

## **Assignment 2 – Canterbury’s House of Pizza**

### Table of Contents

Introduction .....	1
Choosing the Design for our prototype .....	1
Scenarios .....	2
- Scenario 1:.....	2
- Scenario 2:.....	2
- Scenario 3:.....	2
Representation of the Second(Final) Prototype .....	3
Prototype 1 Report .....	8
Prototype 2 Report .....	14
Prototype 3 Ideas – If we had to make a revised version .....	20
More in-depth veggie labels .....	20
Select Larger buttons .....	20
Colour Scheme .....	20
Animations & Transitions.....	20

### Introduction

Canterbury’s House of Pizza would like a prototype for their upcoming online services. We used figma to create a prototype for the mobile application in order to present it to the client and make sure that they are happy with the result. This is a report outlining some of the key components of the application and the design choices we made along the way.

### Choosing the Design for our prototype

The design of our prototype started with the 5 sketches that was completed by our group members. All of us completed our sketches and compared them with each other, making changes and improving our sketches to finally end up with a fully working design to start working on the prototypes. We discussed among ourselves and took ideas from everyone to make a master design.

In our pizza app, we decided to go with the same colour theme to make it as professional as possible. This way, the customers would focus on what to order and not get distracted by the app.

All of the specialty pizzas have the same font and have the same design to make it easy for the users. Some of the buttons are exclusive. For example, the size of crust is exclusive, meaning when one button is selected all the other buttons get unselected. This will make the ordering process easier and less complex. However, all the buttons do not have this feature, as for the custom pizza, the user can add multiple toppings.

There’s a button on the bottom left that tells the user if they want to add another pizza. This has an arrow and is very clear for the user to understand

In our custom pizza section, there's different headings to show what the user is clicking. For example, there's a heading for the type of crust, and shows classic, thin, stuffed, etc.

Furthermore, for each of our specialty pizzas, there's a picture, and it shows all the ingredients so the customers can see the toppings and how the pizza looks like before ordering it. In addition, there's a button that allows the user to add or remove a pizza, and it is very clear; the plus sign is to add, and the minus sign is to deduct with the number shown in the middle.

There's a basket on the top right of the app showing the number of pizzas ordered or in the cart. And can be clicked at any time to show the customer their progress and a summary of their order. In addition, there's a checkout button on the bottom right of the app with an arrow which should inform the user that it's the checkout option. There is also a button on the top left that allows the user to see their account, and has options to check their loyalty card points, to continue ordering or to log out which will make it useful for the user.

The loyalty card feature is displayed on a card and gets the user the 10<sup>th</sup> pizza ordered for free. There are stamped numbers with crosses indicating the number of pizzas ordered so far.

Finally in our last page, the billing info is very clear and straight forward. It shows the order summary with the prices of each pizza next to it, and has a total cost below it, showing if any amount has been saved, and the new total after savings are deducted. There are two buttons below to total cost stating delivery or collection. Both of these have similar pages when clicked, including details such as the name of the customer, email, and contact number. In the delivery page it asks the delivery location, while the collection page states the order number.

In conclusion, the app we have designed is very highly advanced, and has very simple yet effective ways of having a good user interface, while still being able to do the tasks needed to be done.

## Scenarios

These are the following three scenarios which were used to test our prototype. There can be additional prototypes to test even more aspects of the prototype and to further improve it. Nevertheless, these three scenarios can be used to test the prototype. A detailed report is available in the following sections.

- **Scenario 1:** Budi wants to buy pizzas for the COMP3280 and COMP5820 team meetings. From the specialty pizza menu, he orders one large veggie supreme and two small chicken supreme pizzas. He also orders a custom pizza: gluten-free crust with chicken, mushrooms, and mixed peppers. He uses his loyalty card to claim a 10th free pizza to pay for part of his order.
- **Scenario 2:** A teacher at a primary school has decided to surprise her students with pizza. She lives outside of Canterbury and does not want to sign up to the app. She wants to order 4 pizzas for the end of the school year. She would like one large Original Cheese and Tomato with classic crust, one medium Chicken supreme with thin crust, one small Veggie supreme with gluten free crust and one large half and half pizza(The Meaty & Hawaiian) with classic crust. She would like to have the pizzas delivered to the Woolf reception.
- **Scenario 3:** Debs wants to host a house party for the winter break from university. She saw the advertisement for the Canterbury's House of Pizza offer of 1 free pizza. She would like to sign up through the app and order 5 medium Hawaiian pizzas with classic crust and 4 medium Veggie supreme pizzas with thin crust and 1 medium

Meaty pizza with gluten free crust. She wants to take advantage of the offer with the loyalty card. The pizzas will be delivered to her accommodation address in Darwin.

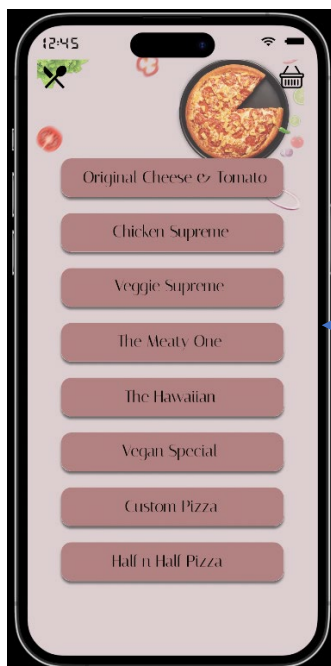
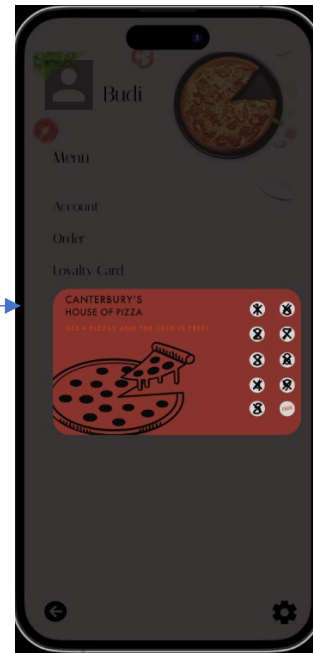
## Representation of the Second(Final) Prototype

The following screenshots show a detailed view of the final prototype (second prototype) with description where appropriate.

