SOFTENG 350

Assignment 2

High Fidelity Prototype

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Introduction

This report contains sections justifying the design choices made when creating my high-fidelity prototype of the "Carbon Tiptoe" website.

Page Structure

The homepage for Carbon Tiptoe is sectioned into 6 distinct areas (excluding the modal). Each section has it own dedicated purpose to express specific information about the company and its carbon calculator tool. Through the report we will be exploring these in further detail. In order, these were:

1. Navigation Bar
2. Header / Hero
3. Tracker section
4. About us section
5. Sponsor wall section
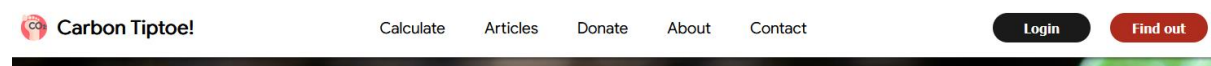6. Footer

Navigation Bar

Figure 1: Navigation bar.

At the top of the page is the navigation bar. This contains important controls to navigate to different parts of the website. It is split into 3 sections: logo, navigation menu and login/signup buttons. These sections are distinctly group via Gestalt's principle of **proximity**. This helps users differentiate the sections of the navigation bar without the use of division lines to maintain a minimalistic style.

The navigation bar layout follows a similar pattern found across multiple websites. This enforces **consistency and standards**, so that new users can easily navigate the website as they will have likely seen this navigation bar layout used before, which reduces cognitive load.

The "find out" button is coloured with my assigned colour #af2b1e. Whereas the login button is coloured a much darker shade. The reason for this decision is so that there is a greater **emphasis** on the "find out" / registration button. This is so that new users who are unfamiliar with the website will easily notice the button which leads them to the registration form.

Additionally, the navigation bar is "sticky", meaning it persists on the screen when you scroll away. This enforces **flexibility and efficiency of use**, if a user reaches the bottom of the page and want to change pages or register, they don't have to scroll all the way to the top. This greatly improves speed and efficiency for the users.
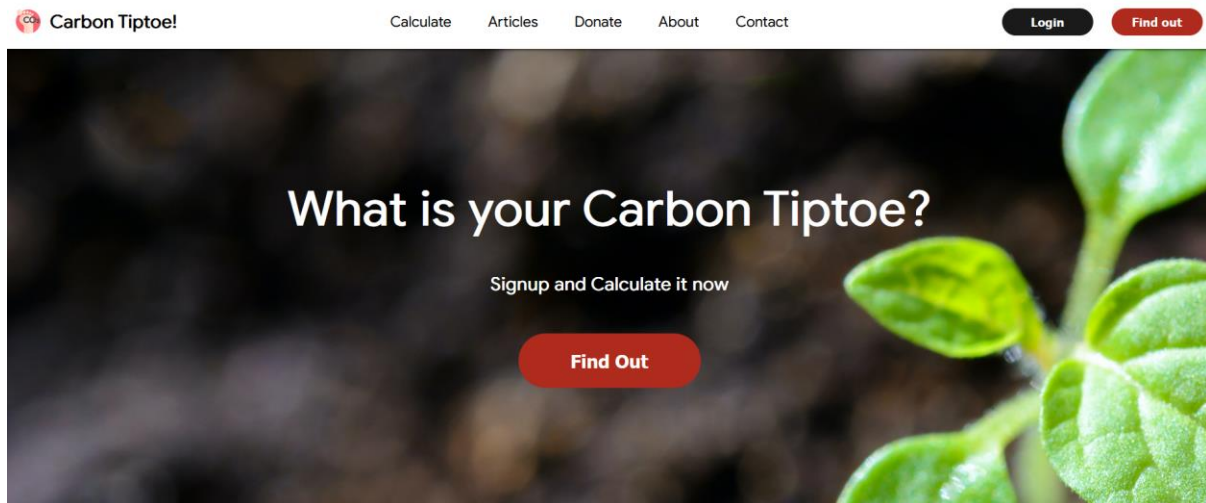
Header

Figure 2: Header and hero image.

The header section consists of the hero background image, title, and registration form button. This section takes up the most area so that it's the first thing a user notices and hooks the user in. The background hero image depicts a sprout erected from the soil. This is an appropriate image to capture the environmentally focused theme of the website. The image is offset so that the title is above the blurred text improving clarity.

