

Mobile Applications - Coursework 1

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1 Introduction

This document is for coursework 1 of the Mobile Applications course at Napier University, the contents of this documents will consist of stages of development of a mobile application. I have been tasked with creating and developing a small mobile application.

The document will be split into different sections Planning , Development and Evaluation each section will describe in detail along with images showing the Mobile Application through out the duration of the project.

The first stage will be planning, the planning section will be detailed information on what the mobile application layout will look like, any fonts that could be possibly used, colours and information such as logos, buttons and sounds.

The second stage will be development , during this section , print screens of what the application during development will look like along with any last minute changes if necessary.

Thirdly, a critical evaluation followed by a personal evaluation of the project in whole

Any resources such as sounds will be referenced in the references section.

2 Planning

Beginning with the Planning stage, with being tasked to create a small Mobile Application i first thought of all applications that could be done, along with doing research. This stage of development will include print screens of the possible design layout of the App and end decision on which layout and colours are used.

The Mobile Application i have decided i want to create will be a Soundboard Application which will be funny and annoying, the decision was made after looking into different ideas and wanting to make something that produced sound and would be generally amusing.

2.1 What the App will include

The Application will include the following elements

Welcome Screen and button

Instead of just clicking the icon and landing on a page with a few sound buttons i have decided when the user clicks the App icon, a welcome screen will appear along with button which they tap which will lead send them to the soundboard page.

Buttons in two by two vertical formation

For the Button layout on the soundboard page, the buttons will be two for each row so the whole screen is not crowded up by buttons and causing possible layout constraint issues during development.

black background The Application will consist of a black background, having a white background depending on the users mobile screen brightness and how the app layout will be has been put into consideration as a white screen cause visual um-comfort after a long time viewing depending on screen brightness.

Sounds Since this application will be a soundboard, sounds are required for this application, the sounds will not be extremely long in duration.

2.2 Wireframe and preview sketches

The Wireframes and preview sketches displayed below will show what the mobile application layout will possibly look like of course there will be two or three colour choices displayed before deciding on the official layout.

Wireframe

The Wireframe is the scaffolding preview of what the application may look like only displaying the inner skeleton of the app, displaying where in position all the elements will be positioned.

Wireframes continued

Welcome Page

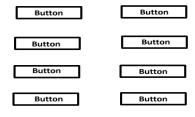
Welcome Screen - Annoying Sound Application
Wireframe

Logo

Button

Soundpage

Soundboard Page - Annoying Sound application

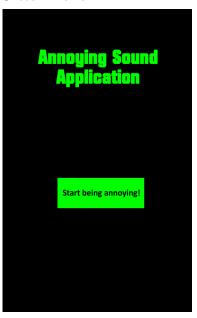


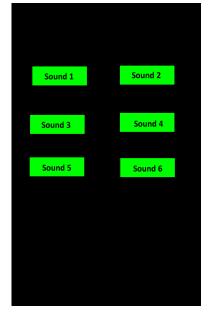
Wireframe

2.3 Storyboard sketches

The Storyboard sketches display more detail of elements such as the logo displayed with colours for both text and background along button colours and button text colour and images. there will be three different choice of storyboard sketches that will be displayed below and one will be picked for the developed application.

Sketch Preview 1





Sketch Preview 1 information - Both pages

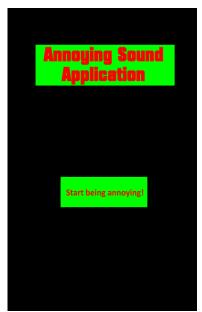
Logo Font color: Green

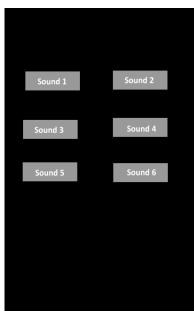
Font-family: Arial

Button background color: Green

button text color: Black Screen background: Black

Sketch Preview 2 - Welcome Page





Sketch Preview 2 Information

Logo font color: Red

Font-family: Arial

Button background color: Green

Button text color: Red: Screen background: Black

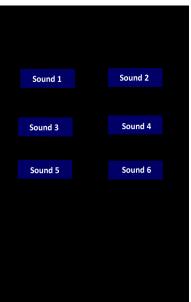
Sketch Preview 2 - Sound page

Button background color: Gray

Button text color: white

Preview Sketch 3





Sketch Preview 3 Information - Both pages

Logo font color: White

Font-family: Arial

Button background color: Dark Blue

Button text color: white Screen Background: Black

3 Development

The Development section of this project will provide information on any changes from the original planning section including screen shots of the Application.

