Assignment 1

First Question there are two versions, first version to done arithmetic operations (+, \*, /, -) between two images, if you to run this program you must have python interrupter on your PC and you must have opencv and numpy for python on your PC.

Command to run this program:

python “Q1 - operations between two images” “first image path.extension” “second image path.extension”

Second version to done arithmetic operations (+, \*, /, -) between image and constant value, if you to run this program you must have python interrupter on your PC and you must have opencv and numpy for python on your PC.

Command to run this program:

python “Q1 - operations between image and constant value” “image path.extension” Integer Value

Second Question there are two sections in it, first section is the log transformation on an image with a free parameter (c), where c is an integer constant value, if you to run this program you must have python interrupter on your PC and you must have opencv and numpy for python on your PC.

Command to run this program:

python “Q2 - A” “image path.extension” Integer value(c)

Second section is the power-law transformation on an image with two free parameters (c, y), where c is an integer constant value and y is the power value, if you to run this program you must have python interrupter on your PC and you must have opencv and numpy for python on your PC.

Command to run this program:

python “Q2 - B” “image path.extension” Integer value(c) Float value(y)

Third Question there three sections (two programs b and c in the same source code), first program to compute the histogram of an image and draw its histogram, if you to run this program you must have python interrupter on your PC and you must have opencv, numpy and matplotlib for python on your PC.

Command to run this program:

python “Q3 - A” “image path.extension”

Second program is implementing the histogram equalization and perform it on an image, if you to run this program you must have python interrupter on your PC and you must have opencv, numpy and matplotlib for python on your PC.

Command to run this program:

python “Q3 – B & C” “image path.extension”