The "find out" / registration button can be seen repeated here but enlarged. This again creates **emphasis** as to the purpose of the website, which is to register and take the carbon footprint test. When hovering mouse over the buttons, it switches to a pointer instead. This subtle detail enforces **visibility of system status**, so that users know that it's a button and can click on it.
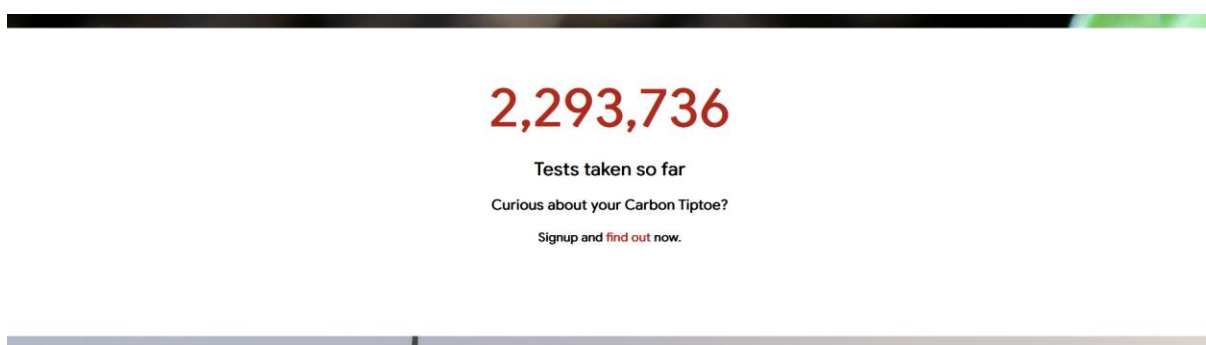
Tracker

Figure 3: Calculator test taken tracker.

The purpose of the tracker section is to display the number of times people have taken the carbon footprint test. This enhances the legitimacy of the website and is reassuring to new users. Similarly with the registration button, the "find out" text is accented with my assigned colour. This communicates to the user again that its clickable.
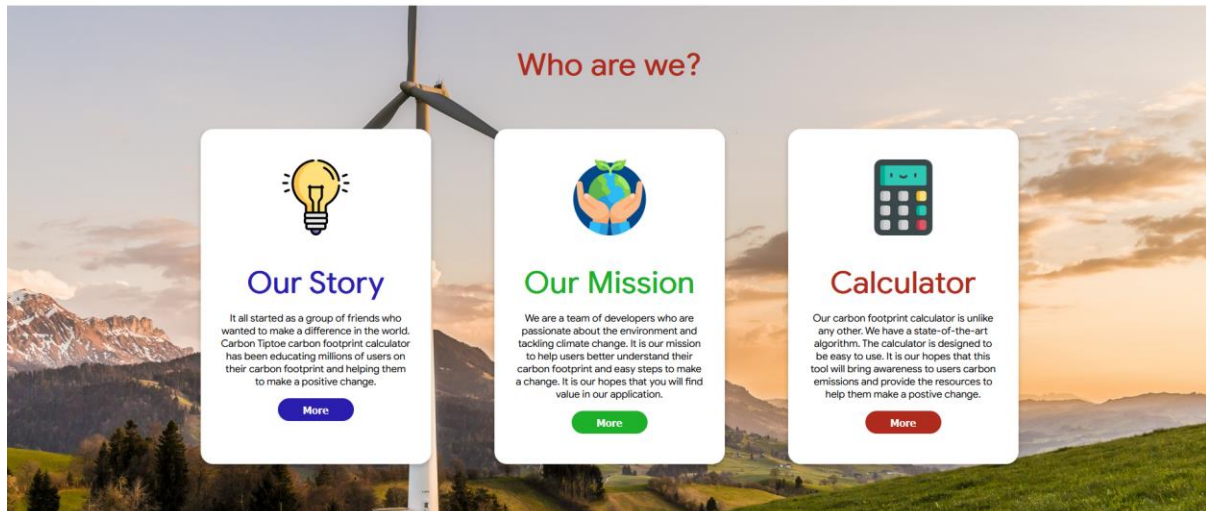
About us

Figure 4: About us story cards.

The about us section consists of cards that communicates specific information about the company Carbon Tiptop. Due to Gestalt's principle of **Common Fate**, the user reads the cards in order from left to right, to convey the journey of Carbon Tiptoes beginnings to the final calculator card. The "more" buttons are there to route the user to other parts of the website if they want to learn more information.

Notice that each card has a unique colour assigned to it. These colours form a triadic colour palette seeded from my assigned colour. These three colours are evenly spaced on the colour wheel. This provides a high contrast to differentiate each of the cards. I chose to use my main assigned colour on the "calculator" card as it reinforces the purpose of the website to calculate one's carbon footprint.

