**Application Development**

**Design process**

Graphical user interface, application

Description automatically generatedIn the images shown below, you will see the development stages of our ‘Room Locator App’. For this task, we had used MIT app inventor to help develop our app as it was easy to use, less code is needed as it is drag and drop commands, and it can fit the standards that we had set with our designs. In addition, we had made sure that the app follows the wireframes and the low fidelity prototype designs in order to keep the consistency of making our product look the same as them. Also, we had made sure it sticks with the Cardiff Met colour scheme based off of our mood, which is same with all our designs. The colours we went with is to have all the buttons in the app as blue with a white background.

A picture containing text

Description automatically generated

Here you can see the development of our ‘Welcome’ screen for our app. We have used the tool ‘Horizontal Arrangement’ to help display and structure our app properly. Also, you can see that we have used a drag and drop command to make the ‘Continue’ button works in order to go to the next screen. In all the screens in the app, they have the typeface, Sans serif as it is simple and eye catching for the user to read.

Graphical user interface, application

Description automatically generatedText

Description automatically generated with medium confidence

Here you can see the development of the ‘Choose A Block’ screen for our app. We have also used the tool ‘Horizontal Arrangement’ in all of our screens to help display and structure our app properly. Also, you can see that we have used a drag and drop command to make the ‘A Block’ and ‘F Block’ buttons works in order to go to the next screen. In all there is a ‘Back’ Button to go back the previous screen from the current one.

Text

Description automatically generatedGraphical user interface, application

Description automatically generated

Text

Description automatically generatedGraphical user interface, application

Description automatically generated

Here you can see the development of the ‘Choose A Room’ screen for our app, which represents both the ‘A block’ and the ‘F Block’. In addition to this, in each screen we have six buttons, each representing the rooms in both blocks in order to give the user a clear view of which room they want to choose to go to. Also, you can see that we have used a drag and drop command to make the ‘A Block’ and ‘F Block’ room buttons to help make sure that they work in order for the user to navigate to go to the next screen.

**Graphical user interface, application

Description automatically generated**

**Timeline

Description automatically generated**

**A screenshot of a cell phone

Description automatically generated with low confidence**

**Graphical user interface, application

Description automatically generated**

**A screenshot of a computer

Description automatically generated with low confidence**

Here you can see the development of the ‘Room Information’ screen for our app, which represents the room in both the ‘A block’ and the ‘F Block’. In addition to this, in each screen we had used the tool, ‘Text Box’, in every screen to help give a clear description and navigation for the user to understand where the rooms are. Also, each screen has the names and image of the chosen rooms to help user get a clear view in which one they have to go to. Furthermore, the blocks and rooms they choose from the previous screens, ‘Choose A Block’ and ‘Choose A Room’, has to be based off the ones off their timetable.

**User Guide**

For our had created a step-by-step guide for new users who download our app. The purpose of this app is to help the user safely navigate through and use our app to find the rooms based off their timetabled rooms. The guide for how to download and use our app goes as followed:

**Step 1:**

Type in ‘Room Locator App’ on your android or iOS device and press download.

**Step 2:**

After download is complete, open the app.

**Step 3:**

Once ‘Welcome’ screen is visible press ‘Continue’ to proceed further into the app.

**Step 4:**

Using the code found in your timetable, identify the letter in the code and find the correct block your room is found in.

**Step 5:**

Locate the three-digit number on your timetable and select accordingly.

**Step 6:**

Room location displayed, find your way to your room using the written instructions displayed.

**Testing**

To check if our app is working and navigating properly as we want it to, we had created a test log to document our apps run. The purpose of the test log is to help us see if what we expect the result of the apps navigation purpose goes well with how we want it to be based off of our ideas and designs.

# Test Log

**Test Item:**  *User opens the app and selects continue and then selects A block*

**Scope:** *Test the various selections of rooms to find*

**Action: click on options**

**Test Notes and Preconditions:**

*User has opened the app*

*User has chosen either A block or F block*

**Verification Steps:** *Verification of going through the system and retrieve information.*

**Scenario 1:** *P1*

| **Test ID#** | **Action** | **Input Value** | **Expected Results** | **Actual Results** | **P/F** | **Automated** |
| --- | --- | --- | --- | --- | --- | --- |
| 1-1-1 | Launch the app through emulator. | Click | Welcome Screen displayed | Welcome Screen displayed | P | Y |
| 1-1-2 | The user press continues. | Click | Block Selection displayed | Block Selection displayed | P | Y |
| 1-1-3 | The user opens A block section | Click | Room Selection displayed | Room Selection displayed | P | Y |
| 1-1-4 | User selects a Room number. | Click | Room information displayed | Room information displayed | P | Y |

**Test Item:**  *User opens the app and selects continue and then selects F block*

**Scope:** *Test the various selections of rooms to find*

**Action: click on options**

**Test Notes and Preconditions:**

*User has opened the app*

*User has chosen either A block or F block*

**Verification Steps:** *Verification of going through the system and retrieve information.*

**Scenario 1:** *P1*

| **Test ID#** | **Action** | **Input Value** | **Expected Results** | **Actual Results** | **P/F** | **Automated** |
| --- | --- | --- | --- | --- | --- | --- |
| 1-1-1 | Launch the app through emulator. | Click | Welcome Screen displayed | Welcome Screen displayed | P | Y |
| 1-1-2 | The user press continues. | Click | Block Selection displayed | Block Selection displayed | P | Y |
| 1-1-3 | The user opens F block section | Click | Room Selection displayed | Room Selection displayed | P | Y |
| 1-1-4 | User selects a Room number. | Click | Room information displayed | Room information displayed | P | Y |