**PROGRAM 2 (i) : RECURSIVE GCD**

**#include <stdio.h>**

**int GCD(int , int );**

**int main()**

**{**

**int num1, num2,res;**

**printf("\nENTER TWO NUMBERS : ");**

**scanf("%d %d", &num1, &num2);**

**res=GCD(num1,num2);**

**printf("GCD OF %d AND %d = %d",num1,num2,res);**

**return 0;**

**}**

**int GCD(int x, int y)**

**{**

**int rem;**

**rem=x%y;**

**if(rem==0)**

**{**

**return y;**

**}**

**else**

**{**

**return (GCD(y,rem));**

**}**

**}**

**OUTPUT:**

