

```
public class Frequencies
{
    private int min;
    private int max;

    private ArrayList<Integer> alValues = new ArrayList<>();
    private ArrayList<Integer> alFrequencies = new ArrayList<>();

    public Frequencies(int min, int max)
    {
        this.min = min;
        this.max = max;
    }

    public int generateNumber(int min, int max)
    {
        return (int) (Math.random()*(max-min+1))+min;
    }

    public void fillValuesList(int nbr)
    {
        for (int i=0; i<nbr; i++)
            alValues.add(generateNumber(min, max));
    }

    public void computeFrequencies()
    {
        for (int i=min; i<=max; i++)
            alFrequencies.add(0);

        int v, f;
        for (int i=0; i<alValues.size(); i++)
        {
            v = alValues.get(i)-min;
            f = alFrequencies.get(v)+1;
            alFrequencies.set(v, f);
        }
    }

    public Object[] toArrayValues()
    {
        return alValues.toArray();
    }

    public Object[] toArrayFrequencies()
    {
        return alFrequencies.toArray();
    }
}
```

```
public class MainFrame extends javax.swing.JFrame
{
    private Frequencies freq = null;

    public MainFrame()
    {
        initComponents();
    }

    public void updateView()
    {
        if (freq != null)
        {
            valuesList.setListData(freq.toArrayValues());
            freqList.setListData(freq.toArrayFrequencies());
        }
    }
}

// Skipped: ... initComponents { ... }
private void generateButtonActionPerformed(java.awt.event.ActionEvent evt)//GEN-FIRST:event_generateButtonActionPerformed
{
    //GEN-HEADEREND:event_generateButtonActionPerformed
    int min = Integer.valueOf(minTextField.getText());
    int max = Integer.valueOf(maxTextField.getText());
    int nbr = Integer.valueOf(nbrTextField.getText());
    freq = new Frequencies(min, max);
    freq.fillValuesList(nbr);
    freq.computeFrequencies();
    updateView();
}
//GEN-LAST:event_generateButtonActionPerformed
// Skipped: ... Look & Feel
// Variables declaration - do not modify//GEN-BEGIN:variables
private javax.swing.JList freqList;
private javax.swing.JButton generateButton;
private javax.swing.JLabel jLabel1;
private javax.swing.JLabel jLabel2;
private javax.swing.JLabel jLabel3;
private javax.swing.JLabel jLabel4;
private javax.swing.JLabel jLabel5;
private javax.swing.JScrollPane jScrollPane1;
private javax.swing.JScrollPane jScrollPane2;
private javax.swing.JTextField maxTextField;
private javax.swing.JTextField minTextField;
private javax.swing.JTextField nbrTextField;
private javax.swing.JList valuesList;
// End of variables declaration//GEN-END:variables
}
```