Aim:

Write a program to find the `gcd` (Greatest Common Divisor) of a given two numbers using recursion process.

The greatest common divisor (`gcd`) of two or more integers, when at least one of them is not zero, is the largest positive integer that is a divisor of both numbers.

At the time of execution, the program should print the message on the console as:

```
Enter two integer values :
```

For example, if the user gives the **input** as:

```
Enter two integer values : 12 18
```

then the program should **print** the result as:

```
The gcd of two numbers 12 and 18 = 6
```

Note: Write the recursive function **gcd()** in `Program906a.c`.

Source Code:

Program906.c

```c
#include <stdio.h>
#include "Program906a.c"
void main() {
    int a, b;
    printf("Enter two integer values : ");
    scanf("%d %d", &a, &b);
    printf("The gcd of two numbers %d and %d = %d\n", a, b, gcd(a, b));
}
```

Program906a.c

```c
int gcd(int n1,int n2);
int gcd(int n1,int n2){
    if(n2!=0)
    return gcd(n2,n1%n2);
    else
    return n1;
}
```

Execution Results - All test cases have succeeded!

Test Case - 1
User Output
Enter two integer values : 12 15
The gcd of two numbers 12 and 15 = 3

Test Case - 2
User Output
Enter two integer values : 36 124
The gcd of two numbers 36 and 124 = 4