# IMAGE EDITOR

**DEVELOPER:** 

[15BCE154]

**PRAGATI DOBARIYA** 

Guide:

Prof. Vipul Chudasama

&

Prof. Pooja Shah



#### **IMAGE EDITOR**

- AN IMAGE EDITOR OR PHOTO EDITOR IS A APPLICATION PROGRAM USED TO EDIT OR OTHERWISE MANIPULATE AN IMAGE, PICTURE OR OTHER GRAPHIC.
- USING IMAGE EDITOR WE CAN GIVE EFFECT COLOURS OR BORDERS ON IMAGE
- THIS APPLICATION ALLOW CHOOSE IMAGE FROM OUR COMPUTER. A MENU BAR TOP OF THE SCREEN PROVIDE THIS OPERATION OR THIS MENU BAR ALLOW TO THE USER OPEN A NEW IMAGE

# HARDWARE/SOFTWARE ENVIRONMENT

- SPECTIFICATION
- FRONTEND-NETBEANS
- BACKEND-NETBEANS
- HARDWARE
- DEVELOPMENT PC I-3 MACHINE WITH 3 GB RAM AND
- 500 GB HARDDISK
- OS DEVELOPMENT WINDOWS 8.1, MACOSX
- SOFTWARE
- PLATFORM NETBEANS 8.1
- JAVA JDK 8.1
- DEVELOPMENT TOOLS ARGOUML



#### JAVA AWT

- JAVA AWT IS AN API TO DEVELOP GUI OR WINDOW-BASED APPLICATIONS IN JAVA.
- JAVA AWT COMPONENTS ARE PLATFORM-DEPENDENT I.E. COMPONENTS ARE DISPLAYED ACCORDING TO THE VIEW OF OPERATING SYSTEM. AWT IS HEAVYWEIGHT I.E. ITS COMPONENTS ARE USING THE RESOURCES OF OS.
- THE JAVA.AWT PACKAGE PROVIDES CLASSES FOR AWT API SUCH AS TEXTFIELD, LABEL, TEXTAREA, RADIOBUTTON, CHECKBOX, CHOICE, LIST ETC



