

# TASK GUIDE (C1.08)

## A. Objectives.

Student will create a button to pick color for background.

## B. Requirements.

Hardware:

- 2 GB RAM minimum, 8 GB RAM recommended
- 2 GB of available disk space minimum, 4 GB Recommended (500 MB for IDE + 1.5 GB for Android SDK and emulator system image)
- 1280 x 800 minimum screen resolution
- Intel processor with support for Intel VT-x, Intel EM64T (Intel 64), and Execute Disable (XD) Bit functionality

Software:

- Microsoft Windows 7/8/10 (32-bit or 64-bit)
- JDK 8
- Android Studio IDE (Minimum 3.2) with AndroidX library.

## C. Resources.

Documents:

- Guide

Supplement files:

Test code:

- TestC1MyLibrary081.java

## D. Task Description.

Student create open click listener to pop up dialog. Then the dialog can choose color to set background color.

## E. Specification.

1. Open "MainActivity.java"
2. Create on click listener for button "btnPickColor" fill with on click method to run "openColorPicker" method
3. Create method with name "openColorPicker"
4. Set a custom dialog with name "AmbilWarnaDialog" and set value with "this, bgColor,new AmbilWarnaDialog.onAmbilWarnaListener()"
5. Create an override method in "openColorPicker" with name "onOk" to change background color with color you choose, like below

```
@Override
    public void onOk(AmbilWarnaDialog dialog, int color) {
        bgColor = color;
        layout.setBackgroundColor(bgColor);
    }
```

6. Create an empty override method in "openColorPicker" with name "onCancel" fill blank to cancel choose background color
7. Create on click listener method for button "btnSaveUser" fill with on click method
8. On click method fill with variables like table

```
"type variable" "name variable" = "value variable". "get  
variable"() ."action"();
```

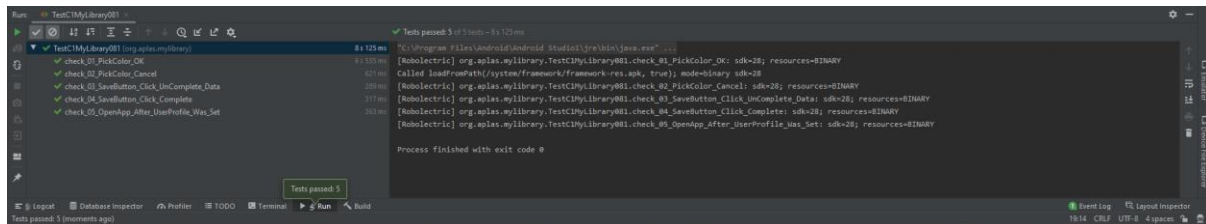
Type variable	Name variable	Value variable	Get variable	Action
String	name	editName	getText	toString
String	country	editCountry	getText	toString
String	phone	editPhone	getText	toString

9. Create selection on click method about edit texts are not empty so can save data user and go to “InputDataActivity” page. And if empty, will stack in “MainActivity” page, like below

```
if ((name.length()>0) && (country.length()>0) && (phone.length()>0)) {  
    userdata.saveUserData(name, country, phone, bgColor);  
    Intent intent = new Intent(getApplicationContext(),  
InputDataActivity.class);  
    startActivity(intent);  
} else {  
    Toast.makeText(getApplicationContext(), "Name, country, and  
phone number must be filled!!", Toast.LENGTH_SHORT).show();  
}
```

## F. Testing.

1. Copy “TestC1MyLibrary081.java” file to “org.aplas.mylibrary (test)” folder.
2. Right click on the “TestC1MyLibrary081.java” file then choose Run. It may take long time to execute.
3. Get the result of your task. If passed you will get green check like below. If the test failed, you will get orange check get the messages and you must check your work again.



**You have to try until get all green checks and continue to the next task.**