

Cuisine 2.0

An AI-powered cuisine for smart consumption with enhanced nutrition



Team: AYB Creations

*Diploma in Information Technology*

*in*

*Big Data Analytics*

**First Review**

**Design**

**Supervisor:** Mr Zoubeir Aungnoo

**AYB Team Members:**

* BABOOLULL Yougesh
* BHAGOOLI Divesh Singh
* SUBRON Jhivesh Kumar

**Date: 07 April 2021**

# Abstract

Designing is an interesting section in the project management cycle, where developers anticipate upcoming challenges and difficulties. It is where user requirements are transformed into a functional prototype.

Our Cuisine 2.0 project has 3 main parts:

* Cuisine Vision: A screen mount using a raspberry pi.
* Cuisine Android app
* Cuisine 2.0 Website

Each part has been linked to a main server, each accessing the same Database using our custom written PHP APIs.

**Table of Contents**

[Abstract 2](#_Toc72671591)

[Our Potential Users 4](#_Toc72671592)

[Project Models 4](#_Toc72671593)

[Database 5](#_Toc72671594)

[Database-Relationship Diagram 5](#_Toc72671595)

[Description of Tables Used 5](#_Toc72671596)

[XML Files 6](#_Toc72671597)

[API 6](#_Toc72671598)

[Object Detection 7](#_Toc72671599)

[Model 7](#_Toc72671600)

[Algorithm 7](#_Toc72671601)

[Android App 7](#_Toc72671602)

[UML Diagram 7](#_Toc72671603)

[Website 7](#_Toc72671604)

[Raspberry Pi 7](#_Toc72671605)

[Server 7](#_Toc72671606)

[User Interface 7](#_Toc72671607)

[Android App 7](#_Toc72671608)

[Raspberry Pi 8](#_Toc72671609)

[Website 8](#_Toc72671610)

**Table of figures**

No table of figures entries found.

# Our Potential Users

# Project Models

## Database

Our project uses a MySQL database (u511941246\_cuisineUserAcc) to store user credentials. The table has 2 tables: UserAuth, User\_Secret\_Keys.

### Database-Relationship Diagram

Via PHP APIs

u511941246\_cuisineUserAcc

Cuisine 2.0Android App

UserAuth

User\_Secret\_Keys

Cuisine Vision

Cuisine 2.0 Website

## Description of Tables Used

The fields in the UserAuth table are: UserId, First Name, Last Name, Email Address, Verified.

|  |  |  |
| --- | --- | --- |
| **Field Name** | **Datatype** | **Description** |
| UserId | Integer | It is a unique id assigned to each user account created to be able to identify each user correctly. |
| First Name | String | It is the First Name of the User. |
| Last Name | String | It is the Last Name of the User. |
| Email Address | String | It is the email of the User |
| Verified | Boolean | It acts as a flag to check if a user has verified his email address or not. |

The fields in the User\_Secret\_Keys table are: UserId, Password.

|  |  |  |
| --- | --- | --- |
| **Field Name** | **Datatype** | **Description** |
| UserId | Integer | It is a unique id assigned to each user account created to be able to identify each user correctly. |
| Password | String (256) | It stores the password of the user which is encrypted using PHP SHA-256 cryptographic hashing method. There is no possible way of reversing a cryptographic hashed password as it uses a one-way function which makes the user account one of the most secured. |

