MCE Society’s

Allana Institute of Computer Application and IT

MCA-II Year (Sem-III)

**C# Assignment – 1**

Date: 28/08/2024

Submit till: 07/09/2024

Note: 1- The assignments should be handwritten.

2- Show executables in the Practical Lab.

3- Assume suitable class, function, and variable names

1. Write a Program to display a cube of a number. (Simple class & Main()).
2. Write a Program to compare two numbers and display a greater number (IF-Else).
3. Write a Program to display a table of 5. (for loop).
4. Write a Program to display a table of 5. (while loop).
5. Write a Program to display the reverse of a Number and String. (Using built-in function).
6. Write a program to display a table of user-defined numbers. (ReadLine() & Convert()).
7. Write a Program to display a table of 5 using a while loop (WHILE loop).
8. Write a Program to display the day name; if the variable value is 1, then display Monday; if the variable value is 2, then display Tuesday and vice versa …… (switch).
9. Write a program to Find the Length of the Array.
10. Write a program to Reverse an Array.
11. Write a program to Search an Element in an Array.
12. Write a Program to create **DemoCalculator** with sq(int a), cub(int a), area(int h, int w). create an object name as obj and access all the internal methods.
13. Write a program to Illustrate the use of Access Modifiers (public, private, protected and internal(C#’s Default))
14. Write a Program to create a class Employee with a Constructor taking and setting basic, ta, and da. Display the salary of an employee.
15. Write a Program to create a class **MyBase** with the function returning SimpleInterest(). Create a class **Mydrived** with the function returning CompoundInterest(). Inherit the base class in the derived class. Create the object of the derived class and print the simple and compound interests for 8 years at 10% interest rate.
16. Write a program to demonstrate Multilevel Inheritance.
17. Write a program to demonstrate the area of square and area of rectangle **overloading** Area() function.
18. Write a program to demonstrate the area of the square and area of a rectangle **overloading** the Area() function; further write and demonstrate the **override** of the Area() function to calculate the area of a circle.
19. Write a program that prompts the user for three names of people and stores them in an array of Person-type objects. To do this, first create a Person class that has a Name property of type string, a constructor that receives the name as a parameter, and a destructor that assigns the name to empty and overwrites the ToString () method. End the program by reading the people and executing the ToString () method on screen.
20. Write a program demonstrating a method returning an object to calculate area.

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Subject Teacher