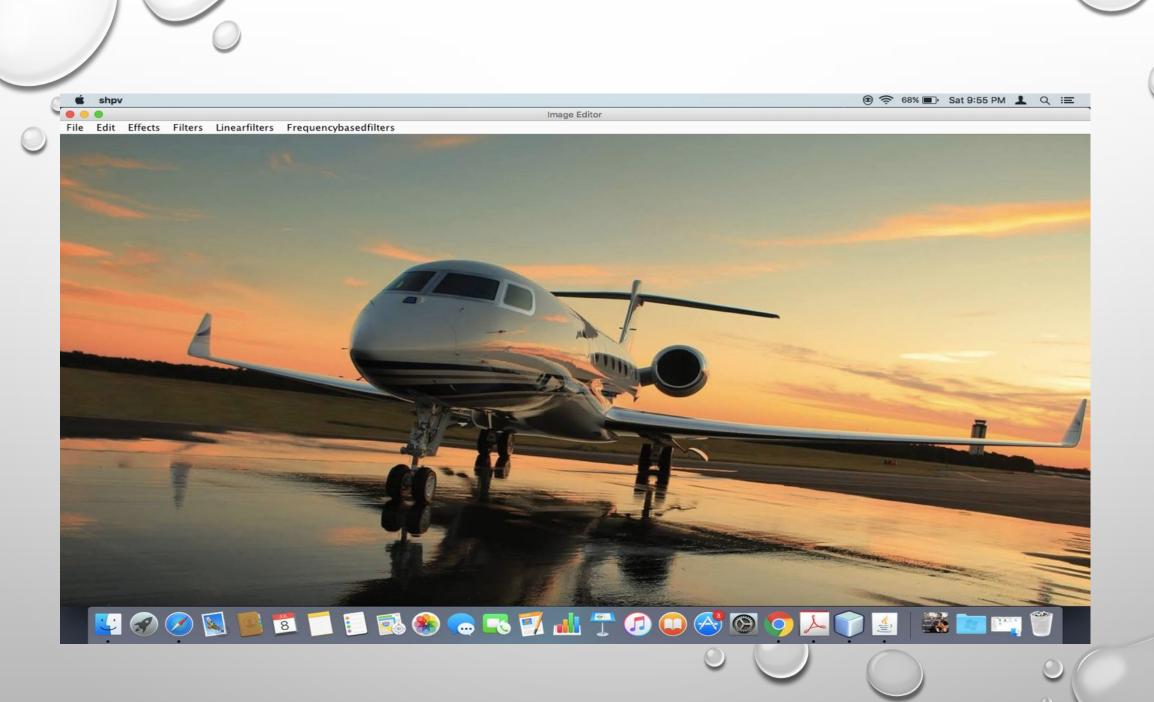
#### CONTAINER COMPONENT

- THE CONTAINER IS A COMPONENT IN AWT THAT CAN CONTAIN ANOTHER COMPONENTS LIKE BUTTONS, TEXTFIELDS, LABELS ETC. THE CLASSES THAT EXTENDS CONTAINER CLASS ARE KNOWN AS CONTAINER SUCH AS FRAME, DIALOG AND PANEL.
- WINDOW
- THE WINDOW IS THE CONTAINER THAT HAVE NO BORDERS AND MENU BARS. YOU MUST USE FRAME, DIALOG OR ANOTHER WINDOW FOR CREATING A WINDOW.
- PANEL
- THE PANEL IS THE CONTAINER THAT DOESN'T CONTAIN TITLE BAR AND MENU BARS. IT CAN HAVE OTHER COMPONENTS LIKE BUTTON, TEXTFIELD ETC.
- FRAME
- THE FRAME IS THE CONTAINER THAT CONTAIN TITLE BAR AND CAN HAVE MENU BARS. IT CAN HAVE OTHER COMPONENTS LIKE BUTTON, TEXTFIELD ETC.

#### JMENU BAR

• A MENU APPEARS AT THE TOP OF ALMOST EVERY PROGRAM WE USE. IT CONTAINS LINKS TO COMMONLY USE FEATURES OF THE PROGRAM. THE JMENU COMPONENT IS THE BASIC MENU ITEM CONTAINER. JMENU IS PLACED ON JMENUBAR, THUS JMENUBAR CAN HAVE A SERIES OF JMENU COMPONENTS.

JMENU CONTAINS SEVERAL JMENUITEMS USERS CAN CHOOSE. ALSO JMENU COMPONENT CAN CONTAIN JSEPARATORS.





# MODULES

FILE

**EDIT** 

**EFFECTS** 

**FILTERS** 

**LINEARFILTERS** 

**FREQUENCY BASEDFILTER** 



#### **FILE**

- BROWSE
- SAVE AS PNG
- SHARE/SAVE
- EXIT



# **EDIT**

- IMAGE BRIGHTNESS
- ADD TEXT ON IMAGE
- IMAGE RESIZE
- IMAGE ROTATION
- IMAGE TRANSPARENCY



# **EFFECTS**

- BLUR
- BOXBLUR
- GAUSSIANBLUR
- SHARPEN
- UNSHARPMASKING
- EDGEDETECT
- EDGEDETECT1
- EMBOSS



### **FILTERS**

- RECTANGULAR
- CIRCULAR
- PYRAMIDAL
- CONE
- HORIZONTAL
- VERTICAL



# LINEARFILTERS

- LAPLACIANGAUSSIAN
- MEAN
- IMAGECONVOLVE
- DERIVATIVE
- SOBEL
- PREWITT
- ROBINSON



- LOWPASS
- HIGHPASS
- DIRECTIONAL
- LAPLACIAN
- BANDSTOP
- DIFFERENTIATOR
- HILBERT
- BANDPASS



## **IMPLEMENTATION**



#### FILE

- METHODS AND CONTROL
- JFILECHOOSER
- FILENAMEEXTENSIONFILTER
- FILE.SETCURRENTDIRECTORY
- MYIMAGE.GETIMAGE
- ADDACTIONLISTENER