## API

## Object Detection

### Model

### Algorithm

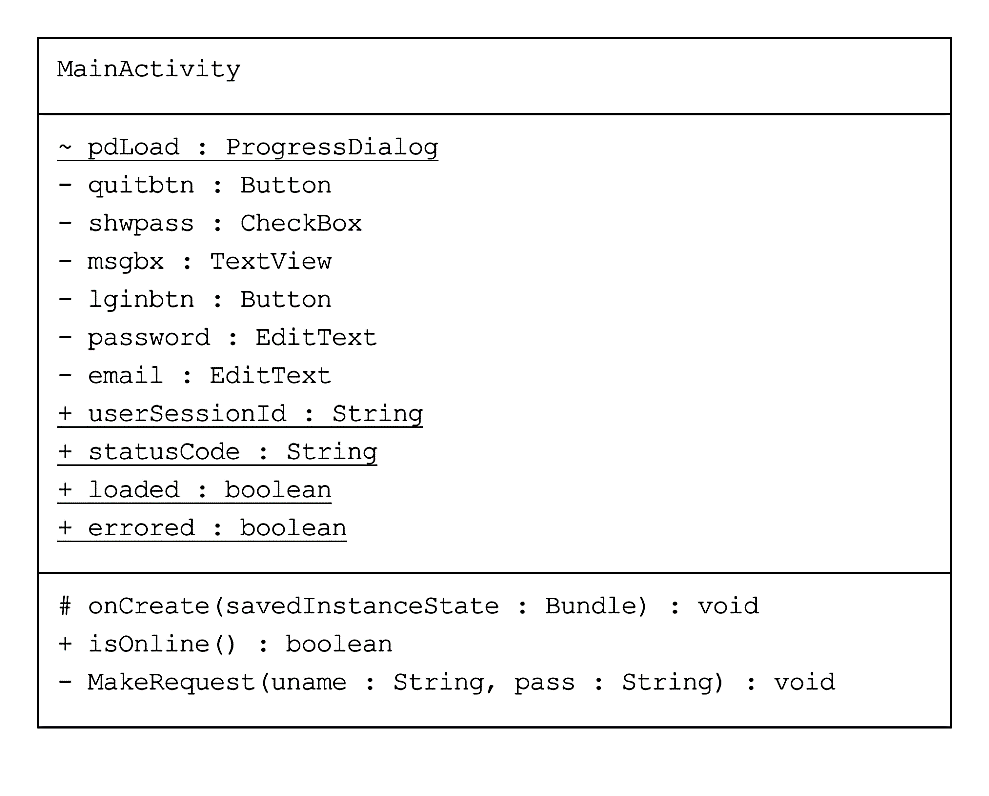
## Android App

The Android App makes use of a combination of activities and fragments to make user navigation easier.

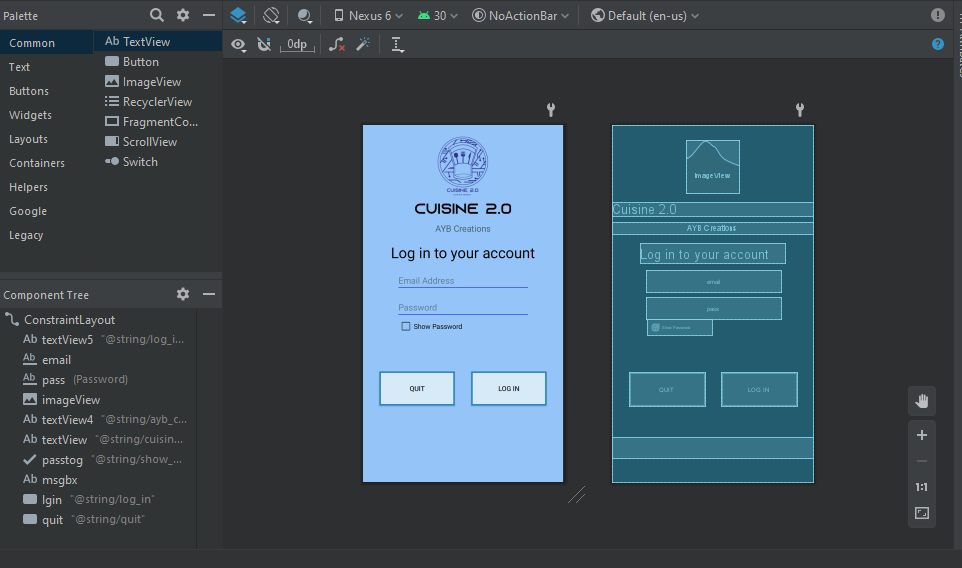
### Project Classes UML Diagrams

* **MainActivity Activity**

This activity handles the login page of the app. It makes php requests to the Server using Google’s Volley library. Volley is a standard HTTP library that makes networking for android apps easier and faster.