The images are sources from Flaticons. These images help visually communicate the ideas of each card. The images throughout the website also have "alt text" which improves **accessibility** and allows for screen readers to describe the images.
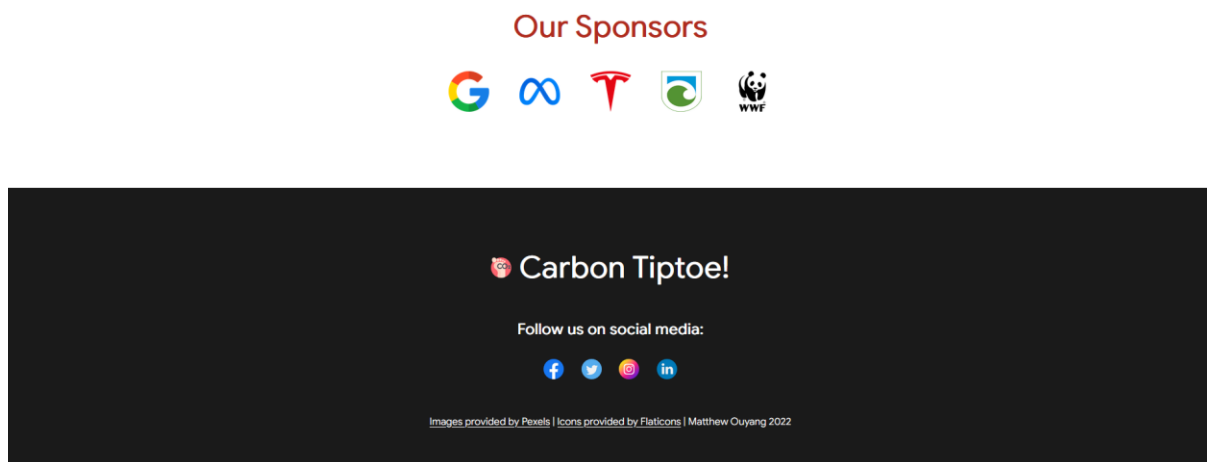
Sponsor wall & Footer

Figure 5: Sponsor wall and footer.

The sponsor section is dedicated to the sponsors of Carbon Tiptoe. This is a way of thanking sponsors but also to improve the legitimacy of the company brand.

The footer provides links to its other social media platforms. If a user cannot find what they are looking for on Carbon Tiptoe website and may be interested instead in Carbon Tiptoe's social media channels. This is followed by attributing the sources of the images I used and myself.
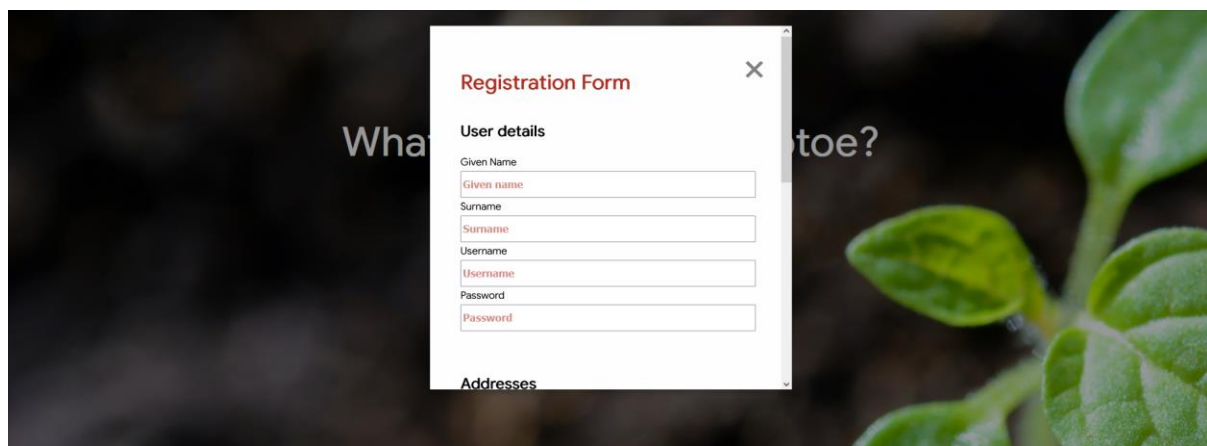
Registration Form Modal

Figure 6: Registration form modal popup.

The registration form is nested within a modal box. The modal pops up when clicking the "find out" button and links scattered throughout the homepage. When it opens it darkens the rest of the background so create emphasis on the modal. The input field labels are above their respective input boxes, to improve form **accessibility** for web readers. Also, when opening the modal, the focus is set to the first input field, this ensures keyboard **accessibility**, using the tab button to cycle through the inputs.

```
function openModal() {
    modal.style.display = "block";
    givenNameInput.focus();
}
```

Figure 7: first input focus accessibility

The exist button "X" is in the top corner to allow users to exit the registration form modal. This is further enhanced by allowing users to exit the modal by clicking outside of it aswell. These two features combined allow for better **User control and freedom**, giving the user the flexibility to use both the "X" button and clicking outside the modal.