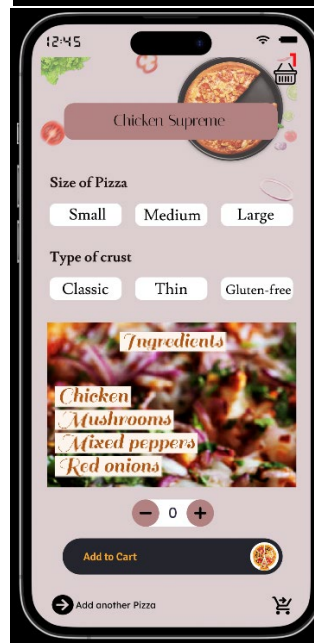
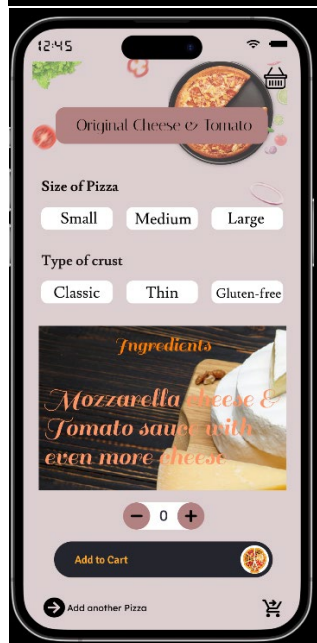
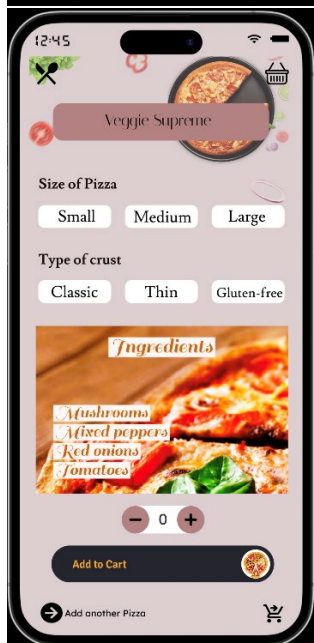
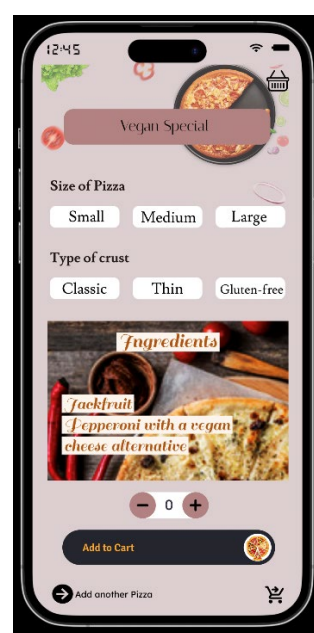
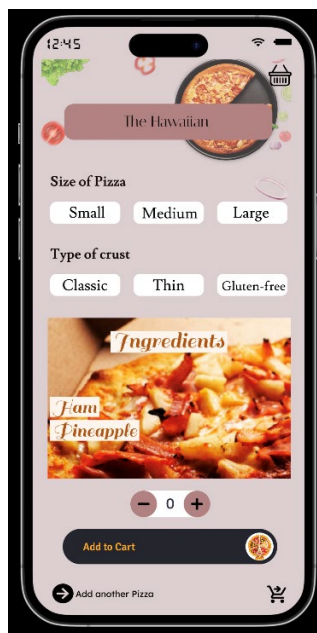
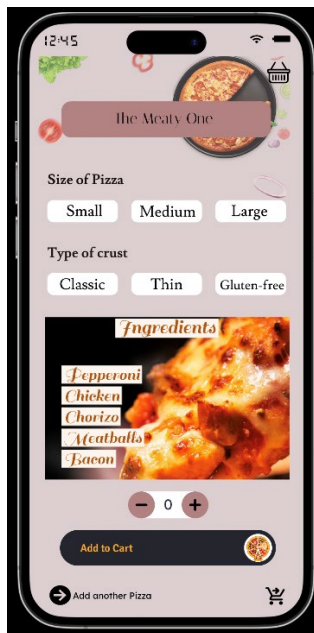




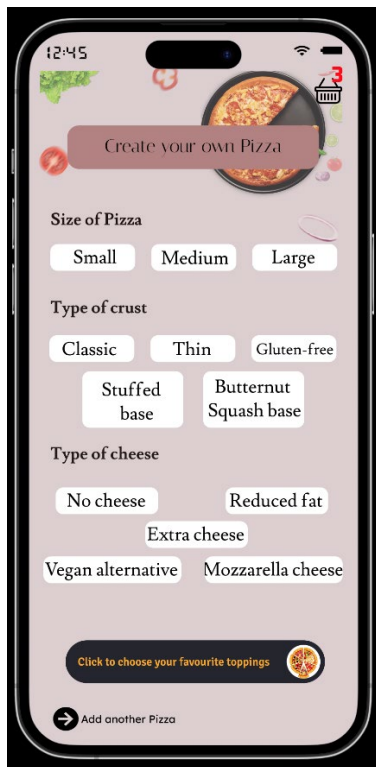
The loyalty card's stamps change after checking out with more pizzas. In this case, four pizzas were added as can be seen



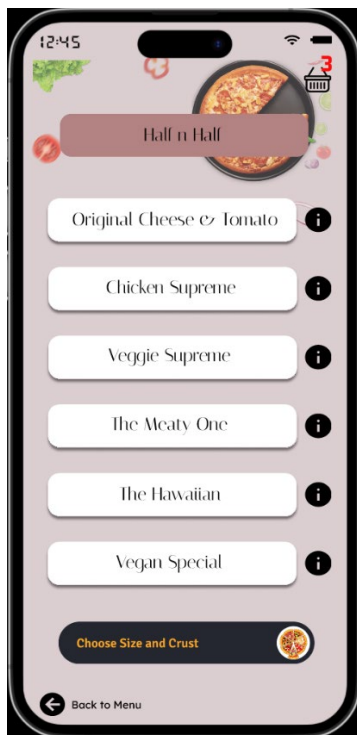
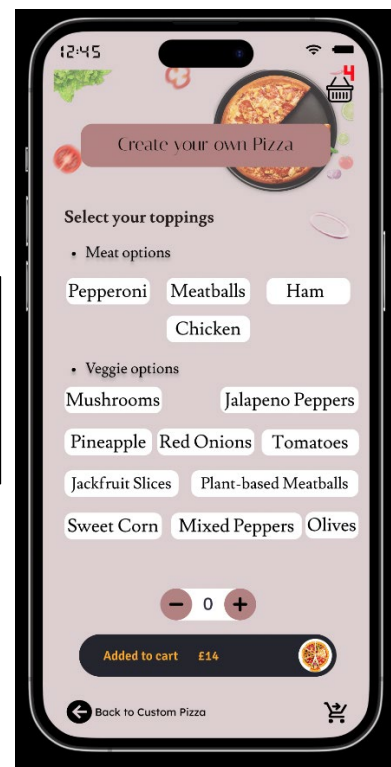
The main homepage the customer lands on after logging in, signing up or continuing as a guest



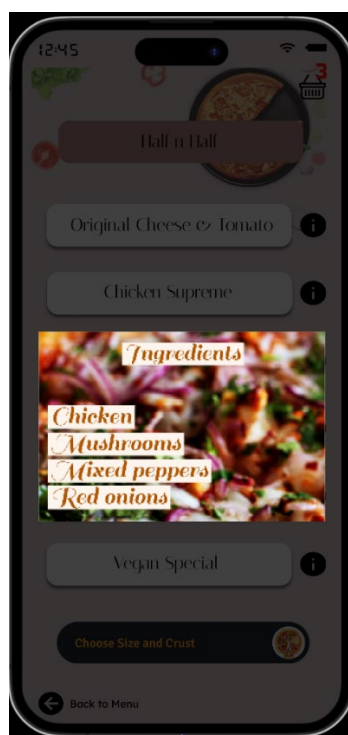
All the speciality pizza pages to choose any pizza the customer wants



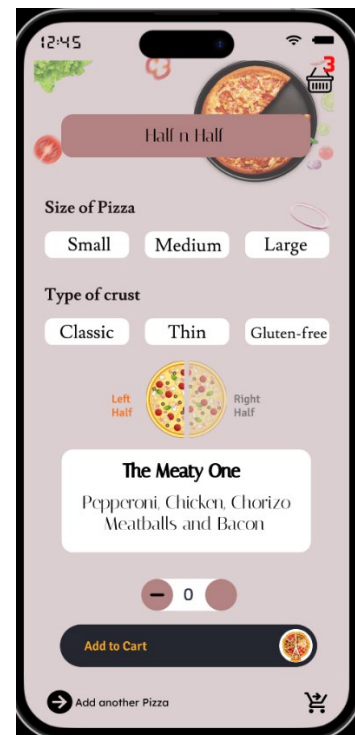
Custom pizza pages. The left page is to choose the size and crust size. The right page is to choose the toppings and to add the pizza to cart



The half and half pizza to choose from any two speciality pizza combination

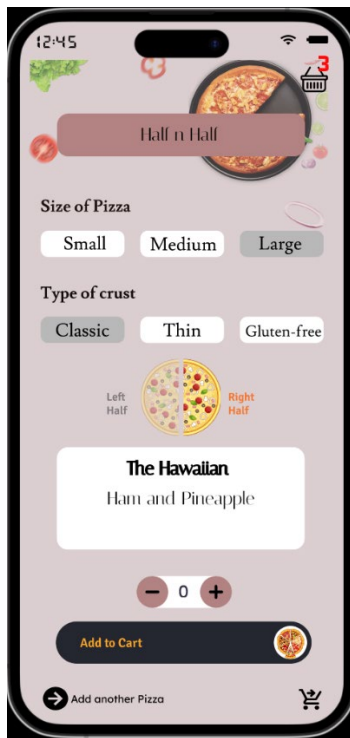


Pressing "i" lets the customer see the details about the ingredients



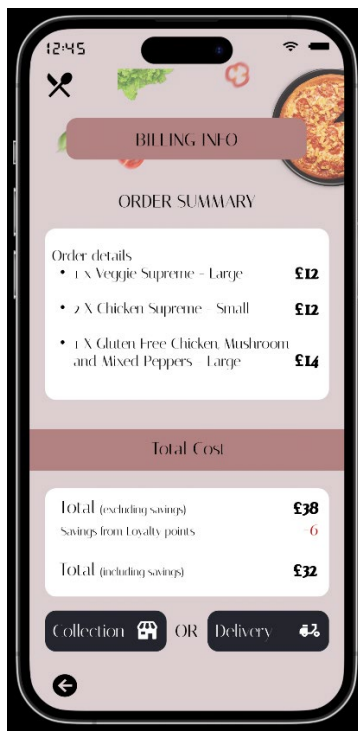
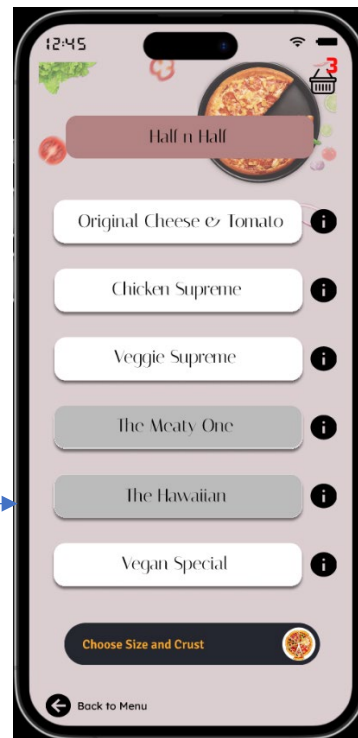
Selecting the crust type and the size of pizza. It also shows the right side of the pizza





The left side of the pizza and its ingredients

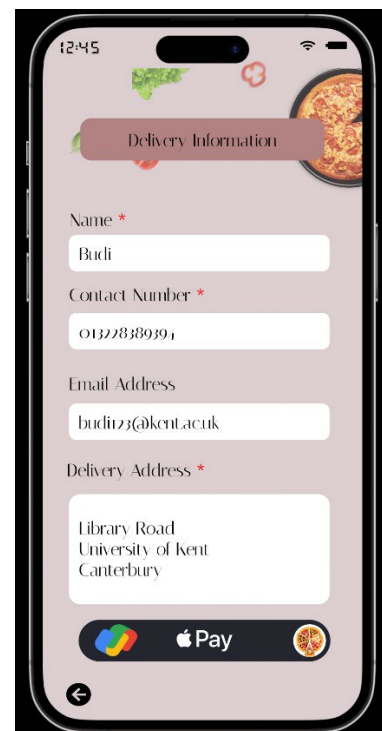
Choosing a pizza is as easy as selecting two pizzas and pressing "Choose Size and Crust"



The billing page showing the details about the pizzas and the total amount to be paid



The collection page showing details about the pizza to be collected and order number



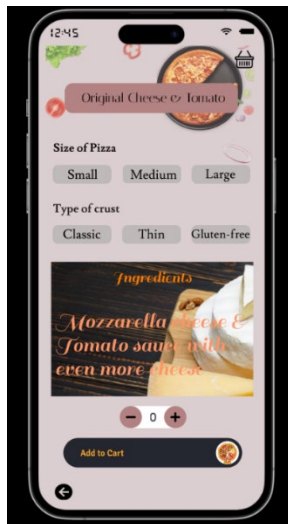
The delivery page clearly indicating the delivery address and the name of the customer

## Prototype 1 Report

*We aimed to follow a very simplistic design, which could be run within a mobile device with a seamless user experience. We also began outlining the necessary heuristics that may require special attention regarding the app's use-cases and provide an optimal user experience, such as:*

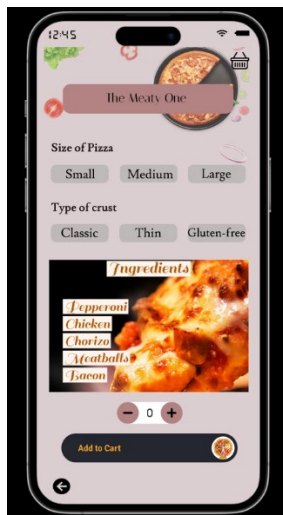
- **Visibility of system status:**
  - a) Via a bar at the bottom, middle of the screen, displaying the progress of the users order in 4 quarters/ stages
- **Match between system and real world:**
  - a) The use of pizza themed icons & backgrounds
  - b) Pizzas appearing 'shelved' before the user
  - c) Shopping cart item to display current items
  - d) Visualisation of the loyalty card
- **User control and freedom:**
  - a) 'Tap to begin' page ensuring user is consenting to the site
  - b) Back & menu buttons
  - c) + or – buttons in order to allow duplicate pizzas
- **Recognition rather than recall:** The minimal number of clicks required to complete your order allow the process to easily become muscle memory and streamlined.
- **Aesthetic & minimalist design:** Keeping minimal clutter on screen in the form of advertisements taking the background & necessary button spacing.

*It is worth mentioning that other heuristics will be later adhered to in the final design; these were just selected as ones that must be identified and discussed early in development in order to nail down a definitive design.*



This is the page you land on when selecting a specific pizza. The user has ample visual information to select different options and use the counter to add or delete pizzas.





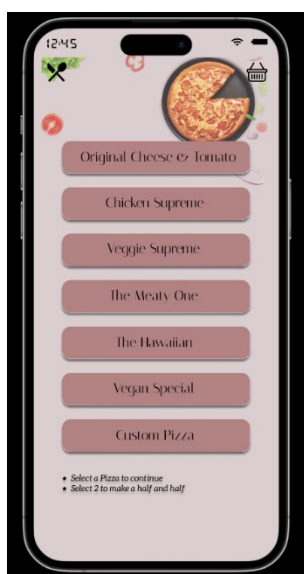
The use of pizza themed backgrounds and icons allows a 'softcore' form of advertisement of products and remains consistent with a real-world pizza shop.

Shopping basket icon to display what the user is 'carrying' with them to checkout. This is representative of a real-life basket used to add items.



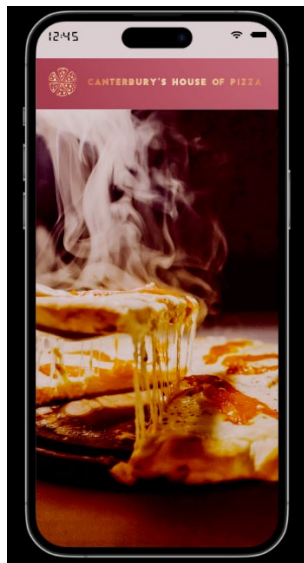
Visualisation of a 'stamped' loyalty card much like a physical card the user is used to.

The card details also get updated as the user checks out with the pizzas required to offer a free pizza.



Pizzas appearing shelved as they may in an oven also allows the user an easy processing and selection of the information before them

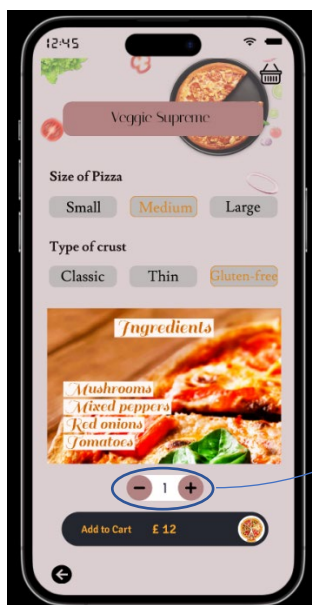
The text below offers useful information on how to select a half and half pizza



Click to begin page allows the user full control the moment they open the app. The logo is easily visible and the images provide a seamless view.



The menu option includes useful links in one place including the loyalty card for easy access at any point. Furthermore, the user login ID at the top gives a visual confirmation that the correct user is logged in, in case of multiple accounts using the same device.

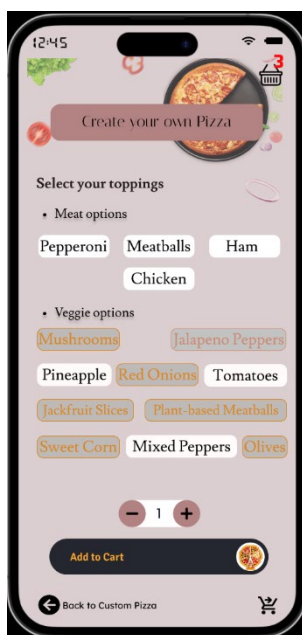
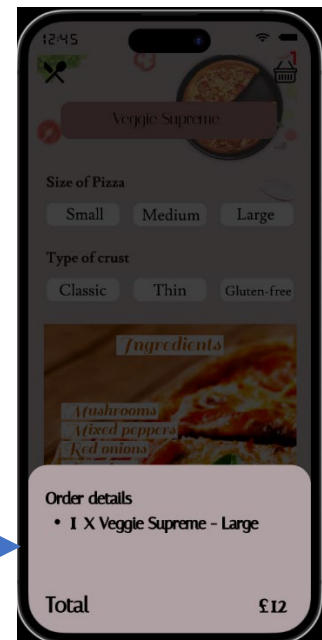


+ & - icons allow the user to select/deselect multiple pizzas of the same kind providing greater flexibility and ease of shopping.



The basket is currently empty as the user has just logged in and not ordered any pizzas.

After that, the basket option from the order page shows that one item has been added, thus updating the status for user ease.

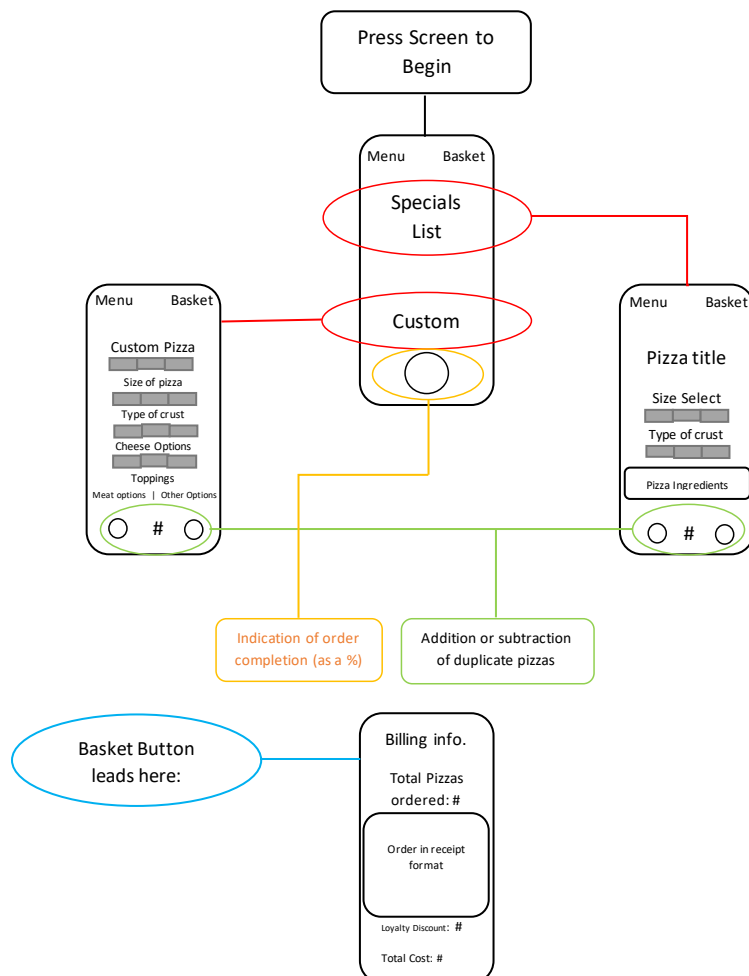


The custom pizza page allows the user to select as many toppings as possible. Unlike the size and crust type, selecting one does not unselect the others.



