

```
1 // Ch 6 Demo Euclid's GCD algorithm
2
3 import java.io.BufferedReader ;
4 import java.io.InputStreamReader ;
5 import java.io.IOException ;
6
7 public class Ch6DemoEuclidsGCD
8 {
9     public static void main(String [] args) throws IOException
10    {
11        BufferedReader console = new BufferedReader (new
12            InputStreamReader (System.in));
13        System.out.print("Please enter an integer: " );
14        String input1 = console.readLine ();
15
16        System.out.print ("\nPlease enter another integer: " );
17        String input2 = console.readLine ();
18
19        int num1 = Integer.parseInt (input1);
20        int num2 = Integer.parseInt (input2);
21
22        int rem = 1;
23        int gcd = 0;
24
25        while (rem != 0)
26        {
27            rem = num1 % num2;
28
29            if (rem == 0)
30            {
31                gcd = num2;
32            }
33            else
34            {
35                num1 = num2;
36                num2 = rem;
37            }
38        }
39
40        System.out.println ("\nThe greatest common divisor is: " + gcd);
41    }
42 }
```