The bottom of the form consists of a button and additional login section if users already have and account. The "submit" button colour is the assigned colour the same as the buttons getting you to the registration form. This creates **continuity** throughout the website and upholds the colour palette.
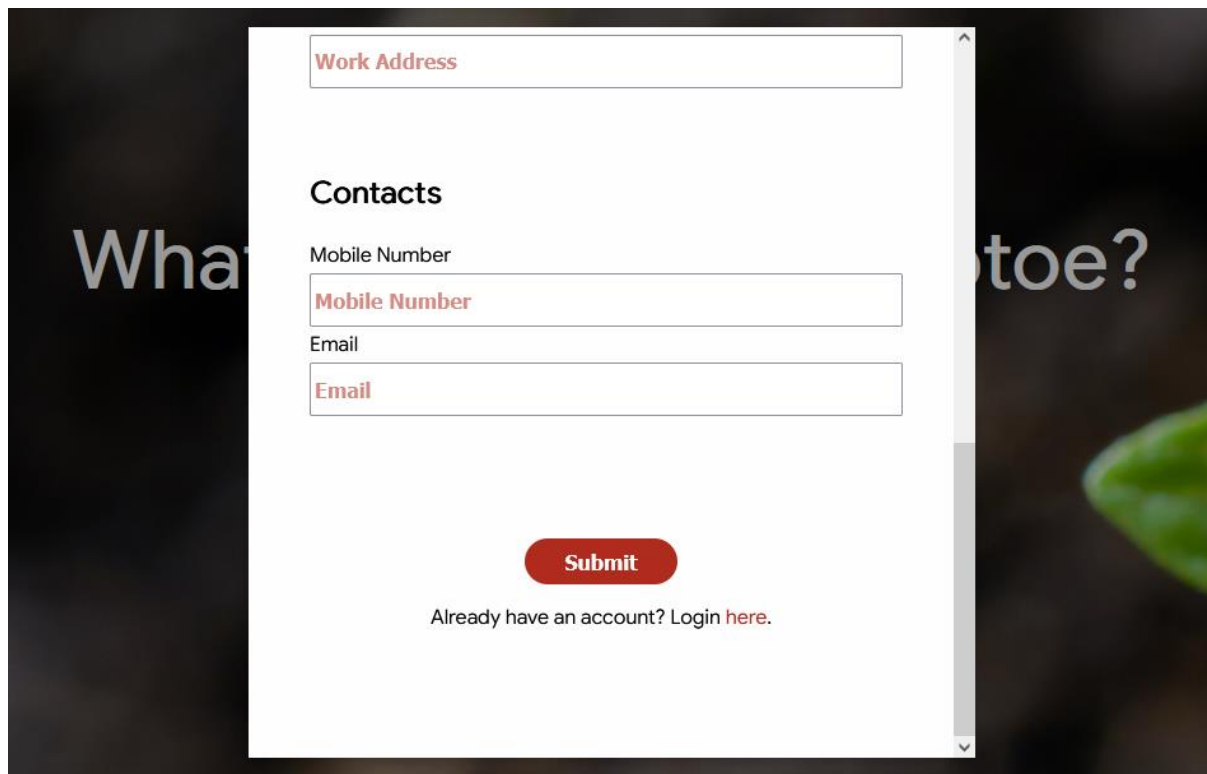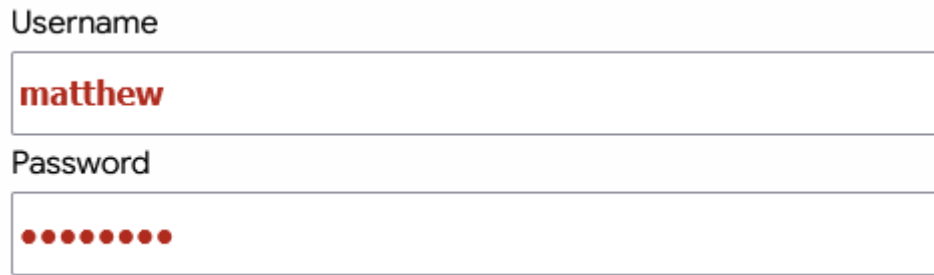

Figure 8: Bottom of registration form modal.

The password input field text is of type password. This is different from the other input fields which are of just type text. The password text type enhances security and prevents others from overseeing users enter their passwords. Overall, this enhances user account **security**.

Figure 9: Password input field comparison.

Conclusion

Throughout this report we have discussed various design choices made throughout the website homepage and registration form modal. The implications of such design choices are ultimately to improve the user experience for all and expand the websites accessibility.