

Duc Tran  
CS338: Graphic User Interface  
Project: Color Beats  
Stage: 3.1

## File Description

### Class explanation:

\_imageColor.java:

1. public static void resize(String imgPath, String reimgPath, int w, int h, String type):  
+ Resize the image for faster processing. The program might take very long time if user input a high quality image.  
+ We just need the major colors not details color of every pixels.
2. public static List<Color> valRGB(String filepath):  
+ Extract the RGB value
3. public static Multimap<String, String> imgData(String image):  
+ Put the rgb value in a multi map with key as name of the color.
4. public String getCategory(String rgb):  
+ Extract the category of the rgb such as red, green, blue, white, black, ... base on the HSL value.

\_sound.java:

1. public static void play (String type, Integer hue, Integer but):  
+ Play the sound when button is click

\_customButton.java:

1. public customButton (Color rgb):  
+ Used to customized the background and hover color of button.

\_mainWindow.java:

- + Create the swing user interface of the application.

\_main.java

- + Run the program.

### Further Development for Final Stage:

- \_ Option button that allows user to choose level of analyzing: High, Medium, Low.
- \_ Background pictures.
- \_ Add more instruments for sound library.

Test Image:



