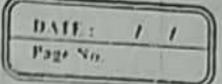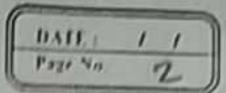# Practical No.1

Title:- Program using AWT Components.

Description:- AWT (Abstract Window Toolkit) contains numerous classes and methods that allow us to create & manage window. There are numerous AWT components like Panel, menu, scroll bar, Text area, Textfield, Button, window, and many other. This Program includes the AWT Components like text field, lable, text area, choice, window, frame, list, Buttons.

✗ what is component?

   At the top of the AWT Hierarchy there is the component class. Component is an abstract class that encapsulates all of the attributes of visual components.

✱ **Panel:-** Panel is an subclass of the ~~component class~~. container. A Panel is Basically a recursively nestable, concrete screen component.

✱ **Frame:-** Frame encapsulates what is commonly thought as a "window". It is a subclass of window. It has a tital bar, border.

and resizing corners.

* Lables:- It is the easiest control to use. A label is an object of type label. It contains the string which it displays.

* lists:- The list class provides a compact, multiple choice, scrolling selection list

* Textfield:- The text field class implements a single line text entry area usually called an edit control.

* choice :- The choice class is used to create pop-up menu of choice. The seolected choice by the user is shown on the top of menu.

* Button:- Button class is used to create a labeled button that has platform independent implementation.

* Text Area. It allows editing of multiple line text. It inherits Text component class.

* ~~conclusion: After Performing this Practical I learnt using AWT Components~~

* Characterstics of AWT:-

① It is the set of native Interface components.

② It is very Robust in nature.

③ It includes various editing tools like graphics tool and imaging tool.

④ It uses native window system controls.

* Advantages:-
① It takes very less memory for development of Gui and executiong programs.

② It is highly stable as it rarely crashes.

③ It depends on o.s so Performance is high.

* Disadvantages:-① The buttons of Awt does not support pictures. It is heavy weignt in nature

② Two very important component trees & tables are not Present.

Java AWT Hierarchy

```
        component
            |
        container
          /     \
     window      Panel
       /
    frame
```

conclusion:- After performing this practical I have learnt using AWT components.