

```

Book.java x player.java x
1  import java.util.*;
2  class Player
3  {
4      String id,name;
5      double scores,avg;
6      int no_matches_played;
7      Player()
8      {
9          id="";
10         name="";
11         scores=0;
12         no_matches_played=0;
13     }
14     void accept(int a)
15     {
16         Scanner sc=new Scanner(System.in);
17         System.out.println("enter details of player "+a);
18         System.out.println("Enter id");
19         id=sc.next();
20         System.out.println("Enter name");
21         name=sc.next();
22         System.out.println("Enter scores");
23         scores=sc.nextDouble();
24         System.out.println("Enter number of matches played");
25         no_matches_played=sc.nextInt();
26     }
27
28
29     void calculate()
30     {
31         if(no_matches_played!=0)
32             avg=scores/no_matches_played;
33         else
34             System.out.println("Average=0");
35     }
36
37
38
39     void display()
40     {
41         System.out.println("Id= "+id);
42         System.out.println("Name= "+name);
43         System.out.println("Scores= "+scores);

```

```

Book.java x player.java x
41         System.out.println("Id= "+id);
42         System.out.println("Name= "+name);
43         System.out.println("Scores= "+scores);
44         System.out.println("Number of matches played= "+no_matches_played);
45         System.out.println("Average= "+avg);
46
47
48     }
49
50
51 }
52 class Player1
53 {
54     public static void main(String [] args)
55     {
56         Player ob1=new Player();
57         Player ob2=new Player();
58         ob1.accept(1);
59         ob2.accept(2);
60         ob1.calculate();
61         ob2.calculate();
62         if(ob1.avg==ob2.avg)
63         {
64             System.out.println("Both player 1 and player 2 average is same");
65             ob1.display();
66             System.out.println("-----");
67             ob2.display();
68         }
69         else if(ob1.avg>ob2.avg)
70         {
71             System.out.println("Player 1 has higher average");
72             ob1.display();
73         }
74         else
75         {
76             System.out.println("Player 2 has higher average");
77             ob2.display();
78         }
79     }
80
81
82 }
83 }

```

```
[Arvinds-MacBook-Pro:ooj Arvind$ java Player1
enter details of player 1
Enter id
abcd
Enter name
aaa
Enter scores
40
Enter number of matches played
4
enter details of player 2
Enter id
abcde
Enter name
aaaa
Enter scores
35
Enter number of matches played
4
Player 1 has higher average
Id= abcd
Name= aaa
Scores= 40.0
Number of matches played= 4
Average= 10.0
Arvinds-MacBook-Pro:ooj Arvind$
```

```
Book.java x
1  import java.util.*;
2  import java.lang.*;
3  class Book{
4      String bookid,booktitle,year_of_pub,author,publisher;
5      int no_of_pages;
6      double price;
7      Scanner sc=new Scanner(System.in);
8      Book()
9      {
10         bookid="";
11         booktitle="";
12         year_of_pub="";
13         author="";
14         publisher="";
15         no_of_pages=0;
16         price=0;
17     }
18     void book_details(int a)
19     {
20         System.out.println("enter bookid "+a);
21         bookid=sc.next();
22         System.out.println("enter booktitle "+a);
23         booktitle=sc.next();
24         System.out.println("enter year of publish "+a);
25         year_of_pub=sc.next();
26         System.out.println("enter name of author "+a);
27         author=sc.next();
28         System.out.println("enter the publisher "+a);
29         publisher=sc.next();
30         System.out.println("enter no of pages "+a);
31         no_of_pages=sc.nextInt();
32         System.out.println("enter the price "+a);
33         price=sc.nextDouble();
34     }
35     void display_details()
36     {
37         System.out.println("-----");
38         System.out.println("bookid:"+bookid);
39         System.out.println("booktitle:"+booktitle);
40         System.out.println("year of publish:"+year_of_pub);
41         System.out.println("author:"+author);
42         System.out.println("publisher:"+publisher);
43     }
44 }
```

```
Book.java x
43         System.out.println("publisher:"+publisher);
44         System.out.println("no of pages:"+no_of_pages);
45         System.out.println("price:"+price);
46     }
47 }
48 void author_name(Book b,Book b1,Book b2)
49 {
50     String name;
51     System.out.println("enter author name");
52     name=sc.next();
53     if(name.equals(b.author))
54         b.display_details();
55     else if(name.equals(b1.author))
56         b1.display_details();
57     else if(name.equals(b2.author))
58         b2.display_details();
59     else
60         System.out.println("invalid entry");
61 }
62 void most_expensive(Book b,Book b1,Book b2)
63 {
64     if(b.price>=b1.price&& b.price>=b2.price)
65         System.out.println("most expensive book: "+b.booktitle);
66     else if(b1.price>=b2.price&& b1.price>=b.price)
67         System.out.println("most expensive book: "+b1.booktitle);
68     else
69         System.out.println("most expensive book: "+b2.booktitle);
70 }
71 void count(Book b,Book b1,Book b2)
72 {
73     int c=0;
74     if(b.year_of_pub.equals("2020"))
75         c++;
76     if(b1.year_of_pub.equals("2020"))
77         c++;
78     if(b2.year_of_pub.equals("2020"))
79         c++;
80     System.out.println("the no of books published in 2020: "+c);
81 }
82 }
```

```

Book.java
81         + (b2.year_of_publications - 2020) *
82         C++;
83         System.out.println("the no of books published in 2020: "+c);
84
85
86
87
88     }
89     void least(Book b, Book b1, Book b2)
90     {
91         if (b.no_of_pages <= b1.no_of_pages && b.no_of_pages <= b2.no_of_pages)
92             System.out.println("least no of pages book: "+b.no_of_pages);
93         else if (b1.no_of_pages <= b2.no_of_pages && b1.no_of_pages <= b.no_of_pages)
94             System.out.println("least no of pages book: "+b1.no_of_pages);
95         else
96             System.out.println("least no of pages book: "+b2.no_of_pages);
97
98     }
99
100
101 }
102
103 class Book1
104 {
105     public static void main(String args[])
106     {
107         Book b, b1, b2, b3;
108         b = new Book();
109         b1 = new Book();
110         b2 = new Book();
111         b3 = new Book();
112         b1.book_details(1);
113         b2.book_details(2);
114         b3.book_details(3);
115         b.author_name(b1, b2, b3);
116         b.most_expensive(b1, b2, b3);
117         b.count(b1, b2, b3);
118         b.least(b1, b2, b3);
119
120
121
122     }
123 }

```

```

enter bookid 1
abcd
enter booktitle 1
kiterunner
enter year of publish 1
2020
enter name of author 1
khaled
enter the publisher 1
mcmillan
enter no of pages 1
300
enter the price 1
350
enter bookid 2
abcde
enter booktitle 2
mazerunner
enter year of publish 2
2020
enter name of author 2
aaaaa
enter the publisher 2
haaz
enter no of pages 2
500
enter the price 2
250
enter bookid 3
abcdef
enter booktitle 3
divergent
enter year of publish 3
2019
enter name of author 3
veronica
enter the publisher 3
newyork
enter no of pages 3
600
enter the price 3
350
enter author name
veronica
-----
bookid:abcdef
booktitle:divergent
year of publish:2019
author:veronica
publisher:newyork
no of pages:600
price:350.0
most expensive book: kiterunner
the no of books published in 2020: 2
least no of pages book: 300
Arvinds-MacBook-Pro:ooj Arvind$

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