4. Based on your observations of the output and research, answer the following questions

a.Explain what the prompt () does in the first line of the code.

ANS: It helps the user to input the value of the text that is within().

b.What was returned to the console when you enter userInput ?

ANS:786 was returned to the console which I selected as my lucky number.

c. What is the type of userInput?

ANS:The type of user input is string.

d.What does alert() do in the last line of code?

ANS: The alert() displays an alert box which contains a message that 'This page says Your lucky number is 786' and an OK button and it helps to let the information come to the user.

5. Based on your observations of the output and research, answer the following questions

a. Try Math.random() multiple times in and console an explain what the Math.random() does in the second line of code.

ANS: It just returns the randoms numbers between 0 and 1 to the console.

b. Try Math.round(0.3), Math.round(0.6), Math.round(1.1), and explain what the Math.round() does in the third line of code.

ANS: Math.round() assigns the value of the console which is done by rounding off to the nearest value of integer like for (0.3) is 0, (0.6) is 1 and for (1.1) is 1. So, from this it is clear that Math.round rounds off the number to the nearest integer.

c. Why can the combination of the second and third line of code generate random binary numbers?

ANS: Because it is shown in the code that firstly there will be the round off of the random number and after it will be converted into random binary numbers.

d. Is it possible to generate other types of random numbers with some modification from the second line of code?

ANS: Yes, by simply writing let x= Math.Random(), we can also generate the random number.