#### **EDIT**

- METHODS AND CONTROL
- MOUSELISTENER
- MOUSERELEASED
- MOUSEDRAGGED
- GRAPHICS2D
- BASICSTROKE
- MEDIATRACKER
- FILTEREDIMAGESOURCE



#### **EFFECTS**

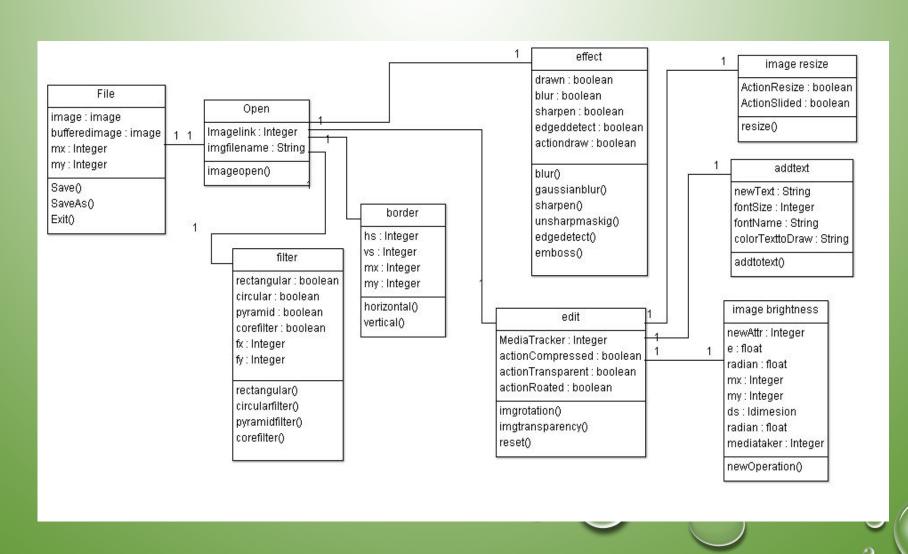
- METHODS AND CONTROL
- BUFFEREDIMAGE
- GRAPHICS2D
- KERNEL
- CONVOLVEOP
- FILTER



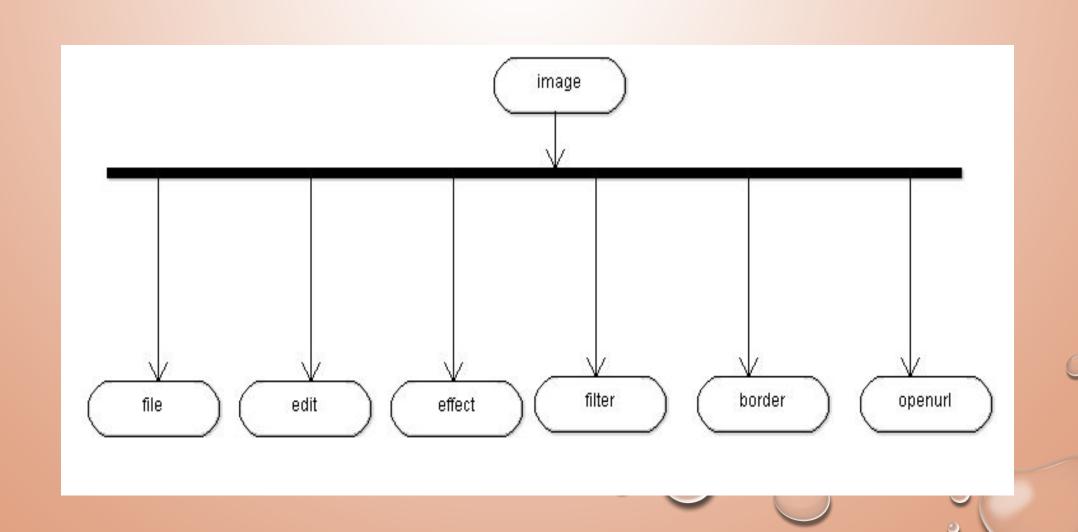
#### **FILTERS**

- METHODS AND CONTROL FOR EFFECT
- BUFFEREDIMAGE
- GRAPHICS2D
- KERNEL
- CONVOLVEOP
- FILTER

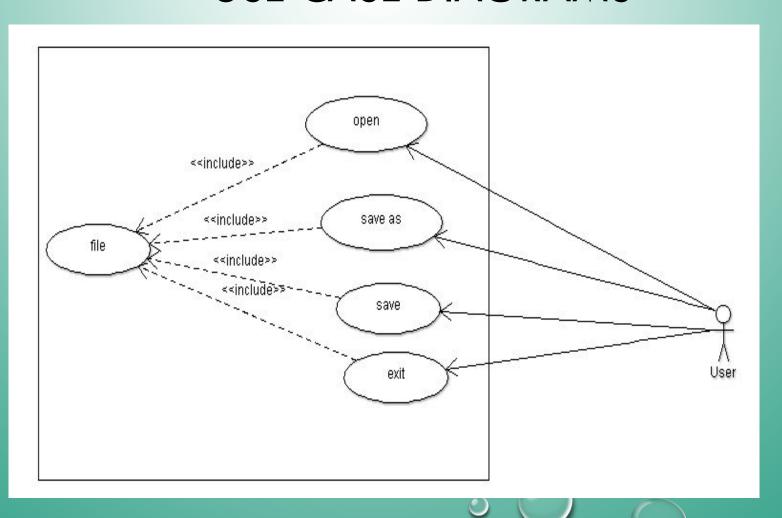
#### CLASS DIAGRAM

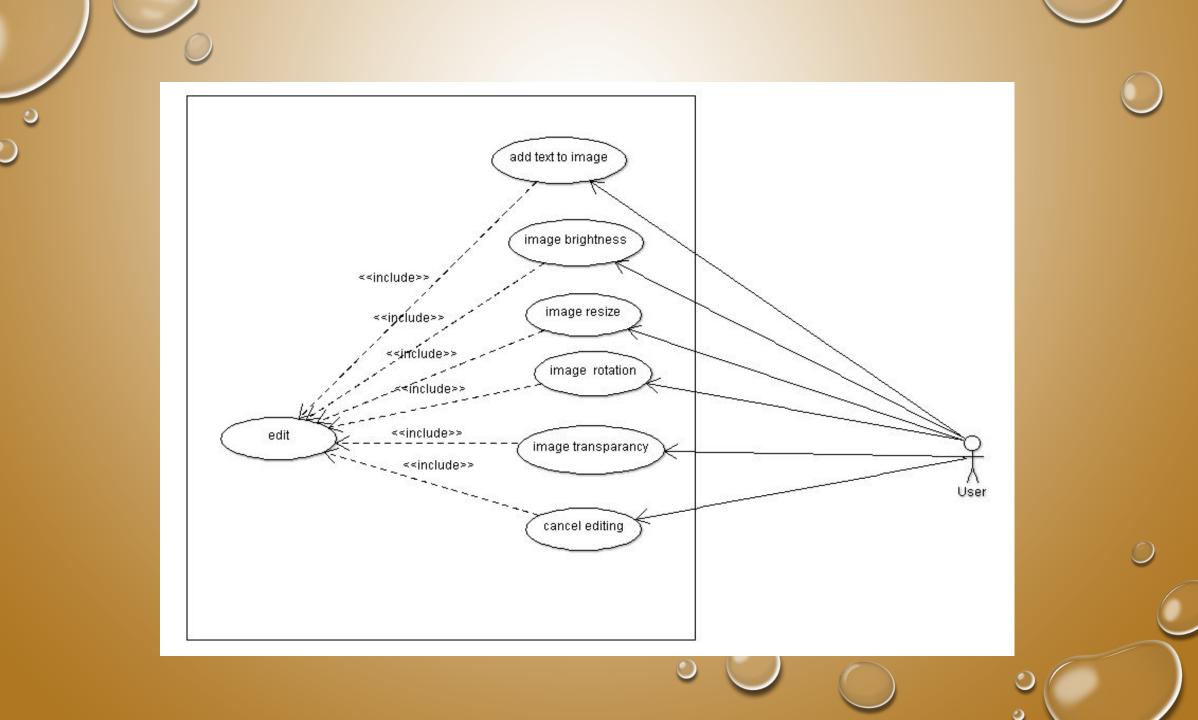


#### **ACTIVITY DIAGRAMS**

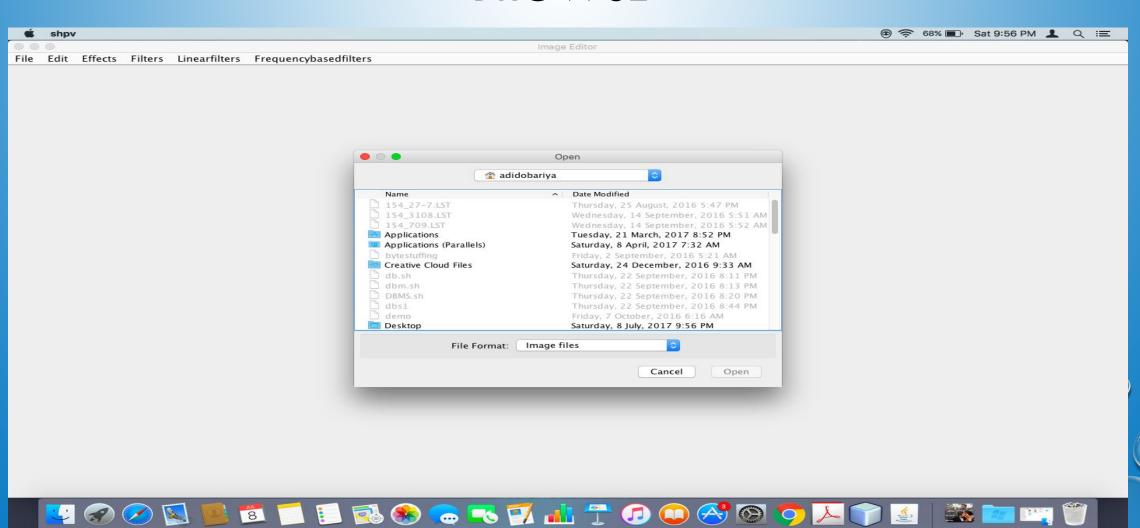


