

Overview

EcoBud is a progressive web app that supports college dorm sustainability competitions.

Our goal is to allow college students to develop environmentally friendly habits while providing motivation through competing against friends and real-life rewards.



Fig. 1: a) Front page of our app tutorial b) Sign up page in light and dark mode

Unique Selling Points

- 1 Designed for and supports college groups like dorms
- 2 Campus sustainability organizations provide incentives to students
- 3 Progressive Web App that is cross platform and functions like a native app

Functionality

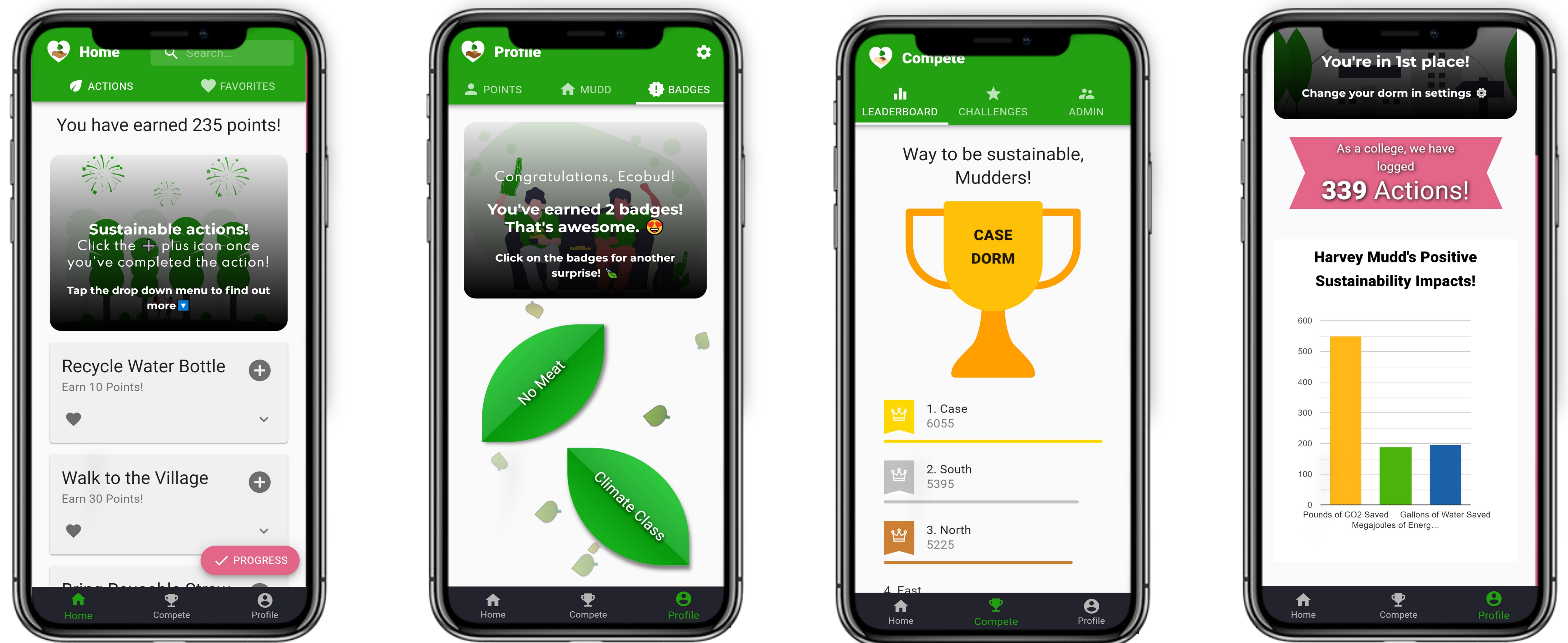


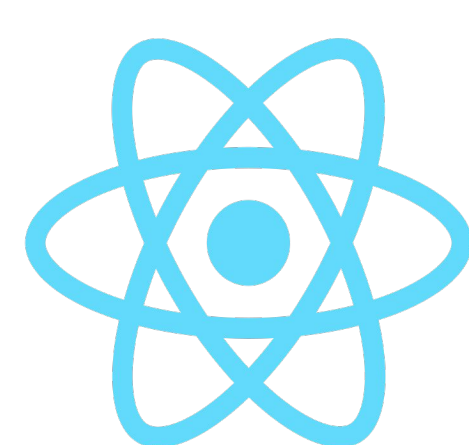
Fig. 2: a) Front page of our app tutorial b) Homepage for logging sustainable actions c) Badges for mastered actions d) Leaderboard of most sustainable dorms

- **Log sustainable actions to earn points** for user and dorm (Fig. 2a).
- **Earn badges** when actions are mastered (Fig. 2b).

- **Leaderboard** displays most sustainable dorms (Fig. 2c).
- **See positive environmental impact** of individual and entire college (Fig. 2d).

Technology (Fig. 3)

- **EcoBud app** hosted at <https://ecobud.app>



ReactJS

Javascript React frontend



Firebase

Login authentication, Cloud Firestore & Realtime Database, Functions



Progressive Web App

Web app that can be saved to home screens of mobile devices

Fig. 3: The different components in our application

Market (Fig. 4)



College Students



College Sustainability Organizations

Fig. 4: EcoBud supports college students and campus sustainability organization

Competition

- No other applications exist that accommodate college sustainability competitions with real life rewards and motivation by dorms.

Acknowledgements

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