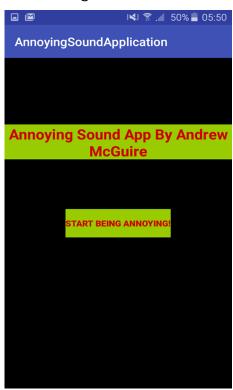
When choosing what preview sketch to use for the application i decided on preview sketch number two though the consistency in button colours on both pages are not consistent i decided on using grey button colours as i personal feel the green would be to bright for the eyes especially if a users screen brightness was at full.

3.1 Development Completion

With the Development of the Application being completed , there were some minor changes due to Android studio's text and colour option's available. it was discovered during development of the application issues with the layout of the logo also.

All changes will be be displayed below with the screen shots provided of the both Application pages.

Welcome Page



As displayed above the changes to the Application welcome page were minimal but still i class as small changes/issues.

Logo

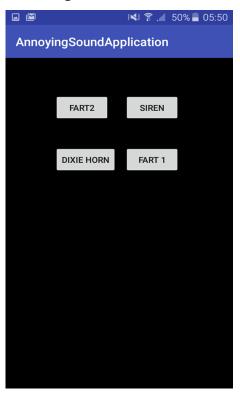
The Logo introduction text due to constraint issues in the xml coding activity file, lead to the logo taking up the page, i had to fix the height and width numerous times to bring it to the position it is at now.

The Colours used for the logo welcome screen were part of Android studios default colours and slightly off the red and green i used in the preview sketch.

Text font family

when trying to implement the font family "Arial" it didnt have it on the selection list, instead it had simply "san serif" font or by the looking of it Android studios default text.

Sound Page



Button Alignment

The preview sketch displayed six buttons but due to alignment issues which when moving one button the other buttons would move to other parts of the screen, this took a long time to resolve but in the end fixed.

Corrupted sounds

Originally there was going to be six buttons but due to two sounds becoming corrupted and issues finding other suitable sounds for this application i decided to remove the two sounds and buttons leaving four sounds available.

Information on Colour, Text

Logo Background Colour: Android Studio default "Holo Green"

Logo text colour: Android Studio default "Holo Red"

Logo text size: "24sp"

Logo text Font-family: "San-serif medium"

Button Text size: "14sp"

Button Text colour: black: "hex code: 000000"

Button background colour: Gray [Default Colour]

4 Critical evaluation

I personally feel that this application could of had alot more added to it along with extra pages providing more sounds than simply just one page, more consistent design and improved colour usage.

5 Personal Evaluation

I personally feel i struggled with using Android Studio and getting to grips with Java, before officially planning what mobile application i would create i spent time looking up tutorials which took up longer than expected as trying to fix errors in Android studio the best way i can describe is when calling a company in regards to a product or issue then being sent from one from department to another when calling up in regards to a product or issue.

This coursework has been a big learning curve though interesting at how a Mobile Application is created for Android , it was still very stressfull learning and researching.

Capitalization of MP3 file issue

When developing the application and trying to run the application to test the sounds, Android studio brought up an error regarding the MP3 files to which i had to look up stack overflow to find out the issue, personally the mp3's being Capitalized and Android studio not liking that bugged me but after renaming the MP3 files to one word each all lower case and managing to run them.

Button Alignment

The button alignment caused issues for over an hour trying to drag all four buttons to the centre, discovering that they have been chained or "connected" personally annoyed me as this causing issues in the end i managed to maneuver the buttons to a semi centre position.

Corrupt MP3 files

Due to reasons unknown 2 of the 6 mp3 files became corrupt, and due to the deadline fast approaching i had to remove both the corrupted files and leave 4 buttons/ sounds if there had been more sounds i was looking for, i would of added them.

References

 $\mathsf{BOMB}_SIREN-BOMB_SIREN-247265934.mp3$

 $Source: \ Soundbible.com$

 ${\sf Fart-Common-Everyday-Fart}_Mike-Koenig.mp3$

Source: Soundbible.com

Oopsy Daisy Fart-SoundBible.com-8405343.mp3

Source: Soundbible.com

 $dixie-horn_daniel-simion.mp3$

Source: Soundbible.com