

Java JProgressBar :- The JProgressBar class is used to display the progress task inside frame. It extends upon the package javax.swing.JProgressBar.

```
public class JProgressBar extends JComponent implements SwingConstants, Accessible
```

Methods:-

1. `setStringPainted()`:-It is used to determine whether string should be displayed.
2. `setString()`:- It is used to set value to the progress string.
3. `setOrientation()`:-It is used to set the orientation, it may be either vertical or horizontal by using `SwingConstants.VERTICAL` and `SwingConstants.HORIZONTAL`.
4. `setValue(int value)`:- It is used to set the current value on the progress bar.

Example :-

```
import javax.swing.*;

public class pbclass extends JFrame{

    JProgressBar jb;

    int i=0,num=0;

    pbclass(){

        jb=new JProgressBar(0,1000);

        jb.setBounds(40,40,160,30);

        jb.setValue(0);

        jb.setStringPainted(true);

        add(jb);

        setSize(250,150);

        setLayout(null);

    }

    public void iterate(){

        while(i<=1000){

            jb.setValue(i);
```

```
i=i+20;

try{ Thread.sleep(150);}catch(Exception e){ }

}

}

public static void main(String[] args) {

    pbclass m=new pbclass();

    m.setVisible(true);

    m.iterate();

}

}
```

JSlder:- A component that lets the user graphically select a value by sliding a known within a bounded interval. The `JSlder.AccessibleJSlder` This class implements accessibility support for the `slder`.
Methods:-

`setValue()` :- Sets or gets the slider's current value. The set method also positions the slider's.

`getValue()`:- Receive the current value.

`setOrientation()` :-This method set the orientation of Slider.

`getOrientation()`:- This method receive the current value.

Example :-

```
import javax.swing.*;

public class SliderExample1 extends JFrame{

    public SliderExample1() {

        JSlder slider = new JSlder(JSlder.HORIZONTAL, 0, 50, 25);

        JPanel panel=new JPanel();

        panel.add(slider);

        add(panel);
```

```
}  
  
public static void main(String s[]) {  
    SliderExample1 frame=new SliderExample1();  
    frame.pack();  
    frame.setVisible(true);  
}  
}
```

JToolBar :-

It is a container allows us to group other components, usually buttons with icons in a row or column.

```
JToolBar toolbar = new JToolBar();  
toolbar.setRollover(true);  
JButton button = new JButton("File");  
toolbar.add(button);
```

Note :-Add the button in a ToolBar

JMenuBar:-

The JMenuBar class is used to display menubar on the window or frame. It is consisted by different menu items.

Syntax:-

```
JMenu menu, submenu;  
JMenuItem t1;  
JMenuBar mb=new JMenuBar();
```

```
menu=new JMenu("Main");
```

```
submenu=new JMenu("Level Menu");
```

```
t1=new JMenuItem("New");
```

```
menu.add(t1);
```

