

1. Creating label, button & TextField in a frame using AWT.

```
* import java.awt.*;
import java.awt.event.*;
public class AWTExample extends WindowAdapter
{
```

```
Frame f;
```

```
AWTExample() {
```

```
    f = new Frame();
```

```
    f.addWindowListener(this);
```

```
    Label l = new Label("Employee id:");
```

```
    Button b = new Button("Submit");
```

```
    TextField t = new TextField();
```

```
    l.setBounds(20, 80, 80, 30);
```

```
    t.setBounds(20, 100, 80, 30);
```

```
    b.setBounds(100, 100, 80, 30);
```

```
    f.add(b);
```

```
    f.add(l);
```

```
    f.add(t);
```

```
    f.setSize(400, 300);
```

```
    f.setTitle("Employee info");
```

```
    f.setLayout(null);
```

```
    f.setVisible(true);
```

```
}
```

```
public void windowClosing(WindowEvent e) {
```

```
    System.exit(0);
```

```
}
```

```
public static void main(String[] args) {
```

```
{
```

```
    AWTExample awt-obj = new AWTExample();
```

```
}
```

```
}
```

2. Create a button and add a action listener for Mouse click.

```
* import java.awt.*;
import java.awt.event.*;
public class EventHandling extends WindowAd-
after implements ActionListener{
    JFrame f;
    TextField tf;
    EventHandling(){
        f = new JFrame();
        f.addWindowListener(this);
        tf = new TextField();
        tf.setBounds(60,50,170,20);
        Button b = new Button("click me");
        b.setBounds(100,120,80,30);
        b.addActionListener(this);
        f.add(b); f.add(tf);
        f.setSize(300,300);
        f.setLayout(null);
        f.setVisible(true);
    }

    public void actionPerformed (Acti-
onEvent e){
        tf.setText("Welcome");
    }

    public void windowClosing (Window-
Event e){
        System.exit(0);
    }

    public static void main (String args[])
    {
        new EventHandling();
    }
}
```

o/p:

1.

Employee info	
Employee ID:	
<input type="text"/>	(Submit)

2.

Welcome
(click)

## Programs on IO

Ex: 

```
import java.io.*;
public class ByteArrayInput {
    public static void (String args[]) throws
        IOException {
        byte[] buf = {35, 36, 37, 38};
        ByteArrayInputStream byt = new
            ByteArrayInputStream(buf);
        int k=0;
        while ((k=byt.read()) != -1) {
            char ch = (char) k;
            Sop("ASCII value of character is :
                " + k + "; Special Character
                is: " + ch);
        }
    }
}
```

O/P:

ASCII value of character is : 35; Special Character is : #

ASCII value of character is : 36; Special character is : \$

ASCII value of character is : 37; Special character is : %

ASCII value of character is : 38; Special character is : &



Ex 2: `public class FileEx {`  
`public static void main (String a[])`  
`throws IOException {`  
`FileInputStream fin = new FileInputStream`  
`("Example.txt");`  
`Sop("Remaining bytes that can be`  
`read:" + fin.available());`  
`content = fin.read();`  
`Sop((char) content + " ");`  
`Sop(content + " ");`  
`Sop("Remaining bytes that`  
`can be read:" +`  
`fin.available());`  
`Sop("Remaining bytes that can`  
`be read:" + fin.available());`  
`}`  
`}`

O/p:

Remaining bytes that can be read: 5

H72 elol L108 0111

Remaining byte that can be read: 0

Ex 3:

```

import java.io. FileInputStream;
import java.io. IOException;
public class FileEx2 {
    public static void main (String a[])
        throws IOException {
        FileInputStream fin = new
            FileInputStream ("Ex-
                ample.txt");
        byte[] bytes = new byte [20];
        int i;
        char c;
        i = fin.read (bytes);
        Sop (" Number of bytes read: " + i);
        Sop (" Bytes read: ");
        for (byte b: bytes) {
            c = (char) b;
            Sop (c);
        }
    }
}

```

}

}

o/p:

Number of byte read: 5  
 Bytes read: Hello.

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