#### **USE CASE DIAGRAMS**

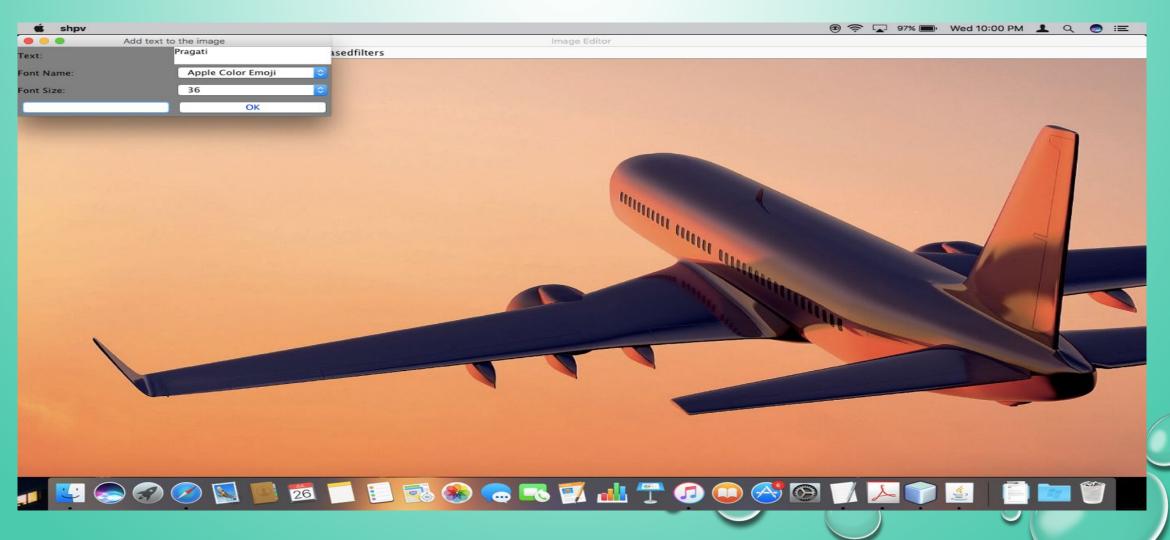




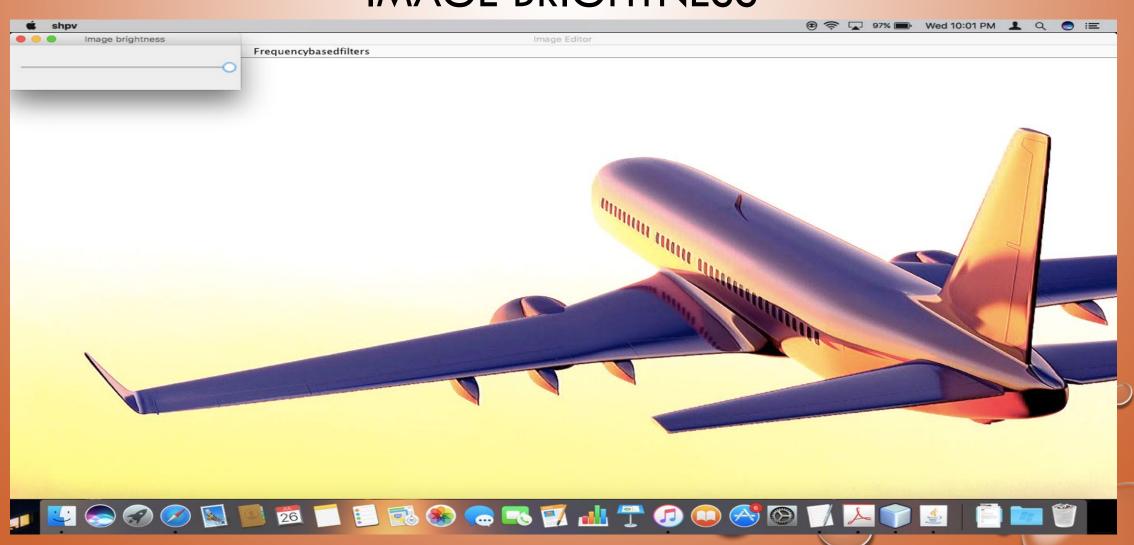






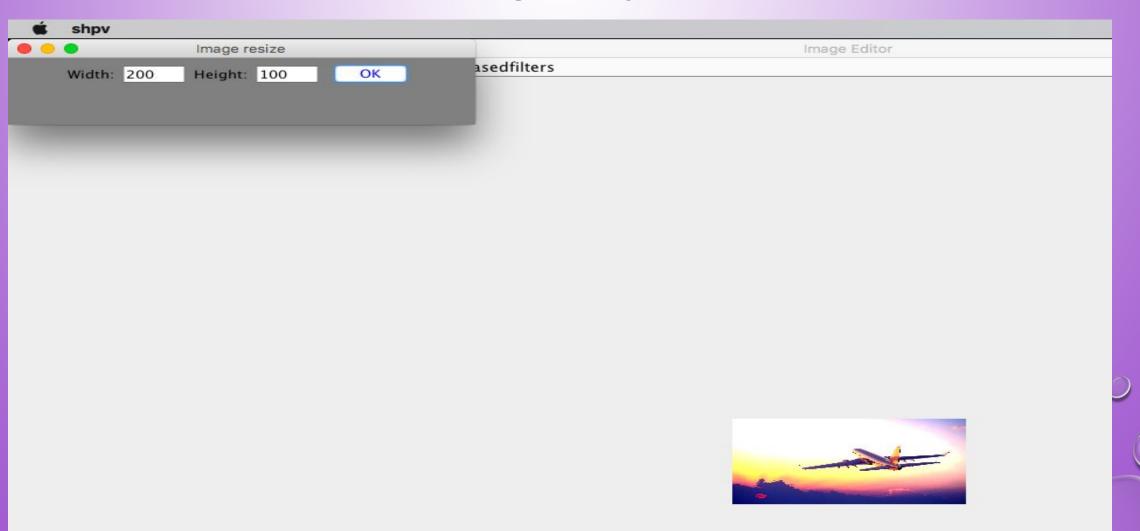


#### **IMAGE BRIGHTNESS**

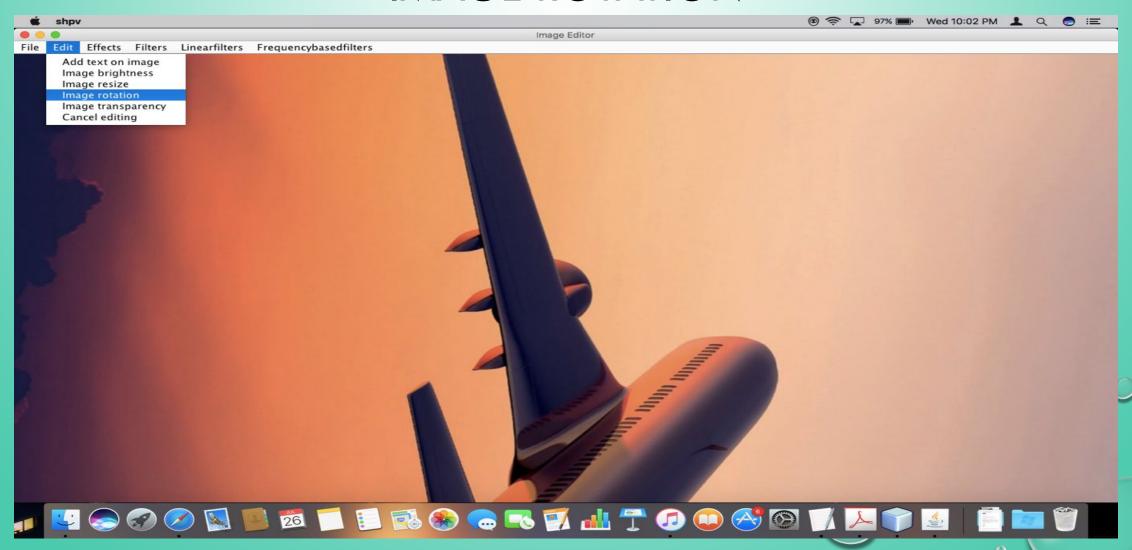




#### **IMAGE RESIZE**



#### **IMAGE ROTATION**



#### **ADVANTAGE**

- IMAGE EDITING IS AN INTENSE PROCESS THAT INVOLVES VARIOUS OTHER JOBS SUCH AS CLIPPING PATH, CORRECTION MASK, COLOR CORRECTION, REMOVE UNWANTED OBJECTS, CARTOONING, VECTOR GRAPHICS AND FLASH ANIMATION.
- IT'S OBVIOUS THAT THESE ARE ALL A PART OF CREATIVE METHODS THAT CAN SIMPLY MAKE YOUR IMAGES OUTSTANDING, HENCE, ARE VERY ADVANTAGEOUS FOR CUSTOMERS FROM DIFFERENT INDUSTRIES AND SECTORS.
- WITH THESE SERVICES CUSTOMERS CAN SEPARATE OBJECTS FROM THEIR BACKGROUND, CORRECT COLORS AND ADJUST TONE IN IMAGES, INSERT EXTRA PHOTOGRAPHS OR GRAPHICS IN THE PHOTOGRAPHS, REMOVE UNWANTED ELEMENTS FROM YOUR IMAGES.

#### DISADVANTAGE

- TIME CONSUMING
- IT CHANGES THE TRUE VALUE OF THE PICTURE.



# THANK YOU