

```

1)public class Main
{
    public static long factorial(int i)
    {
        return (i < 1) ? 1 : i * factorial(i - 1);
    }

    public static void main(String[] args)
    {
        System.out.println("Author:D.Aditya Varma\nSAP ID:51834693");
        int i = 5;
        System.out.println("The Factorial of " + i + " is " + factorial(i));
    }
}

```

input:

The screenshot shows a Firefox browser window with the title 'GDB online Debugger | Compiler - Code, Compile, Run, Debug online C, C++ - Mozilla Firefox'. The address bar shows the URL 'https://www.onlinegdb.com'. The main content area displays a Java code editor with the following code:

```

Main.java
1 public class Main
2 {
3     public static long factorial(int i)
4     {
5         return (i < 1) ? 1 : i * factorial(i - 1);
6     }
7
8     public static void main(String[] args)
9     {
10        System.out.println("Author:D.Aditya Varma\nSAP ID:51834693");
11        int i = 5;
12        System.out.println("The Factorial of " + i + " is " + factorial(i));
13    }
14 }

```

output:

The screenshot shows the same Firefox browser window after running the Java code. The terminal output on the right side of the screen shows:

```

Input
Author:D.Aditya Varma
SAP ID:51834693
The Factorial of 5 is 120

...Program finished with exit code 0
Press ENTER to exit console []

```

On the right margin of the terminal window, there is a vertical list of words: '3), abst', 'react', 'class', 'S', 'Bank', '{', 'abst', 'react', 'int'. These words are likely artifacts from the browser's rendering or a specific configuration.

```

getBalance();
}
class BankA extends Bank
{
int deposit=100;
int getBalance()
{
return deposit;
}
}
class BankB extends Bank
{
int deposit=150;
int getBalance()
{
return deposit;
}
}
class BankC extends Bank
{
int deposit=200;
int getBalance()
{
return deposit;
}
}
class Main
{
public static void main(String args[])
{
System.out.println("Author:D.Aditya Varma\nSAP ID:51834693");
//object for Bank A
BankA i=new BankA();
System.out.println("Balance in Bank A: "+i.getBalance());

//object for Bank B
BankB j=new BankB();
System.out.println("Balance in Bank B: "+j.getBalance());

//object for Bank C
BankC k=new BankC();
System.out.println("Balance in Bank C: "+k.getBalance());
}
}

```

input:

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GDB online Debugger | Compiler - Code, Compile, Run, Debug online C, C++ - Mozilla Firefox

https://www.onlinegdb.com

```
Man.java
1 abstract class Bank
2 {
3     abstract int getBalance();
4 }
5 class BankA extends Bank
6 {
7     int deposit=100;
8     int getBalance()
9     {
10         return deposit;
11     }
12 }
13 class BankB extends Bank
14 {
15     int deposit=150;
16     int getBalance()
17     {
18         return deposit;
19     }
20 }
21 class BankC extends Bank
22 {
23     int deposit=200;
24     int getBalance()
25     {
26         return deposit;
27     }
28 }
29 class Main
30 {
31     public static void main(String args[])
32     {
33         System.out.println("Author:D.Aditya Varma\nSAP ID:51834693");
34         BankA i=new BankA();
35         BankB j=new BankB();
36         BankC k=new BankC();
37         System.out.println("Balance in Bank A: "+i.getBalance());
38         //Object for Bank B
39         BankB j=new BankB();
40         System.out.println("Balance in Bank B: "+j.getBalance());
41         //Object for Bank C
42         BankC k=new BankC();
43         System.out.println("Balance in Bank C: "+k.getBalance());
44     }
45 }
46 }
```

output:

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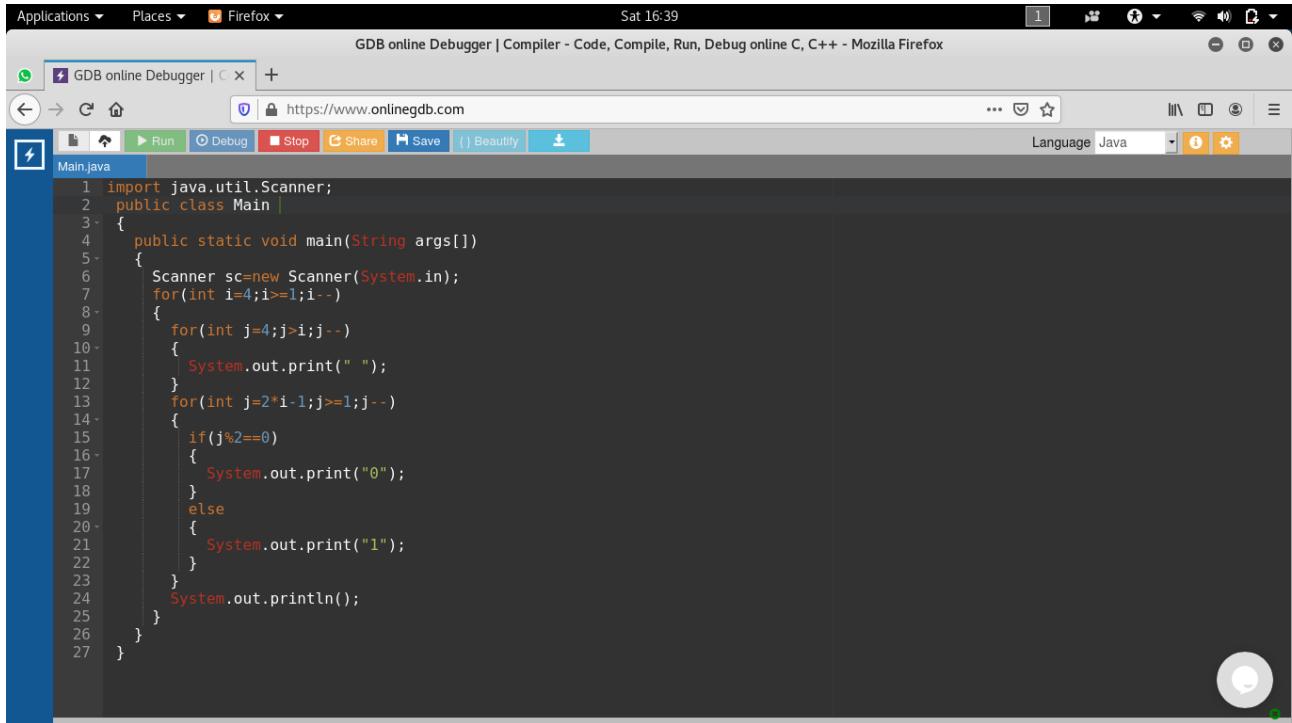
https://www.onlinegdb.com

Author:D.Aditya Varma  
SAP ID:51834693  
Balance in Bank A: 100  
Balance in Bank B: 150  
Balance in Bank C: 200

...Program finished with exit code 0  
Press ENTER to exit console.

```
import java.util.Scanner;
class Pattern
{
    public static void main(String args[])
    {
        Scanner sc=new Scanner(System.in);
        for(int i=4;i>=1;i--)
        {
            for(int j=4;j>i;j--)
            {
                System.out.print(" ");
            }
            for(int j=2*i-1;j>=1;j--)
            {
                if(j%2==0)
                {
                    System.out.print("0");
                }
                else
                {
                    System.out.print("1");
                }
            }
            System.out.println();
        }
    }
}
```