The billing info page shows the user details about the individual pizzas as well as the total amount of the order. The user can also see the savings made through the loyalty card in the total amount.

## Initial Website Map



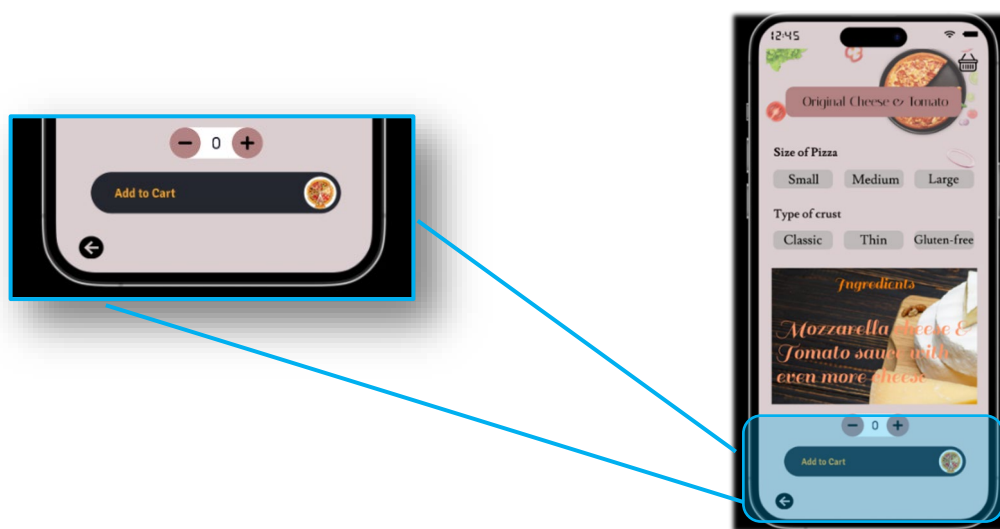
What was tested	Feedback	Fix
The user tried to order two speciality pizzas of the same type.	The pizzas were added successfully. The counter did not stay updated after adding one pizza, which needed fixing.	Updated the counter design to make sure it correctly reflects the true working of the app.
The user tried to order more than one kind of pizzas.	The direction of the arrows pointed backwards to go towards the menu, which wasn't very fluent.	We fixed the button direction and added a descriptive text to ensure that the user can easily navigate the buttons.
The user tried to select different sizes and crust types.	In order to select any size or crust type, the user had to first uncheck the first option in order to select the desired option.	The fix we found was to add the buttons together so that selecting one of them unselects the other and so on.
The user ordered the custom pizza by choosing different topping options.	The user liked the fact that the meat and veg options were separated clearly. It made it very easy to select particular option without going through all of them.	No fix needed
The user tried ordering a 10 <sup>th</sup> free pizza with the loyalty card discount.	The fact that the loyalty card was added within the accounts option, and it updated when the customer rechecked it after checking out. It was really informative and provided a visual status report.	No fix needed
The user had to click the basket icon to see the status of the current order. This was not very convenient at first use.	The user would like to have a number with the basket which would be very helpful in knowing how many pizzas are in the basket.	We added a number close to the basket icon which was very clearly visible. This made it easier for the user to quickly glance over and see the status of the order.
In the checkout page, the discount was added successfully to the pizzas ordered by the user.	The user didn't like the fact that the most expensive pizza was free in the deal.	We changed the discount scheme based on this feedback, and the least expensive pizza is now free with the deal, keeping in line with real life business models.

## Prototype 2 Report

*\*Presented in numerical order of the relevant heuristic in question*

Goal	Heuristic	Feedback	Solution
Include a system to <b>display the users progress</b> in the creation of their order.	1: Visibility of system status	"This icon takes up too much space & is not really important enough..."	Altered Initial Plans to instead display an add to cart icon with the completion <b>indicator</b> included.

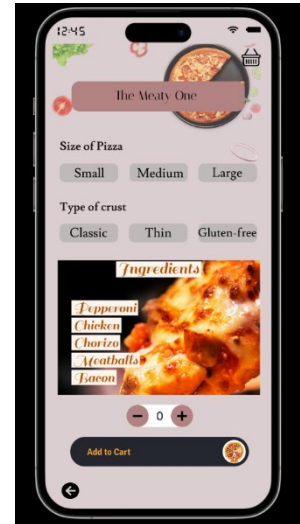
- Progress wheel, now included to the right of our 'add to card icon'
- Add to cart icon enlargement in order to accommodate progress wheel & make an easier user experience.



