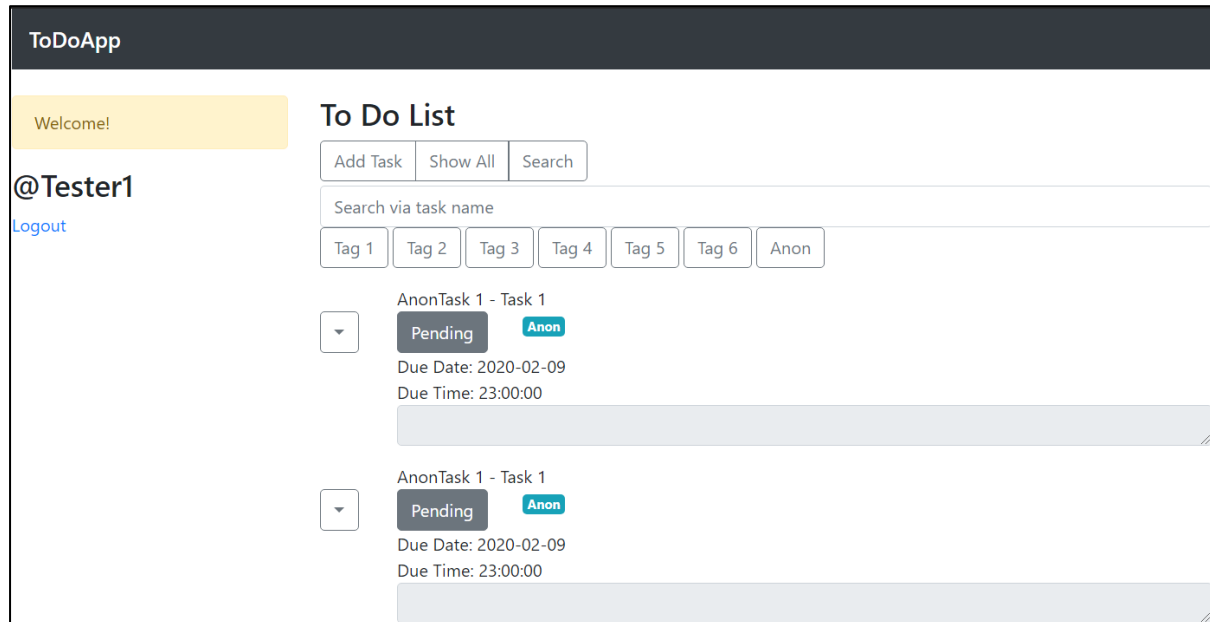


## Write-up on Accomplishments



This is a to-do app written using Ruby on Rails as the backend and React as the frontend (as required). In addition, the site is hosted on Heroku, and the frontend is mostly written in Typescript, using Redux to manage some states across the React components (as recommended). Several JavaScript libraries were used to simplify the process – namely Bootstrap and React-Bootstrap as the styling library, as well as Formik and Yup for the various forms.

The application supports the basic CRUD operations on tasks. It allows users to use the site without having to login, but also permits them to save their tasks under their own username (the function to configure user details was not implemented).

Tasks can be flagged as completed using the  button

The tagging system allows users to add tags when a task is being created or updated. Searching through the tasks can be done by searching the task's name, or by using the consolidated tag buttons.

Since it is my first time working with Ruby on Rails and the whole suite of JavaScript tools, there are some major areas I would like to improve on. Firstly, the data flow from the backend to the frontend should be more consistent. Ideally, it should be compliant with the JSON API specifications. Secondly, I think better planning could be done with Typescript and with maintaining the types involved.

# User Manual

## Adding a Task

The 'To Do List' form for adding a new task includes the following elements:

- Buttons: Add Task, Show All, Search
- Task Name: A text input field with the placeholder 'Enter task name'.
- Due Date: A date input field showing '09/02/2020'.
- Due Time: A time input field showing '11:00 PM'.
- Clear Date and Time: A button to clear the date and time fields.
- Task Description: A large text area with the placeholder 'Add some details'.
- Tags: A text input field for adding tags, with a 'New Tag' button.
- Buttons: New Task, Reset

1. Click on Add Task
2. Fill in task details and tags desired
  - Task name is a required field
3. To save, press New Task

## Editing and Deleting a Task

The 'To Do List' form shows a task in the 'Pending' state. The task details are:

- Task Name: Tester 1 - 3rd Task!
- Status: Pending
- Due Date: 20-02-20
- Due Time: 11:59:00
- Task Description: Edit1: Some details. Edit2: Some more details. Edit3: Some more details.
- Tags: Tag 1, Tag 2, Tag 3, Tag 4, Tag 5, Tag 6

Buttons: Edit, Delete, New Tag, Update Task, Reset, Back

1. Click on Show All
2. Click on
3. Press Edit or Delete

## Editing and Deleting a Task

The 'To Do List' form shows a task in the 'Update' state. The task details are:

- Task Name: Tester 1 - 3rd Task!
- Due Date: 20/02/2020
- Due Time: 11:59 PM
- Clear Date and Time: A button to clear the date and time fields.
- Task Description: New: Some details. Edit1: Some details. Edit2: Some more details. Edit3: Some more details.
- Tags: Tag 1, Tag 2, Tag 3, Tag 4, Tag 5, Tag 6
- Buttons: Update Task, Reset, Back

The form is the same as the one for adding a new task.

Press Update Task to save the changes.

## Searching for a Task

The 'To Do List' form shows the search functionality. The search bar is labeled 'Search via task name' and contains the text 'Tag 1 Tag 2 Tag 3 Tag 4 Tag 5 Tag 6 Anon'. Below the search bar, it says 'You don't have any tasks!'.

1. Click on Search
2. Either click on the desired tag to search for or fill in the task name to search by

## Registering and Logging In

The image shows two side-by-side web forms. The left form is titled 'Login' and has a 'Login' link at the top and a 'Register' link at the bottom. It contains fields for 'Username:' and 'Password:', each with a text input box, and a 'Login' button. The right form is titled 'Register' and has a 'Login' link at the top and a 'Register' button at the bottom. It contains fields for 'Username:' (with input 'Enter desired username'), 'Password:' (with input 'Enter desired password'), and a 'Confirm the password' field, followed by a 'Register' button.

1. Press Register
2. Fill in the registration form
  - Username must not have been taken
  - Passwords must match
3. Click Register
4. Then, Press Login
5. Fill in the details
6. Click Login

Note that any tasks created while anonymous will be added to the user on login.