- 1- Print all numbers from 1 to N that is divisible by both 3 and 5.
- 2- Print "Even" if N is even. Print "Odd" if N is odd.
- 3- Print the are of the and the circumference of circle with given diameter.
- 4- Determine number of decimal digits in an unsigned integer. For example, 9 is a single digit, 66 has 2 digits and 128685 has 6 digits.
- 5- Find the given s is palindrome or not.
- 6- Find the given integer n is prime or not.
- 7- Create an ten by ten matrix(all elements are 0 win that matrix) and place 5 different 1's in that array randomly. (You should watch out for not selecting same place again and again.)
- 8- Given an array of integers, return a new array such that each element at index i of the new array is the product of all the numbers in the original array except the one at i.

Solve it without using **division and in O(n) time** (O(n) time means that you can not use a loop inside the any loop).

For example, if our input was [1, 2, 3, 4, 5], the expected output would be [120, 60, 40, 30, 24]. If our input was [3, 2, 1], the expected output would be [2, 3, 6].

- 9- Given an integer, convert it to a roman numeral. Number will be between 1 and 3999. For example, 41 is "XLI" and 4 is "IV".
- 10- Given a string of round, curly, and square open and closing brackets, return whether the brackets are balanced (well-formed).

For example, given the string "([])[]({})", you should return true. Given the string "([)]" or "((()", you should return false.

11- You will be given a number and you will need to return it as a string in Expanded Form.

```
expandedForm 12 - Should return '10 + 2'
expandedForm 42 - Should return '40 + 2'
expandedForm 70304 - Should return '70000 + 300 + 4'
```

Sources <u>codeforces.com</u> and <u>leetcode.com</u>. Highly recommended two websites for improving your swift knowledge. Plus, some of these questions asked as interview questions at big companies in Silicon Valley like Facebook or Google.