Goal	Heuristic	Feedback	Solution
Include <b>a pizza related theme</b> & allow for advertisement of products while using the app	2: Match between system & real world	N/A	The use of <b>pizza themed backgrounds and icons</b> allows a 'softcore' form of advertisement of products and remain consistent with a real-world pizza shop



- **More subtle pizza box/ table background**
  - Remains a constant background for the whole site
- **‘Upfront’ images of the pizza selected by the user**
  - Also, a helpful tool for the user to see what pizza they have selected to order and discover how appetising it is
- **Other aspects of the site also have pizza themed displays such as:**
  - The progress wheel on the add to cart icon
  - The ‘click to start’ page displaying a pizza being torn
  - The logo of the site being an abstract sliced up pizza



Goal	Heuristic	Feedback	Solution
<i>Finding a match between the system &amp; real-world conventions, when using the site</i>	2: Match between system & real world	<i>"...I usually use a basket to see the contents of the basket &amp; when I think of a loyalty card being stamped, it would be nice to see that happen."</i>	<ol style="list-style-type: none"> <li>1. <b>Shopping basket icon</b> to display what the user is 'carrying' with them to checkout</li> <li>2. <b>Visualisation</b> of a 'stamped' loyalty card much like a credit card in the wallet of the user.</li> </ol>

- **In the loyalty card section, we included this drawn up image of a perhaps physical loyalty card for users.**
  - It included a visualisation of the goal for number of pizzas
  - As well as displaying how many are left to go



Basket Icon located on the top right of the screen in order to lead users to the basket info section. Location of basket following typical website conventions.

Pizzas of choice are layered or "shelved" as I were to coin them, in order to provide an easy way to list all options to the user and aids the heuristic

5: Error Prevention

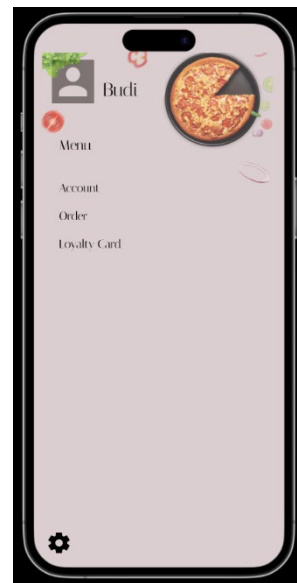
& 6: Recognition rather than recall



Goal	Heuristic	Feedback	Solution
<b>Reduce</b> user error & <b>streamline</b> the process	3: User control and Freedom  & 5: Error Prevention	<i>"...and my phone can sometimes take a while to load pages, meaning if I were to press in the wrong place, I might end up somewhere completely different."</i>	<ol style="list-style-type: none"> <li>1. <b>Click to begin page</b> allows the user to prepare and ensure they are not on the site accidentally, removing user error.</li> <li>2. <b>A Menu System &amp; further page controls</b> allowing for greater navigation of the page</li> </ol>

- This page is also helpful regarding the branding on the site, for example;
  - It allows the for-mentioned soft advertisement of the pizza via the imagery, encouraging users in
  - It displays the name of the website as well as the logo in order to ensure they know where they are
- 'Click to begin' pages also aid in concealing website loading screens, giving a smoother transition for the user & an overall more enjoyable experience

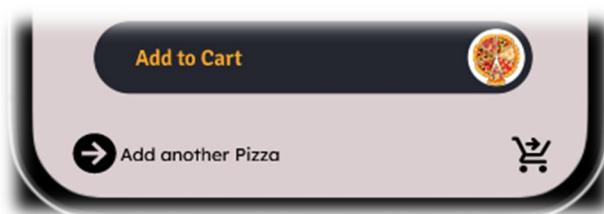
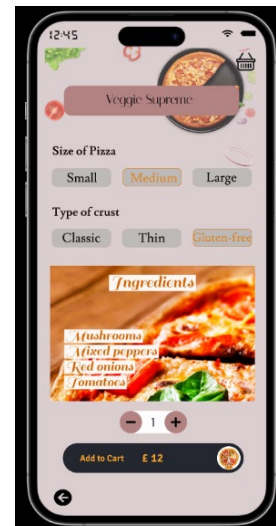
Menu and back option buttons allow greater navigation two and from the order, account, and loyalty card screens. This massively increases the user control & freedom throughout the site



Goal	Heuristic	Feedback	Solution
Give users <b>more dynamic options</b> when ordering individual pizzas	3: User control and Freedom	N/A	Extra options to allow a more diverse set of orders to be created by the user, such as an <b>intuitive quantity meter</b>

*In order to provide a more fluid ordering experience we had a tester work through the required scenarios & they discovered that while the scenarios worked fine, if they wished to order multiple of a single pizza, they had to do it one by one, too & from the main order menu page; as a result, we added the following:*

+ & - icons allow the user to select multiple of the same pizza to be added to the cart, with a live price indicator, easy to read.

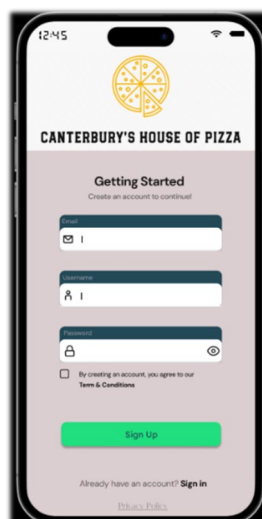


<- Before

After ->

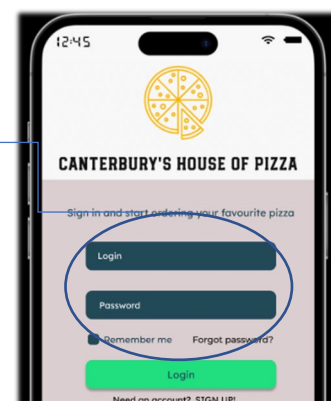


The above screenshots show the transition from one style to the other which will help make the whole customer experience seamless.

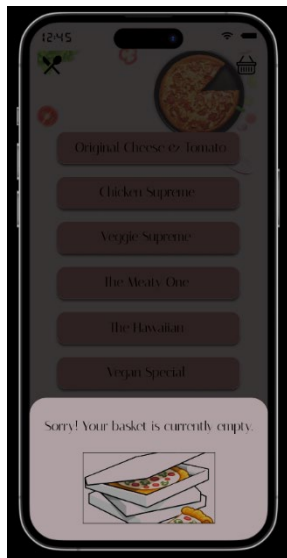


Obvious locations for user input, following proven trends from other exemplar sites.

Subtle sign-up option for users with no account, wishing to create one – this will take users to the following page where one can be created:

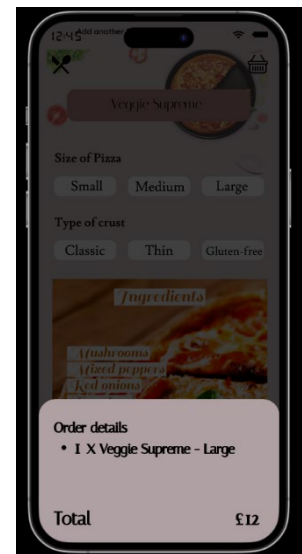


#



<- Before

After ->



The basket pop-up before and after adding the pizzas. This gives user a clear and visible indication of what the account status is:

### The *necessary* info being:

- The items included in the order
- The quantity of each item
- The total cost of the order itself



Included also within the page; are savings related to the loyalty card as well as the total cost, adjusted for these savings.

Furthermore, we included a follow up page relating to deliveries, allowing the user to input the required information for the driver as well as the method of choice for conducting an online transaction.



What we tested	Feedback	Fix
The direction of the <b>arrows</b> pointed backwards to go to the menu with no clear label.	We were advised to turn the arrow forward in order to ensure the flow of the application does not break.	We pointed the button in the other direction. That helped in ensuring that the flow of the app is fluent. We also added some text advising the user on how to use the arrow button.
Lack of a <b>login page</b> means the site is unable to identify users or validate their use of the app	We were informed that a login page providing a slot to input a username and a discrete password can ensure the user's identity and legitimate use of the app.	We included a page in between the 'tap screen' and order page in order to adapt to the login system & ensure its purpose is conveyed to the user through the recognition of the typical user login format provided on sites similar to this.
<b>Basket Display</b>	Some internal feedback informed us that the basket icon should probably display the items currently placed within the basket.	We decided to allow the basket to pop-up from below the screen and display the necessary info to the user.
<b>Checkout page</b> displaying the order details and receipt to the user	In order to complete our vision for the checkout page, we were advised to include the checkout page, displaying all the relevant information regarding the order.	We included a receipt display, showing all the information the basket would give, as well as delivery/collection options and a total at the bottom.
The <b>quantity</b> of items in a basket <b>must be displayed</b> for user convenience	Our client informed us that in order to see the number of items in her basket, they had to click on it, which took up too much time – especially with a poor internet connection.	In order to reduce the time spent on loading screens the user spends, we included a small integer that would increment alongside the number of pizzas added to the order.
The client also specified the inclusion of a <b>half n' half pizza system</b> , allowing the user to select two different sets of toppings on each side of the crust	Our third party concluded the necessity of some systems in order for this system to work, such as the normal selection of size and crust, or the option of choosing the type of pizza on each half.	We included the two pages to allow the client requirements to be met on this topic as well as including a selection on the side of the pizza in question for further user control.
<b>Login Page</b> user freedom & features	Our client informed us that due to the login page being put in place – the user may wish to be able to remain private or skip the inconvenience of a login page	We created a button beneath the login info box to enable users to "continue as guest", where a loyalty card will not be included in purchases & allows the user to not give us any private information.

## Prototype 3 Ideas – If we had to make a revised version

### More in-depth veggie labels

*One aspect of the site planned out but never executed was the use of a vegetarian symbol such as a vibrant green leaf, to indicate vegetarian pizzas. This could've taken the form as a small icon on the side of pizza options in the menu, purposefully contrasting with the regular colour scheme in order to allow vegetarians to easily spot the helpful icon. This icon could also appear on either side of the half & half pizza, crust and sizes selection page, as this could've informed people on contradicting sides to the pizza about to be ordered.*

### Select Larger buttons

*Once piece of feedback from a client was requesting larger buttons regarding the user control & navigation, for example the button located at the bottom left when viewing a pizza leading the user back to the menu if they wish to change their mind or select a different choice. In the end – we elected to not execute this section of feedback given we were happy with the current design, & we had to prioritize other aspects of the app to be completed within the time constraints.*

### Colour Scheme

*Admittedly, the colour scheme was rushed a little bit. We decided to select one that matched imagery we chose relating to the subject at hand, that being pizza. We believe which this achieves a look matching the colours of pizza in your head, they may not be what the client has in mind, especially regarding their branding. Given more time and feedback we would've used a tool in order to select a pallet to the clients liking & where necessary altered the website to match the colours chosen. A tool such as [coolors.co](https://coolors.co) would've been employed if the client wished for us to come up with a colour scheme of our own for long term use.*

### Animations & Transitions

*As part of research into how this site should look and perform, we observed the heavy use of animations in order to improve the customers visual experience & hide loading screens. Dominos & Amazon for example use animations, when you add something to the basket – displaying the item to be added 'flying' towards the basket icon. Given more time we would've definitely employed something similar that to this, and experimented with such animations where we easily could... for example on the tap to begin screen, displaying the logo in a fancy way to attract attention at the same time.*