

**Strings Worksheet: middleCharacters and removeFirstWord**

1. In an appropriately named class, write a `static` method named `middleCharacters` that takes in a `String` parameter and returns a `String` that is:
- the **middle character**, if the word has an odd number of characters;
  - the **middle two characters** if the word has an even number of characters.

You do not need to test if the input `String` parameter is `null`; however, for the more advanced programmer, account for the case where the input `String` parameter is an empty string. Use only the `String` methods `length`, and `substring`.

The following is example test code you can insert into the `main` method in the same class:

```
System.out.println(middleCharacters("12345"));
System.out.println(middleCharacters("abcdef"));
System.out.println(middleCharacters("x"));
System.out.println(middleCharacters("xy"));
System.out.println(middleCharacters("Hello World!"));
//System.out.println(middleCharacters("")); // Advanced
```

And the output expected from the above test code is:

```
3
cd
x
xy
W
```

*After you have tested your code*, copy your completed code in the space below:

**Strings Worksheet: middleCharacters and removeFirstWord**

2. Write a static method named `removeFirstWord` that takes in a `String` parameter and returns a `String` that is the same as the input string, except has the first word removed. For this exercise, you can assume the first and second word are separated by a single space character. Use only the `String` class methods `indexOf` and `substring`, and no other library methods. You must take into account the possibility of the input `String` only containing a single word, or being an empty string. You do not need to check for a `null` input. The following is example test code:

```
System.out.println(removeFirstWord("Hello World!"));
System.out.println(removeFirstWord("Only two words. "));
System.out.println(removeFirstWord("Emptystring"));
System.out.println(removeFirstWord(" Two words. "));
```

And the output expected from the above test code is:

```
World!
two words.

Two words.
```

Write your completed code in the space below: