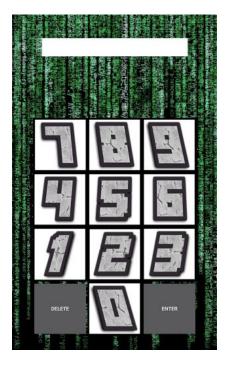


## SpeedMath ASSIGNMENT 2

## 1. User guide

This app is made for nexus 7 so please launch this app on your nexus 7 device. This app is call SpeedMath, SpeedMath has two screen the first screen is the start screen and the second screen which is the game of the app. For this app I try to make it more interactive for the user that paly my app, so my first screen I made it as all graphics interface (as shown below) and I also added the black ground music as well, when the user launch the app the music will start until the user go to the next screen which will make the game more interactive for the user.





(Screen 1) (Screen 2)

The second screen is the main game of the app, on the top of the screen will have a timer which will record how long you will finish the game and it will generate two random number between 1 to 10 and then you will have to calculate the answer which is based on added the two random number together. If you answer it concretely you will jump into the next question. The gamer will end after you answered question number 10. You will get your score after that, your score is in second for example 32 mean that you answer 10 question used 32 second, the number smaller mean better. In the screen two I also make it interactive instead of typing the answer using the keyboard on the tablet, I added 10 different number to make the user enter the answer easier and I also added different background music for this screen, the music will stop after you finish the question.

## 2. Reflections on implementation

To translating from APP Inventor to Java and XML is so difficult for me since I didn't know much about Java, but after 3 different LAB in the class I learn more about how to make an app using eclipse. When I start my first screen of my app I didn't know how to add photo and music. In APP Inventor it just have to upload your music file to the web and pick a music play on the screen to make it play but in Java you have to put your file to the raw folder and the enter some code in the activity file to make it play and then the button that I also have to do the coding to be useable.

```
set (global currrnet 🔻 to 🕻
                     get global currmet × (10) + get NumberText •
   answer • . Text • to get global currrnet •
                                                                                            按鈕3▼ .Click
                                              按鈕2 - .Click
                                                                                           call NumberButtonClick •
 call NumberButtonClick
                                                                                                     NumberText ( 按鈕3 ▼ . Text ▼
                                                        NumberText ( 按鈕2 ▼ . Text ▼
          NumberText ( 按細1 Text )
                                                                                            按鈕6 - .0
 按鈕4▼ .Click
                                               按鈕5▼ .Click
call NumberButtonClick •
                                              call NumberButtonClick •
                                                                                           call NumberButtonClick •
  按鈕7▼ .Click
                                               按鈕8▼ .Click
 call NumberButtonClick •
                                                                                          call NumberButtonClick •
           NumberText ( 按鈕7 * Text * )
                                                                                                                按鈕9▼ . Text▼
                                                                                                    NumberText
                                               按鈕10 ▼ .Click
                                               call NumberButtonClick •
                                                        NumberText ( 按鈕10 ▼ . Text ▼
                                                                                                   alize global QuestionNumber to
                                                                                                         initialize global sound to
```

```
public void three(View view) {
    total = total + 3;
TextView AA = (TextView) findViewById(R.id.ans);
    AA.setText(total);
public void four(View view) {
    total = total + 4;

TextView AA = (TextView) findViewById(R.id.ans);
    AA.setText(total);
public void five(View view) {
    total = total + 5;
TextView AA = (TextView) findViewById(R.id.ans);
    AA.setText(total);
public void six(View view) {
    total = total + 6;

TextView AA = (TextView) findViewById(R.id.ans);
    AA.setText(total);
public void seven(View view) {
    total = total + 7;
TextView AA = (TextView) findViewById(R.id.ans);
    AA.setText(total);
public void eight(View view) {
    total = total + 8;
TextView AA = (TextView) findViewById(R.id.ans);
    AA.setText(total);
public void nine(View view) {
    total = total + 9;
TextView AA = (TextView) findViewById(R.id.ans);
    AA.setText(total);
```

## 3. Comparison of App Inventor and Eclipse/Java

I have a lot of problem when I using java to do my app, the first one is to change the back ground photo of my first screen. I tried to add a photo in to the screen using ImageView in the palette option but it show up is just the photo and it is not what I want. I want it to be a back ground photo. In APP Inventor what you have to do is upload the photo to the web and then click the black ground and choose the photo you uploaded. But in Java I asked the LAB helper for a help. He teach me to right click in the graphical layout and then choose the edit black ground and then choose the photo and also I have to resize my photo before I do this. After put my back ground photo on my first screen I also have to put my background music in it. This one I found it difficult because I asked the LAB helper and they didn't know how to do it, so I took a look on the internet to find out a solution. I searched on google I found many website but no one that will help me. So I search it on YouTube to find some video about it, I found a video that could help me for my back ground music.

After the first screen I had different problem for the second screen. My first problem is about the layout of the screen in APP Inventor you can choose the lay out in the palette option, I didn't know that I can do the same thing in Eclipse so I created 10 different button on the screen but I can not put the button where I what because when I move one button every other button will move as well. So I can search on google to see why that would happen. I found a website said about this problem. It said because of the XML file every object is related together for example (button 1 have to be left side of the button 2).

The timer problem is the most difficult for me to made this app. I have to set up a timer and it will start when the user enter in the screen 2. In APP Inventor it has an option called Clock in the palette. I just have to put it in to the screen and set up the start and stop time is finish. But in Java you don't have an option for that so I have to look up in google and YouTube to find the solution for that. I found a video about to set up a timer. To set up a timer you have to add code in the main activity and you have to put the code where and when you what it to stop. But finally I set up the timer by following the video and it worked like I want.