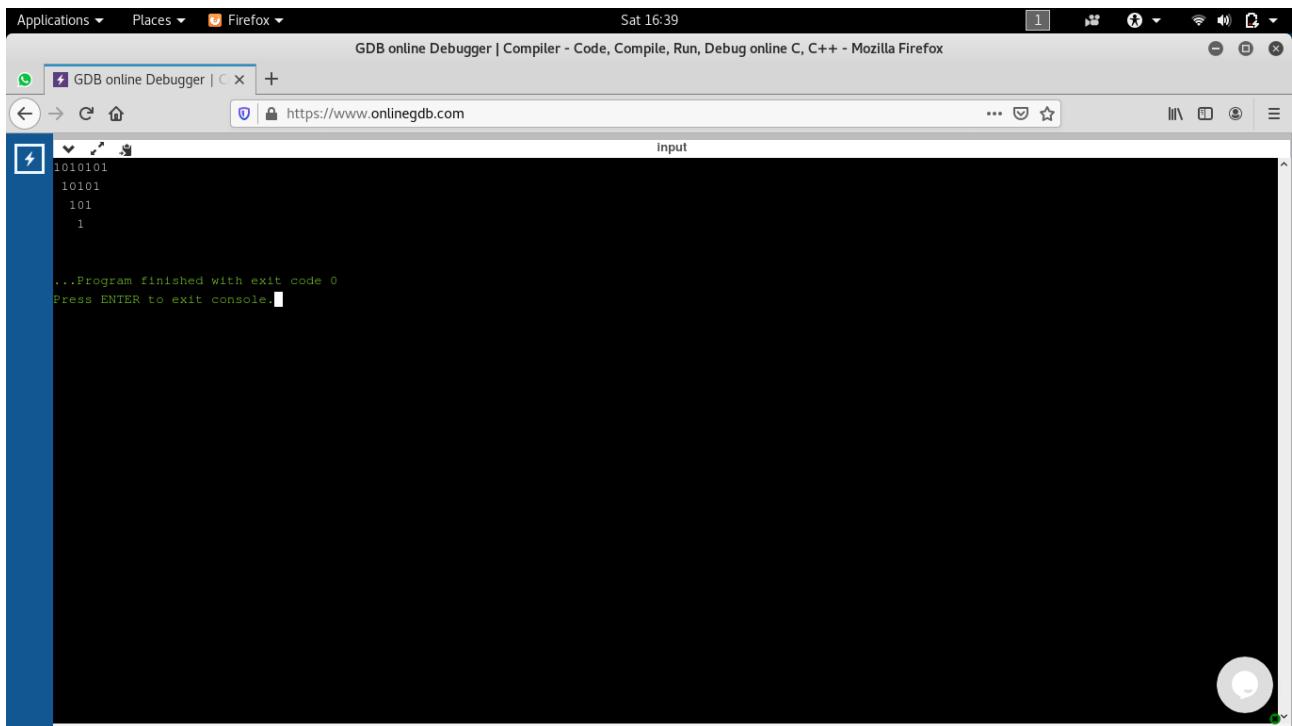
input:



The screenshot shows a Firefox browser window titled "GDB online Debugger | Compiler - Code, Compile, Run, Debug online C, C++ - Mozilla Firefox". The URL is https://www.onlinegdb.com. The main content area displays a Java code editor with the file name "Main.java". The code prints a pattern of binary digits (0s and 1s) to the console. The code is as follows:

```
1 import java.util.Scanner;
2 public class Main {
3 {
4     public static void main(String args[])
5     {
6         Scanner sc=new Scanner(System.in);
7         for(int i=4;i>=1;i--)
8         {
9             for(int j=4;j>i;j--)
10            {
11                System.out.print(" ");
12            }
13            for(int j=2*i-1;j>=1;j--)
14            {
15                if(j%2==0)
16                {
17                    System.out.print("0");
18                }
19                else
20                {
21                    System.out.print("1");
22                }
23            }
24            System.out.println();
25        }
26    }
27 }
```

output:



The screenshot shows the same Firefox browser window as the previous screenshot, but now displaying the program's output. The output window is titled "Input" and shows the following text:

```
1010101
10101
101
1
```

...Program finished with exit code 0  
Press ENTER to exit console.