

Lab – Song (Reducing Redundancy)

Reduce, reuse, recycle doesn't just apply to plastics. Programmers try their best to reduce the amount of redundancy in their code by creating methods that can be called multiple times to invoke a series of statements without having to rewrite them all.

In this lab, we are going to print out the lyrics to your favorite song; however, the chorus should not be repeated in SOP statements. Instead you will use methods to repeat lyrics that appear in the song more than once.

For example, the children's song "I'm a nut" could be coded like this:

```
public class ImANutMain
{
    public static void main(String[] args)
    {
        System.out.println("I'm an acorn, small and round \n" +
                           "Lying on the cold, cold ground \n" +
                           "Everyone walks over me \n" +
                           "That is why I'm cracked you see");

        chorus();
        System.out.println("Called myself on the telephone \n" +
                           "Just to hear my golden tone \n" +
                           "Asked me out for a little date \n" +
                           "Picked me up about half past eight");

        chorus();
        System.out.println("Took myself to the movie show \n" +
                           "Stayed too late and said \"Let's go\" \n" +
                           "Took my hand and led me out \n" +
                           "Drove me home and gave a shout!");

        chorus();
    }

    public static void chorus()
    {
        System.out.println();
        System.out.println("I'm a nut!?");
        System.out.println("I'm a nut!?");
        System.out.println("I'm crazy!");
        System.out.println();
    }
}
```

The output looks like this:

```
I'm an acorn, small and round
Lying on the cold, cold ground
Everyone walks over me
That is why I'm cracked you see
```

```
I'm a nut!?
I'm a nut!?
I'm crazy!
```

```
Called myself on the telephone
Just to hear my golden tone
Asked me out for a little date
Picked me up about half past eight
```

```
I'm a nut!?
I'm a nut!?
I'm crazy!
```

```
Took myself to the movie show
Stayed too late and said "Let's go"
Took my hand and led me out
```

Drove me home and gave a shout!

I'm a nut!?

I'm a nut!?

I'm crazy!