# Overview

The project is the continued development of a mobile application with the purpose of assisting in management/organisation of group work projects.

The application is written in java. The basic outline of the application is that it is split between 2 programs written in java being the user apps and a server application. The server and user app communicate using standard socket connection (TCP) while using AES and RSA encryption to encode messages. The Server is essentially an interface for the client apps to extract information from a SQL database (currently using mariadb) then the user apps display this information to Users.

The current state of the project is that required security measures and basic networking is essentially complete and small amount of end user functionality is implemented. What will be required from this point is the extension and implementation of end user functionality (methods to organise work projects) and deployment. If this can be completed within your timeframe then the possibility of conducting UX testing is also a possibility.

Your client contact / point of contact for the 7-signal regiment (client) can be contacted by the following email. - [Nathan.law1@defence.gov.au](mailto:Nathan.law1@defence.gov.au)

If you have any questions or want more information, feel free to email me or if your would prefer we can have a voice call. – [jbpaterson101@gmail.com](mailto:jbpaterson101@gmail.com)

Generally, he doesn’t have anything he wants specifically when asked about desired features he just said to look at what other apps are doing a copy them however if given something he will give detailed feedback so I would suggest make something simple show it too him and then update accordingly.

# Setup

So, to setup the app and get it working you’ll need to set up a database. So I’m currently using maria db but any sql database will work. In the files I submitted to veronica there should be a folder named db\_creation\_script with a sql file name dbgen.sql. Run it and it should create the necessary tables. It won’t populate it with data I’ve just been doing it manually using the user app however there’s a java file with the server files named db\_query\_dev with a bunch of commented out code which can be used to create a script to populate the tables.

When you got the database going then update the main.java at line 22 and run it. the server is just a command line java application you should be able to compile it as you would with any other java application.

The user app is stored in the client\_app folder. Ive been using android studio ide I recommend you do as well. If you open it in android studio and run it should work. you can hook up a phone or download an emulator to test the app. You’ll need to put your phone in in dev mode if you use a phone.

# Persistence errors

So, there are few of errors so sorry there your problem now.

* Registration to login page return

So, you can’t currently navigate from the user registration page to the login page as it cuts the connection to the server.

* Project organiser memory overflow

So, to organise a project the programs create an interactive Gantt chart however it currently uses all information about the project to create the chart. If a project spans multiple year for example it simulates the whole project which can be too large which can cause the user apps to have a memory overflow or simply create a ton of lag/unresponsiveness. I recommend only using a fraction of the information to create the Gantt chart.

* Activity default colours

So, I was lazy when creating the ui. The default colours on phones can be different and when a colour isn’t set the phone will select its own. I haven’t set any background colours and I used black for my text so if there’s a phone with the default background being black it will just be a black screen. It should work on all the emulators you can download from android studio. But this will need to be fixed.

* Minor task project organizer

When you click on minor task like normal task it will just cause a crash. Also just to view the organiser for minor task it can sometimes cause a crash.

* Null reference crashes

With the project organiser there are a lot of places where a null reference can cause a crash. I really should have had some try catch blocks to handle errors.

* Add user issues

Need to limit add users for project and task to people in project.