LAB 3

Q. Create a class Book which contains four members: name, author, price, num_pages. Include a constructor to set the values for the members. Include methods to set and get the details of the objects. Include a toString( ) method that could display the complete details of the book. Develop a Java program to create n book objects.

PROGRAM:

```
import java.util.Scanner;
class Book{
        String name;
        String author;
        double price;
        int num_pages;
        Scanner in = new Scanner(System.in);

        Book(){
                System.out.println("Enter the name of the Book: ");
                name = in.nextLine();
                System.out.println("Enter the author of the Book: ");
                author = in.nextLine();
                System.out.println("Enter the price of the Book: ");
                price = in.nextDouble();
                System.out.println("Enter the number of pages of the Book: ");
                num_pages = in.nextInt();
                System.out.println();
        }

        void display(){
                System.out.println("----BOOK-----");
                System.out.println("Name--> "+name);
```

```java
            System.out.println("Author--> "+author);
            System.out.println("Price--> "+price);
            System.out.println("Number of pages--> "+num_pages);
        }


    public String toString(){
            return (" Name: "+name+" | Author: "+author+" | Price: "+price+" | Number of pages: "+num_pages);
        }
}


class Lab3{
    public static void main(String args[]){
            Scanner in = new Scanner(System.in);
            System.out.println("Enter the number of Books: ");
            int n = in.nextInt();
            System.out.println();
            Book ob[] = new Book[n];
            for(int i=0;i<n;i++)
            {
                    System.out.println("Book "+(i+1));
                    ob[i] = new Book();
            }
            for(int i=0;i<n;i++)
            {
                    System.out.print("Book "+(i+1)+"--> ");
                    System.out.println(ob[i]);
            }
            System.out.println();
            System.out.println("Enter the book number to display: ");
            int x = in.nextInt();
```
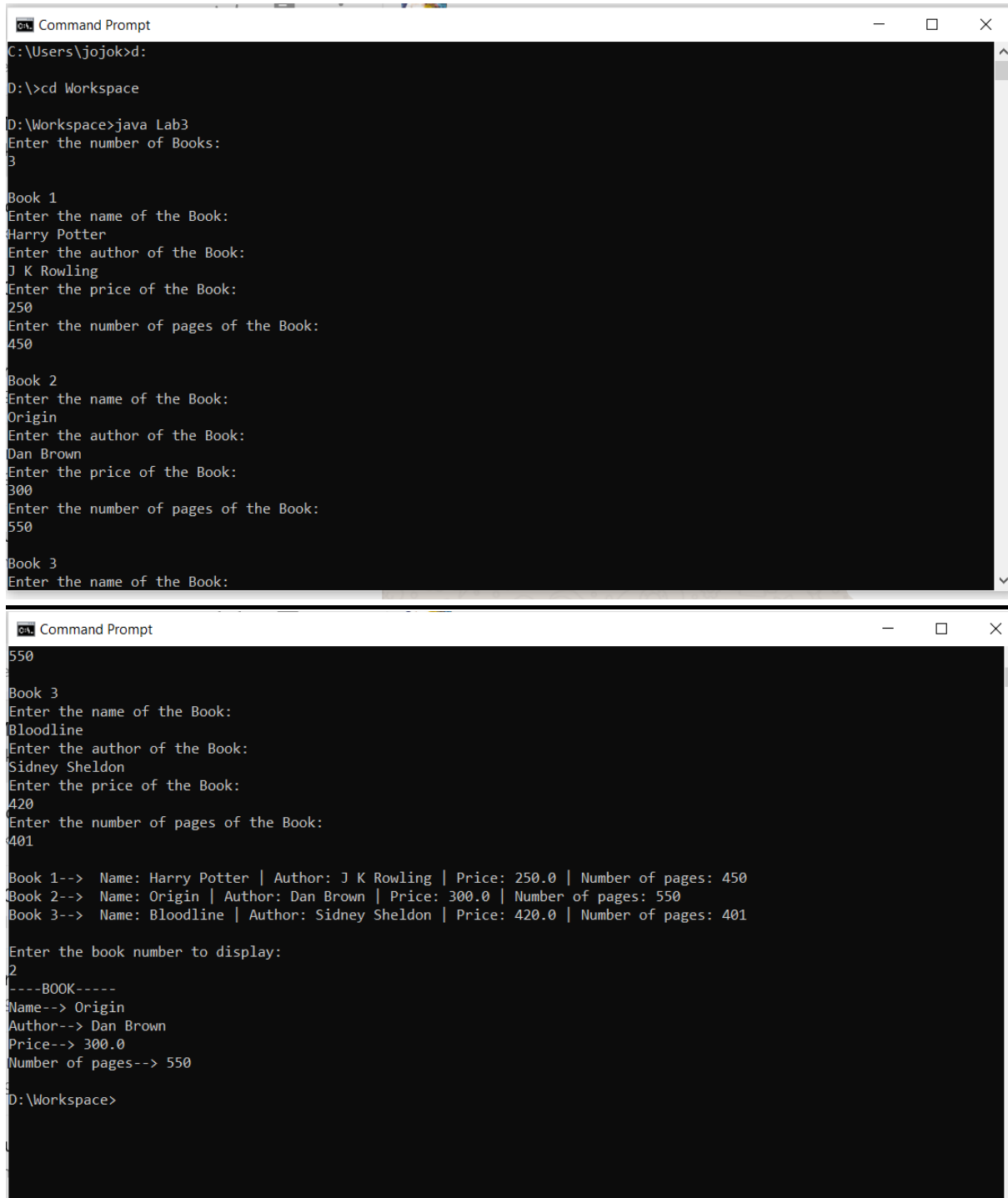
```
            ob[x-1].display();


        }
}
```

OUTPUT:


```
Command Prompt                                                    —   □   ×
C:\Users\jojok>d:

D:\>cd Workspace

D:\Workspace>java Lab3
Enter the number of Books:
3

Book 1
Enter the name of the Book:
Harry Potter
Enter the author of the Book:
J K Rowling
Enter the price of the Book:
250
Enter the number of pages of the Book:
450

Book 2
Enter the name of the Book:
Origin
Enter the author of the Book:
Dan Brown
Enter the price of the Book:
300
Enter the number of pages of the Book:
550

Book 3
Enter the name of the Book:
```



```
Command Prompt                                                    —   □   ×
550

Book 3
Enter the name of the Book:
Bloodline
Enter the author of the Book:
Sidney Sheldon
Enter the price of the Book:
420
Enter the number of pages of the Book:
401

Book 1-->  Name: Harry Potter | Author: J K Rowling | Price: 250.0 | Number of pages: 450
Book 2-->  Name: Origin | Author: Dan Brown | Price: 300.0 | Number of pages: 550
Book 3-->  Name: Bloodline | Author: Sidney Sheldon | Price: 420.0 | Number of pages: 401

Enter the book number to display:
2
----BOOK-----
Name--> Origin
Author--> Dan Brown
Price--> 300.0
Number of pages--> 550

D:\Workspace>
```