## C# Assignments on Arrays & Strings

## **Array Manipulations**

Assignment 1. Write C# programs on Matrix addition, Matrix Multiplication and Matrix Transpose.

Assignment 2. Write C# programs to sort an array using bubble sort and insertion sort.

Assignment 3. Write C# programs to search an array using linear search and binary search.

Assignment 4. Array Calculations: write C# programs for finding median, mode value, highest, second highest and duplicate elements in an array.

## **String Manipulations**

Assignment 5. Write a C# programs to count vowels, consonants and special characters.

Assignment 6. Write a C# program to reverse a string.

Assignment 7. Write a C# program to find substring occurrence within a main string.

Assignment 8. Write a C# program to convert string to uppercase, lowercase, and title case.

Assignment 9. Write a C# program to remove whitespace from a string.

Assignment 10. Write a C# program to replace all occurrences of a substring.

Assignment 11. Write a C# program to find the longest word in a sentence.

Assignment 12. Write a C# program to count words in a sentence.

Assignment 13. Write a C# program to remove duplicate characters from a string.

Assignment 14. Write a C# program to check if two strings are anagrams.

Assignment 15. Write a C# program to find the frequency of each character in a string.

Assignment 16. Write a C# program to find the first non-repeating character in a string.

Assignment 17. Write a C# program to reverse words in a sentence.

Assignment 18. Write a C# program to check if a string contains only digits.