in the root directory.

`faker-js` library was used to generate dummy data simulating a database from a client.

It is tested to be working on Node v16.15.0

To run the API:

```
npm install
```

```
npm start
```

The server runs on port 8088

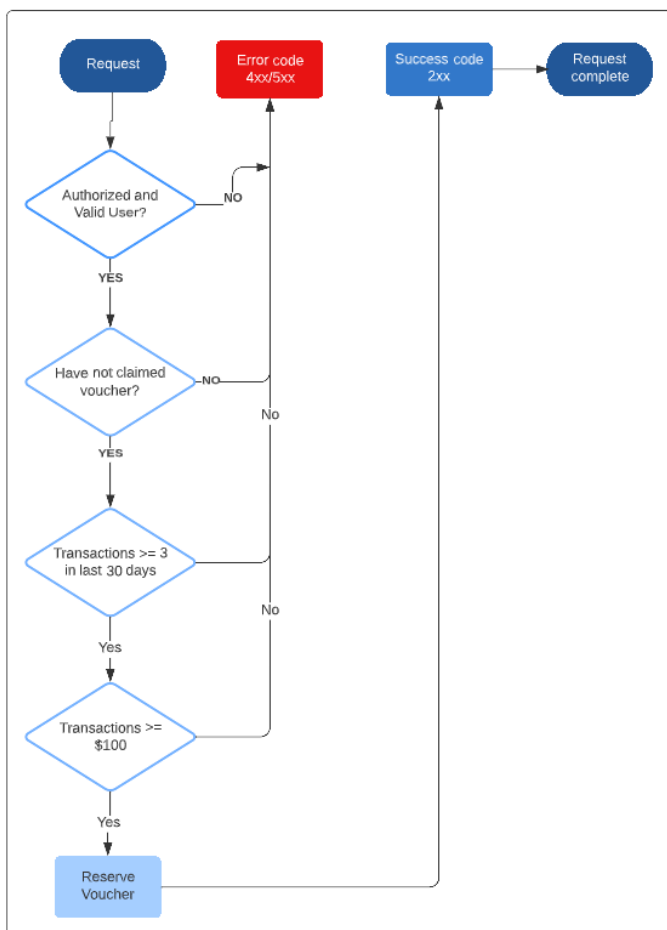
Postman collection file has been added to directory root:

`VouchersClaim.postman_collection.json`

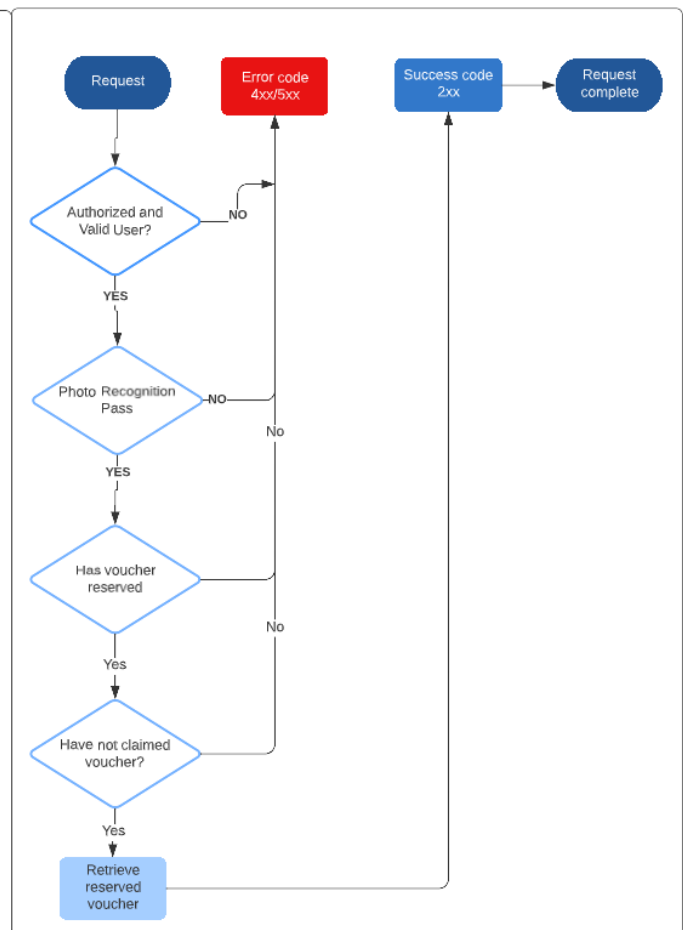
Test data: `customer_id` 6 & 7 are not eligible to collect the voucher.

Logic Diagrams:

eligibility-check



retrieve-voucher



Customer eligible check

- Checks for the customer's eligibility to redeem a voucher.
- If a customer is eligible, a voucher is reserved for the customer.

Parameters:

customer_id int Required

Example Request:

```
POST http://localhost:8088/eligibility-check HTTP/1.1
{
  "customer_id": 1
}
```

Example Response:

```
HTTP/1.1 200 OK
{
  "eligible": true
}
```

Example Error:

```
HTTP/1.1 400 Bad Request
{
  "error": {
    "title": "There was an error with the request",
    "detail": "Already claimed voucher"
  }
}
```

- Invalid customer_id
- Already claimed
- Already have a reserved voucher

Validate Photo and Get Voucher Code

- Uses an Image Recognition service to determine if submission is valid.
- If submission is valid and a voucher code has been reserved, the voucher code is returned to the customer.

Parameters:

```
customer_id int Required
photo_file base64 Required
```

Example Request:

```
POST http://localhost:8088/retrieve-voucher HTTP/1.1
{
  "customer_id": 1,
  "photo_file": "xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx"
}
```

Example Response:

```
HTTP/1.1 200 OK
{
  "voucher_code": "ulpqaqz6wkwi7h9xglq"
}
```

Example Error:

```
HTTP/1.1 400 Bad Request
{
  "error": {
    "title": "There was an error with the request",
    "detail": "Failed photo verification"
  }
}
```

- Invalid customer_id
- Failed photo verification
- No voucher allocated
- Already claimed voucher