GUI CardGame

```java
import java.util.ArrayList;
import java.util.Random;

public class Deck
{
private ArrayList<Card> cards = new ArrayList<Card>();
private int position = 0;


public Deck()
 {
String[] suits = {"hearts","clubs","diamonds","spades"};

for(int c = 0; c < suits.length ; c++)
 {
  String aSuit = suits[c];
  for(int x = 1; x <= 13; x++)    {
    String fileName = aSuit + "-" + x;
    Card aCard = new Card(x,aSuit);
    cards.add(aCard);
  }
}
}//end constructor
```

```java
public Card drawCard()
{
Card c = cards.get(position);
position++;
if(position == 51)
  position = 0;
return c;
}//end drawCard


public void shuffle()
{
Random r = new Random();
for(int x = 0; x < 52; x++)
{
  int y = r.nextInt(52);
  Card tempCard = cards.get(x);
  Card randomCard = cards.get(y);
  cards.set(x,randomCard);
  cards.set(y,tempCard);
  }
}//end shuffle

public String toString()
{
 String s = "DECK:\n";
 for(int i = 0; i < cards.size(); i++)
   s = s + cards.get(i) + "\n";
 return s;
}
 }//end toString
```

```java
public class Card
{
private int value;
private String suit;

public Card(int a, String s)
{
value = a;
suit = s;
}

public void setValue(int x)
{value = x;}
public int getValue()
{return value;}
public void setSuit(String s)
{ suit = s;}
public String getSuit()
{ return suit;}

public String toString()
{
String name;
if(value == 1)
  name = "Ace";
else if(value == 11)
  name = "Jack";
else if(value == 12)
  name = "Queen";
else if(value == 13)
  name = "King";
else
  name = ""+value;

return name + " of " + suit;
}

public String mediaName()
{return suit + "-" + value;}

}//end class Card
```

Playing a WAV sound file

Imported library classes:
- java.io.File
- javax.sound.sampled.Clip
- javax.sound.sampled.AudioSystem
- javax.sound.sampled.AudioInputStream

```
try{

File sound = new File("sound.wav");
Clip clip = AudioSystem.getClip();
clip.open(AudioSystem.getAudioInputStream(sound));
clip.start();
Thread.sleep(2000);

} catch(Exception e) {System.out.println("Error");}
```

Pause execution for 2 seconds (2000 milliseconds) Not needed if your application doesn't terminate immediately

Loading an Image file

Imported library classes:
- java.awt.Image
- javax.swing.ImageIcon
- javax.imageio.ImageIO
- java.io.File

Declare variable containing your icon outside the try..catch block if you intend to use it outside that block.

```
ImageIcon icon = new ImageIcon();
try
{
File imageFile = new File("media/" + s + ".jpg");
Image img1 = ImageIO.read(imageFile);
icon = new ImageIcon(img1);
}
catch(Exception e) {System.out.println("Error loading image"); }
```

```java
public static void main(String[] args)
{
HighLow game = new HighLow();
game.setDefaultCloseOperation(JFrame.EXIT_ON_CLOSE);
game.setSize(900,250);
game.setVisible(true);
}//end main
```