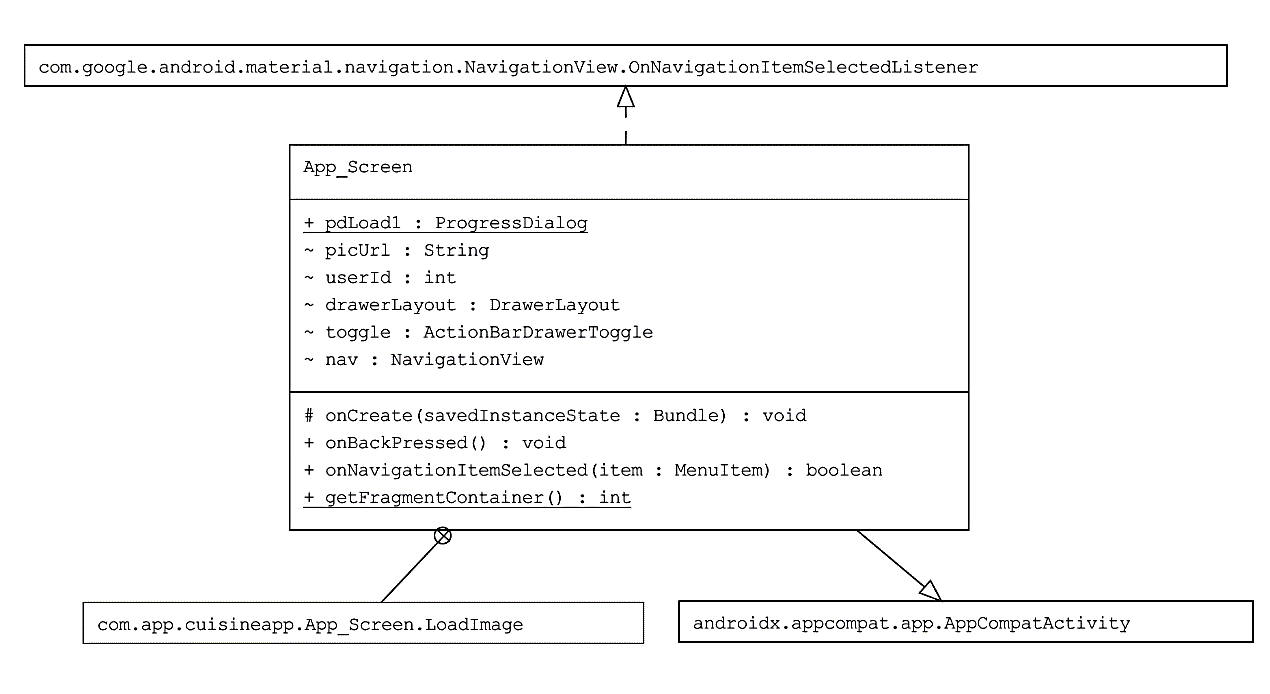


Activity Layout:

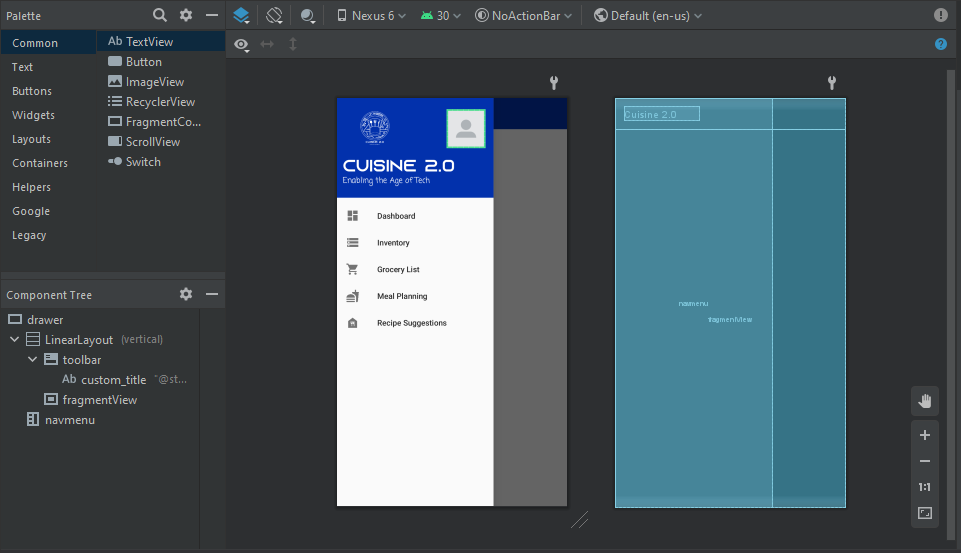


* **App\_Screen Activity**

This Activity extends the navigation view which is a left slider menu. It also handles the fragment views by swapping the fragment container with the selected item layout.



Activity Layout:



## Website

The website of Cuisine 2.0 has been designed and implemented using WordPress. WordPress is a free and open-source content management system written in PHP and MySQL or MariaDB Database

## 

## Raspberry Pi

# Server

//Hostinger

//ibm cloud

# User Interface

## Android App

## Raspberry Pi

## Website