

Wrap a Primitive and Format Numbers

1. When you need to treat a primitive like an object, wrap it.
2. Boolean, Character, Byte, Short, Integer, Long, Float, Double.

```
//wrapping a value.  
int i = 288;  
Integer iWrap = new Integer(i);  
//unwrapping a value  
int unwrapped = iWrap.intValue();
```

3. Wrappers have static utility methods

```
//Convert a String to a primitive value  
String s = "345";  
int x = Integer.parseInt(s); //x == 345  
String t = "34x";  
int y = Integer.parseInt(t); //NumberFormatException  
  
//Two ways to convert a double into a string.  
double d = 42.5;  
String doubleStr = "" + d;  
String doubleStr2 = Double.toString(d);
```

4. Number Formatting

```
String formattedInt = String.format("%, d", 1000000000);  
//-> 1,000,000,000  
String formattedSentence = String.format("I have %, .2f bugs  
to fix.", 4756982.26874);  
//-> I have 4,756,982.27 bugs to fix.  
int one = 21595413;  
double two = 125484.215496;  
String formattedSentence2 = String.format("The rank is %,d  
out of %, .2f", one, two);  
//The rank is 21,595,413 out of 125,484.22
```