

MIT Academy of Engineering, Alandi(D)

School of Electrical Engineering

Class :T.Y.BTech (B2 Block) - Electronics

A.Y.2017-18- Term I

Course : Embedded System Design

Activity 1: Basics of C fundamental

Date : 20/10/2018

## A) Basic Programs of C

1. Write a program to print "HELLO WORLD".
2. Write a program to Add two no take from the user.
3. Write a program to calculate area of Rectangle.
4. Write a program to swap to no. using third variable.
5. Write a program to calculate area and circumference of circle and radius is 5.6.
6. Write a program to calculate average marks of five subject and also calculate the percentage.
7. Write a program to find out simple interest.

## B) IF-ELSE PROGRAM

1. Write a program to find whether a given no is leap year or not.
2. Write a program to print to find no is odd or even
3. Write a program to convert capital A to small a.
4. Write a program to find out largest no of three variable.

## C) LOOPING PROGRAM

1. Write a program to print 1 to 100 ,A-Z, 500 -400
2. Write a program to reverse no .i/p – 123 o/p -321
3. Write a program to print table no given by user
4. Write a program to print FABONNIC series eg – 0 1 1 2 3 5 8 13
5. Write a program to print pattern  
\* \*\*\* a \*  
\*\* \*\* a b \*\*\*  
\*\*\* \* a b c \*\*\*\*\*
6. Write a program to print factorial and power of no.Number take from user
7. Write a program to that convert upper case to lower case.
8. C program to print all even and odd numbers from 1 to N.
9. Write a program to find no is prime or not.

## D) ARRAY PROGRAM

1. Write a program to print 1 to 20 using array.
2. Write a program to find largest element in an array.
3. Write a program to add two array and store in third array
4. Write a program to concatenate two array
5. Write a program to print matrix
6. Write a program multiple two matrix.
7. Write a program to find smallest element in matrix
8. Write a program to transpose matrix

## E) STRING PROGRAM

1. Write program to to ask user name and print
2. Write a program calculate string length.
3. Write program to compare two string
4. Write program to reverse string
5. Write a program to take string gets and puts in library function

## F) FUNCTION PROGRAM

1. Write a program to convert binary number in to decimal.
2. Write a program to reverse a number, if i/p 123 then o/p 321.
3. Write a program to convert decimal number in to binary.
4. Write a program to make simple calculator if I press 1 to add, press 2 to subtract, press 3 to multiple, press 4 to divide using function who takes a argument and return ans.
5. Write a program to check whether number is palindrome or not.
6. Write a program to swap two value using third variable.
7. Write a program to convert hexa decimal number in to decimal.
8. Write a program to implement pass array element to function.
9. Write a program to calculate power of a number using recursion

## G) POINTER AND Structure program

1. Write a program to add two value using pointer.
2. Write a program calculate string length using pointer.
3. Write a program to print array element using pointer.
4. Write a program to array of pointer
5. Write a program to pointer to array.
6. Write a program to make structure of student record.
7. Write a program to make structure of five student record.
8. Write a program to access structure element using pointer

## H) FILE HANDLING.

1. Write a program to write "hello world" in file.
2. Write a program to read data from a file.
3. Write a program to copy one file to other file.

## I) Miscellaneous

1. What is array of pointer and pointer to array
2. What is const and volatile keyword
3. What is Dynamic memory Allocation .Implement it.

## J) Explain

1. `Int *arr[5];`
2. `Int *(array)[5];`
3. `Void read ( int l ,char c, float f );`
4. `Float my_fun (int l , intj,int k);`
5. `Int * power (int l ,int k ,float f);`
6. `Char *(func) (intl,char m ,char j);`
7. `Intmy_func(char str[5],int i);`