

File

Edit

Source

Refactor

Navigate

Search

Project

Run

Window

Help

Package Explorer

CDAC NOIDA PGDAI ASSIGNMENT - 1

CDAC NOIDA PGDAI ASSIGNMENT - 2

CDAC NOIDA PGDAI ASSIGNMENT - 3

CDAC NOIDA PGDAI ASSIGNMENT - 4

CDAC NOIDA PGDAI ASSIGNMENT - 5

CDAC NOIDA PGDAI ASSIGNMENT - 6

CDAC NOIDA PGDAI ASSIGNMENT - 7

CDAC NOIDA PGDAI ASSIGNMENT - 8

src

(default package)

Assignment_8_qs_1.java

JRE System Library [jre]

~\$CDAC NOIDA_ PGDAI_ MODULE 7 _ JAVA PROGRAMMING

CDAC NOIDA_ PGDAI_ MODULE 7 _ JAVA PROGRAMMING

Assignment_8_qs_1.java

```
1 // Name : ADVAIT GURUNATH CHAVAN
2 // Email ID : advaitchavan135@gmail.com
3 // CDAC NOIDA JAVA PROGRAMMING Assignment 8 - Question - 1
4
5 import java.util.Arrays;
6 import java.util.List;
7 import java.util.stream.Collectors;
8
9 public class Assignment_8_qs_1 {
10     public static void main(String[] args) {
11         List<Integer> numbers = Arrays.asList(1, 2, 2, 3, 4, 4, 5);
12
13         // Using a lambda expression with stream to remove duplicates
14         List<Integer> distinctNumbers = numbers.stream()
15                                         .distinct()
16                                         .collect(Collectors.toList());
17
18         System.out.println("Distinct Numbers: " + distinctNumbers);
19     }
20 }
21
```

Task List

Find

All

Activate...

Outline

Assignment_8_qs_1

Problems

Javadoc

Console

```
<terminated> Assignment_8_qs_1 [Java Application] C:\Users\Advait\Desktop\SOFTWARES\eclipse-jee-2025-03-R-win32-x86_64\eclipse\plugins\org.eclipse.justj.openjdk.hotspot.jre.full.win32.x86_64_21.0.6.v20250130-
Distinct Numbers: [1, 2, 3, 4, 5]
```

Writable

Smart Insert

9 : 31 : 258

Desktop

01:13

12-06-2025

File Edit Source Refactor Navigate Search Project Run Window Help

Package Explorer

CDAC NOIDA PGDAI ASSIGNMENT - 1

CDAC NOIDA PGDAI ASSIGNMENT - 2

CDAC NOIDA PGDAI ASSIGNMENT - 3

CDAC NOIDA PGDAI ASSIGNMENT - 4

CDAC NOIDA PGDAI ASSIGNMENT - 5

CDAC NOIDA PGDAI ASSIGNMENT - 6

CDAC NOIDA PGDAI ASSIGNMENT - 7

CDAC NOIDA PGDAI ASSIGNMENT - 8

src

(default package)

Assignment_8_qs_1.java

Assignment_8_qs_2.java

JRE System Library [jre]

~\$CDAC NOIDA__ PGDAI__ MODULE 7 __ JAVA PROGRAMMING

CDAC NOIDA__ PGDAI__ MODULE 7 __ JAVA PROGRAMMING

Assignment_8_qs_1.java

Assignment_8_qs_2.java

```
1 // Name : ADVAIT GURUNATH CHAVAN
2 // Email ID : advaitchavan135@gmail.com
3 // CDAC NOIDA JAVA PROGRAMMING Assignment 8 - Question - 2
4
5 import java.util.function.BiFunction;
6
7 public class Assignment_8_qs_2 {
8     public static void main(String[] args) {
9         // Lambda expression to concatenate two strings
10         BiFunction<String, String, String> concatenator = (str1, str2) -> str1 + str2;
11
12         String result = concatenator.apply("Advait", "Chavan");
13         System.out.println("Concatenated String: " + result);
14     }
15 }
16
17
```

Task List

Find All Activate...

Outline

Assignment_8_qs_2

main(String[]) : void

Problems Javadoc Console

<terminated> Assignment_8_qs_2 [Java Application] C:\Users\Advait\Desktop\SOFTWARES\eclipse-jee-2025-03-R-win32-x86_64\eclipse\plugins\org.eclipse.justj.openjdk.hotspot.jre.full.win32.x86_64.v20250130-1

Concatenated String: AdvaitChavan

Type here to search

01:15 12-06-2025

File Edit Source Refactor Navigate Search Project Run Window Help

Package Explorer

CDAC NOIDA PGDAI ASSIGNMENT - 1

CDAC NOIDA PGDAI ASSIGNMENT - 2

CDAC NOIDA PGDAI ASSIGNMENT - 3

CDAC NOIDA PGDAI ASSIGNMENT - 4

CDAC NOIDA PGDAI ASSIGNMENT - 5

CDAC NOIDA PGDAI ASSIGNMENT - 6

CDAC NOIDA PGDAI ASSIGNMENT - 7

CDAC NOIDA PGDAI ASSIGNMENT - 8

src

(default package)

Assignment_8_qs_1.java

Assignment_8_qs_2.java

Assignment_8_qs_3.java

JRE System Library [jre]

~\$CDAC NOIDA_ PGDAI_ MODULE 7 _ JAVA PROGRAMMING

CDAC NOIDA_ PGDAI_ MODULE 7 _ JAVA PROGRAMMING _

Assignment_8_qs_1.java Assignment_8_qs_2.java Assignment_8_qs_3.java

```
1 // Name : ADVAIT GURUNATH CHAVAN
2 // Email ID : advaitchavan135@gmail.com
3 // CDAC NOIDA JAVA PROGRAMMING Assignment 8 - Question - 3
4
5 import java.util.Arrays;
6 import java.util.List;
7 import java.util.stream.Collectors;
8
9 public class Assignment_8_qs_3 {
10     public static void main(String[] args) {
11         List<Integer> numbers = Arrays.asList(1, 2, 3, 4, 5, 6, 7, 8, 9, 10);
12
13         // Lambda to filter even numbers
14         List<Integer> evenNumbers = numbers.stream()
15             .filter(n -> n % 2 == 0)
16             .collect(Collectors.toList());
17
18         // Lambda to filter odd numbers
19         List<Integer> oddNumbers = numbers.stream()
20             .filter(n -> n % 2 != 0)
21             .collect(Collectors.toList());
22
23         System.out.println("Even Numbers: " + evenNumbers);
24         System.out.println("Odd Numbers: " + oddNumbers);
25     }
26 }
27
```

Task List

Find All Activate...

Outline

Assignment_8_qs_3

Problems Javadoc Console

<terminated> Assignment_8_qs_3 [Java Application] C:\Users\Advait\Desktop\SOFTWARES\eclipse-jee-2025-03-R-win32-x86_64\eclipse\plugins\org.eclipse.justj.openjdk.hotspot.jre.full.win32.x86_64_21.0.6.v20250130-

Even Numbers: [2, 4, 6, 8, 10]

Odd Numbers: [1, 3, 5, 7, 9]

Writable Smart Insert

9 : 32 : 259

Desktop

01:16 12-06-2025

File Edit Source Refactor Navigate Search Project Run Window Help

Package Explorer

CDAC NOIDA PGDAI ASSIGNMENT - 1

CDAC NOIDA PGDAI ASSIGNMENT - 2

CDAC NOIDA PGDAI ASSIGNMENT - 3

CDAC NOIDA PGDAI ASSIGNMENT - 4

CDAC NOIDA PGDAI ASSIGNMENT - 5

CDAC NOIDA PGDAI ASSIGNMENT - 6

CDAC NOIDA PGDAI ASSIGNMENT - 7

CDAC NOIDA PGDAI ASSIGNMENT - 8

src

(default package)

Assignment_8_qs_1.java

Assignment_8_qs_2.java

Assignment_8_qs_3.java

Assignment_8_qs_4.java

JRE System Library [jre]

~\$CDAC NOIDA_ PGDAI_ MODULE 7 _ JAVA PROGRAMMING

CDAC NOIDA_ PGDAI_ MODULE 7 _ JAVA PROGRAMMING

Assignment_8_qs_1.java

Assignment_8_qs_2.java

Assignment_8_qs_3.java

Assignment_8_qs_4.java

```
1 // Name : ADVAIT GURUNATH CHAVAN
2 // Email ID : advaitchavan135@gmail.com
3 // CDAC NOIDA JAVA PROGRAMMING Assignment 8 - Question - 4
4
5 import java.util.Arrays;
6 import java.util.List;
7 import java.util.stream.Collectors;
8
9 public class Assignment_8_qs_4 {
10     public static void main(String[] args) {
11         List<String> words = Arrays.asList("Advait", "Cdac", "Chavan", "Noida");
12
13         // Convert to uppercase
14         List<String> uppercaseWords = words.stream()
15             .map(word -> word.toUpperCase())
16             .collect(Collectors.toList());
17
18         // Convert to lowercase
19         List<String> lowercaseWords = words.stream()
20             .map(word -> word.toLowerCase())
21             .collect(Collectors.toList());
22
23         System.out.println("Uppercase: " + uppercaseWords);
24         System.out.println("Lowercase: " + lowercaseWords);
25     }
26 }
27
```

Task List

Find All Activate...

Outline

Assignment_8_qs_4

main(String[]) : void

Problems

Javadoc

Console

<terminated> Assignment_8_qs_4 [Java Application] C:\Users\Advait\Desktop\SOFTWARES\eclipse-jee-2025-03-R-win32-x86_64\eclipse\plugins\org.eclipse.justj.openjdk.hotspot.jre.full.win32.x86_64_21.0.6.v20250130-

Uppercase: [ADVAIT, CDAC, CHAVAN, NOIDA]

Lowercase: [advait, cdac, chavan, noida]

Writable

Smart Insert

11 : 78 : 385

Desktop

01:19

12-06-2025

File Edit Source Refactor Navigate Search Project Run Window Help

Package Explorer

CDAC NOIDA PGDAI ASSIGNMENT - 1

CDAC NOIDA PGDAI ASSIGNMENT - 2

CDAC NOIDA PGDAI ASSIGNMENT - 3

CDAC NOIDA PGDAI ASSIGNMENT - 4

CDAC NOIDA PGDAI ASSIGNMENT - 5

CDAC NOIDA PGDAI ASSIGNMENT - 6

CDAC NOIDA PGDAI ASSIGNMENT - 7

CDAC NOIDA PGDAI ASSIGNMENT - 8

src

(default package)

Assignment_8_qs_1.java

Assignment_8_qs_2.java

Assignment_8_qs_3.java

Assignment_8_qs_4.java

Assignment_8_qs_5.java

JRE System Library [jre]

~\$CDAC NOIDA__ PGDAI__ MODULE 7 __ JAVA PROGRAMMING

CDAC NOIDA__ PGDAI__ MODULE 7 __ JAVA PROGRAMMING

Assignment_8_qs_5.java

```
1 // Name : ADVAIT GURUNATH CHAVAN
2 // Email ID : advaitchavan135@gmail.com
3 // CDAC NOIDA JAVA PROGRAMMING Assignment 8 - Question - 5
4
5 import java.util.function.BiFunction;
6
7 public class Assignment_8_qs_5 {
8     public static void main(String[] args) {
9         // Lambda expression to sum two integers
10         BiFunction<Integer, Integer, Integer> sum = (a, b) -> a + b;
11
12         int result = sum.apply(10, 20);
13         System.out.println("Sum: " + result);
14     }
15 }
16
```

Task List

Find All Activate...

Outline

Assignment_8_qs_5

Problems Javadoc Console

<terminated> Assignment_8_qs_5 [Java Application] C:\Users\Advait\Desktop\SOFTWARES\eclipse-jee-2025-03-R-win32-x86_64\eclipse\plugins\org.eclipse.justj.openjdk.hotspot.jre.full.win32.x86_64_21.0.6.v20250130-
Sum: 30

Writable Smart Insert 7:31:210

Desktop 01:20 12-06-2025

Package Explorer

CDAC NOIDA PGDAI ASSIGNMENT - 1

CDAC NOIDA PGDAI ASSIGNMENT - 2

CDAC NOIDA PGDAI ASSIGNMENT - 3

CDAC NOIDA PGDAI ASSIGNMENT - 4

CDAC NOIDA PGDAI ASSIGNMENT - 5

CDAC NOIDA PGDAI ASSIGNMENT - 6

CDAC NOIDA PGDAI ASSIGNMENT - 7

CDAC NOIDA PGDAI ASSIGNMENT - 8

src

(default package)

Assignment_8_qs_1.java

Assignment_8_qs_2.java

Assignment_8_qs_3.java

Assignment_8_qs_4.java

Assignment_8_qs_5.java

Assignment_8_qs_6.java

JRE System Library [jre]

~\$CDAC NOIDA_ PGDAI_ MODULE 7 _ JAVA PROGRAMMING

CDAC NOIDA_ PGDAI_ MODULE 7 _ JAVA PROGRAMMING

Assignment_...

Assignment_...

Assignment_...

Assignment_...

Assignment_...

Assignment_...

1// Name : ADVAIT GURUNATH CHAVAN

2// Email ID : advaitchavan135@gmail.com

3// CDAC NOIDA JAVA PROGRAMMING Assignment 8 - Question - 6

4

5import java.util.Arrays;

6import java.util.List;

7

8public class Assignment_8_qs_6 {

9public static void main(String[] args) {

10List<Integer> numbers = Arrays.asList(03, 05, 2001, 29, 01, 1970);

11

12// Using lambda expressions with max and min

13int max = numbers.stream().max((a, b) -> a - b).get();

14int min = numbers.stream().min((a, b) -> a - b).get();

15

16System.out.println("Maximum: " + max);

17System.out.println("Minimum: " + min);

18}

19}

20

Task List

Find

All

Activate...

Outline

Assignment_8_qs_6

main(String[]) : void

Problems

Javadoc

Console

<terminated> Assignment_8_qs_6 [Java Application] C:\Users\Advait\Desktop\SOFTWARES\eclipse-jee-2025-03-R-win32-x86_64\eclipse\plugins\org.eclipse.justj.openjdk.hotspot.jre.full.win32.x86_64_21.0.6.v20250130-

Maximum: 2001

Minimum: 1

Writable

Smart Insert

10 : 73 : 343

Desktop

01:22

12-06-2025

File Edit Source Refactor Navigate Search Project Run Window Help

Package Explorer

CDAC NOIDA PGDAI ASSIGNMENT - 1

CDAC NOIDA PGDAI ASSIGNMENT - 2

CDAC NOIDA PGDAI ASSIGNMENT - 3

CDAC NOIDA PGDAI ASSIGNMENT - 4

CDAC NOIDA PGDAI ASSIGNMENT - 5

CDAC NOIDA PGDAI ASSIGNMENT - 6

CDAC NOIDA PGDAI ASSIGNMENT - 7

CDAC NOIDA PGDAI ASSIGNMENT - 8

src

(default package)

Assignment_8_qs_1.java

Assignment_8_qs_2.java

Assignment_8_qs_3.java

Assignment_8_qs_4.java

Assignment_8_qs_5.java

Assignment_8_qs_6.java

Assignment_8_qs_7.java

JRE System Library [jre]

~\$CDAC NOIDA_ PGDAI_ MODULE 7 __ JAVA PROGRAMMING

CDAC NOIDA_ PGDAI_ MODULE 7 __ JAVA PROGRAMMING

Assignment_8_qs_7.java

```
1 // Name : ADVAIT GURUNATH CHAVAN
2 // Email ID : advaitchavan135@gmail.com
3 // CDAC NOIDA JAVA PROGRAMMING Assignment 8 - Question - 7
4
5 import java.util.function.Predicate;
6
7 public class Assignment_8_qs_7 {
8     public static void main(String[] args) {
9         // Lambda expression to check for perfect square
10        Predicate<Integer> isPerfectSquare = n -> {
11            if (n < 0) return false; // negative numbers are not perfect squares
12            double sqrt = Math.sqrt(n);
13            return sqrt == Math.floor(sqrt);
14        };
15
16        int number = 169;
17        System.out.println("Is " + number + " a perfect square? " + isPerfectSquare.test(number));
18    }
19 }
20
```

Task List

Find All Activate...

Outline

Assignment_8_qs_7

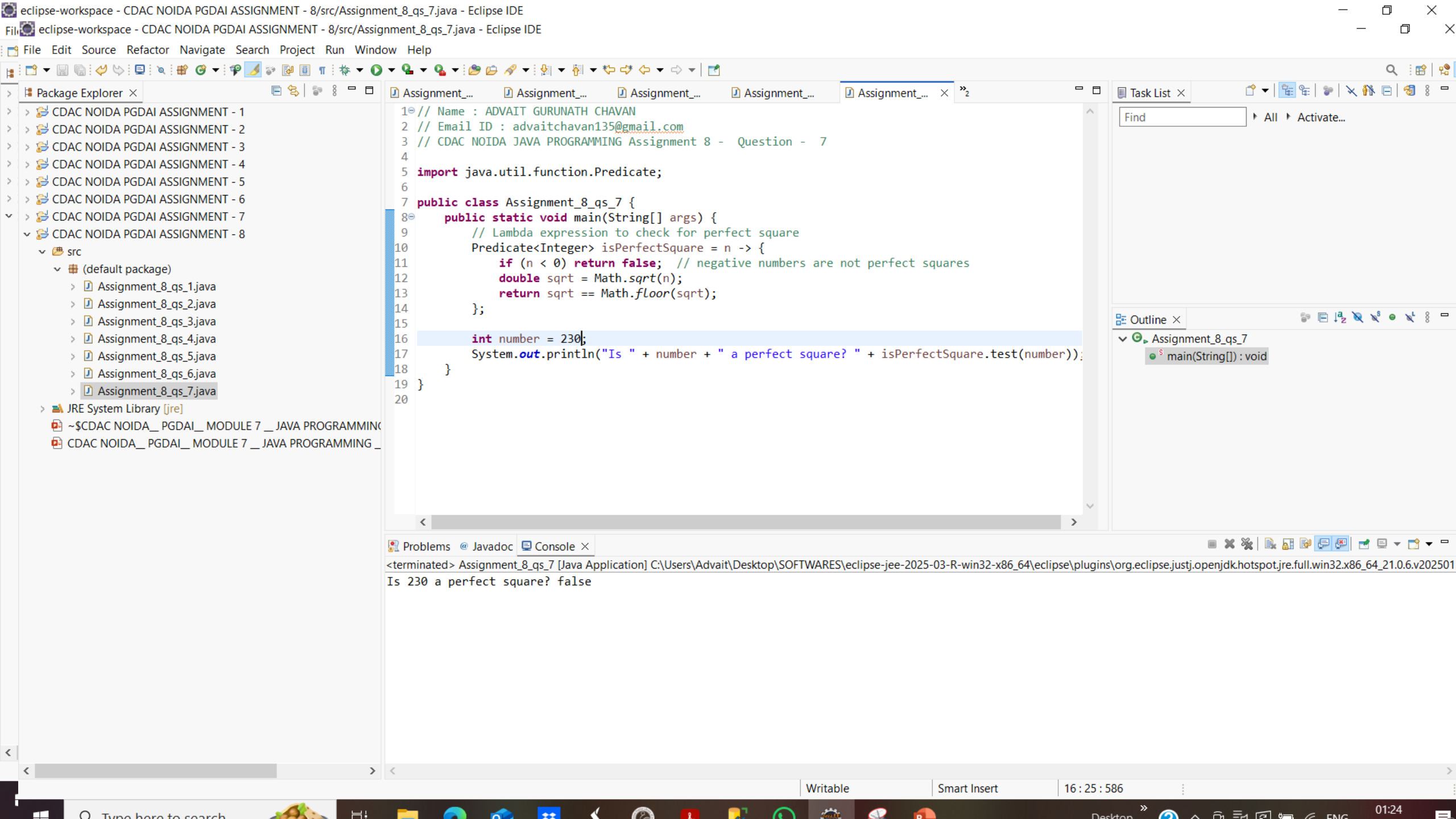
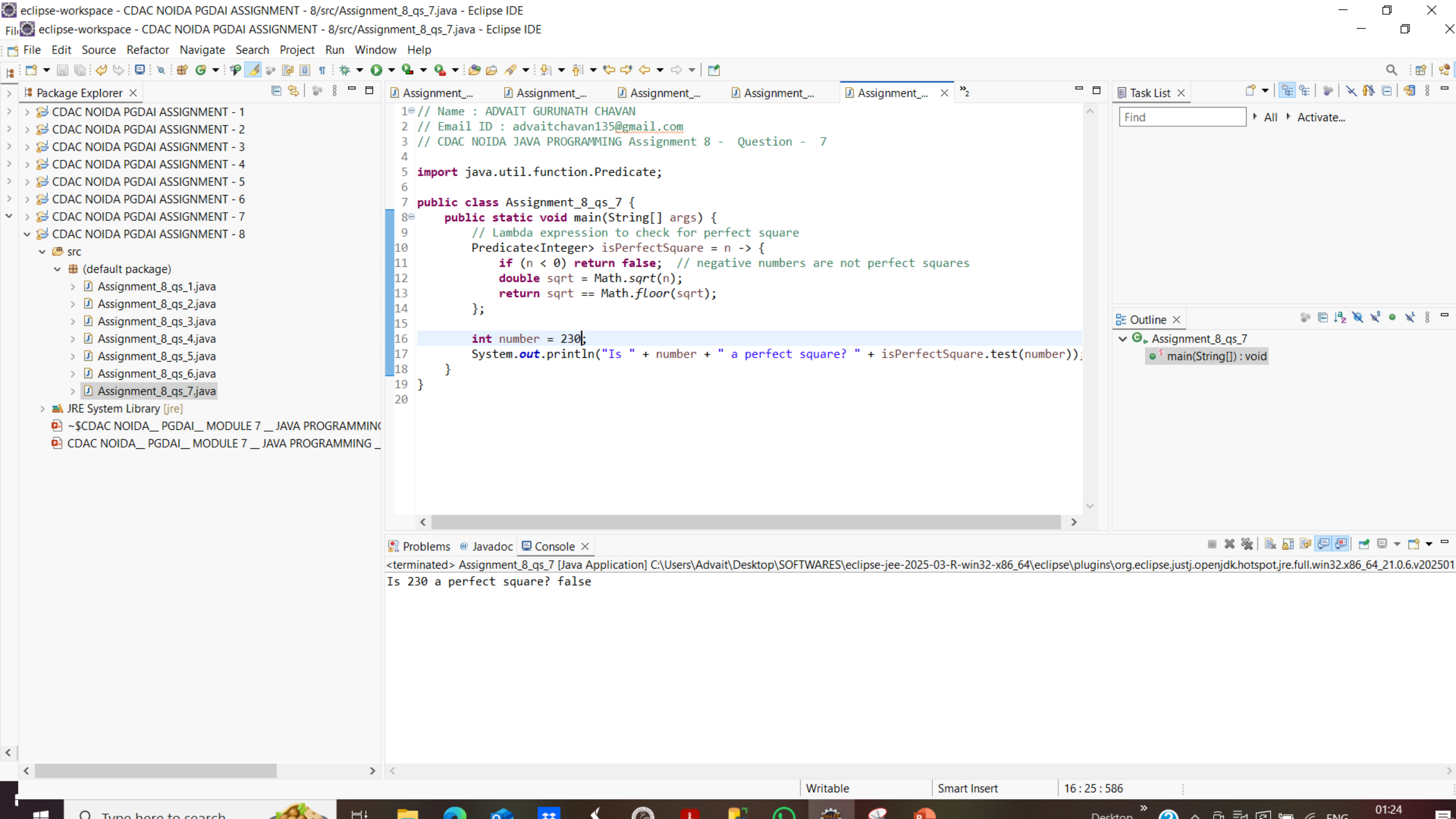
main(String[]) : void

Problems Javadoc Console

<terminated> Assignment_8_qs_7 [Java Application] C:\Users\Advait\Desktop\SOFTWARES\eclipse-jee-2025-03-R-win32-x86_64\eclipse\plugins\org.eclipse.justi.openjdk.hotspot.jre.full.win32.x86_64_21.0.6.v20250130-1
Is 169 a perfect square? true

Writable Smart Insert 16 : 25 : 586

Desktop 01:24 12-06-2025



Package Explorer

CDAC NOIDA PGDAI ASSIGNMENT - 8/src/Assignment_8_qs_8.java - Eclipse IDE

File Edit Source Refactor Navigate Search Project Run Window Help

Package Explorer

CDAC NOIDA PGDAI ASSIGNMENT - 1

CDAC NOIDA PGDAI ASSIGNMENT - 2

CDAC NOIDA PGDAI ASSIGNMENT - 3

CDAC NOIDA PGDAI ASSIGNMENT - 4

CDAC NOIDA PGDAI ASSIGNMENT - 5

CDAC NOIDA PGDAI ASSIGNMENT - 6

CDAC NOIDA PGDAI ASSIGNMENT - 7

CDAC NOIDA PGDAI ASSIGNMENT - 8

src

(default package)

Assignment_8_qs_1.java

Assignment_8_qs_2.java

Assignment_8_qs_3.java

Assignment_8_qs_4.java

Assignment_8_qs_5.java

Assignment_8_qs_6.java

Assignment_8_qs_7.java

Assignment_8_qs_8.java

JRE System Library [jre]

~\$CDAC NOIDA_ PGDAI_ MODULE 7 _ JAVA PROGRAMMING

CDAC NOIDA_ PGDAI_ MODULE 7 _ JAVA PROGRAMMING

Assignment_...

Assignment_...

Assignment_...

Assignment_...

Assignment_...

Assignment_...

Task List

Find

All

Activate...

Outline

Assignment_8_qs_8

Problems

Javadoc

Console

<terminated> Assignment_8_qs_8 [Java Application] C:\Users\Advait\Desktop\SOFTWARES\eclipse-jee-2025-03-R-win32-x86_64\eclipse\plugins\org.eclipse.justi.openjdk.hotspot.jre.full.win32.x86_64_21.0.6.v20250130-

Second Smallest: 3

Second Largest: 7

Writable

Smart Insert

10 : 31 : 260

Desktop

01:26

12-06-2025

Package Explorer

CDAC NOIDA PGDAI ASSIGNMENT - 8/src/Assignment_8_qs_9.java - Eclipse IDE

File Edit Source Refactor Navigate Search Project Run Window Help

CDAC NOIDA PGDAI ASSIGNMENT - 1

CDAC NOIDA PGDAI ASSIGNMENT - 2

CDAC NOIDA PGDAI ASSIGNMENT - 3

CDAC NOIDA PGDAI ASSIGNMENT - 4

CDAC NOIDA PGDAI ASSIGNMENT - 5

CDAC NOIDA PGDAI ASSIGNMENT - 6

CDAC NOIDA PGDAI ASSIGNMENT - 7

CDAC NOIDA PGDAI ASSIGNMENT - 8

src

(default package)

Assignment_8_qs_1.java

Assignment_8_qs_2.java

Assignment_8_qs_3.java

Assignment_8_qs_4.java

Assignment_8_qs_5.java

Assignment_8_qs_6.java

Assignment_8_qs_7.java

Assignment_8_qs_8.java

Assignment_8_qs_9.java

JRE System Library [jre]

~\$CDAC NOIDA__ PGDAI__ MODULE 7 __ JAVA PROGRAMMING

CDAC NOIDA__ PGDAI__ MODULE 7 __ JAVA PROGRAMMING

Assignment_... Assignment_... Assignment_... Assignment_... Assignment_...

```
2 // Email ID : advaitchavan135@gmail.com
3 // CDAC NOIDA JAVA PROGRAMMING Assignment 8 - Question - 9
4
5import java.util.Arrays;
6import java.util.List;
7
8public class Assignment_8_qs_9 {
9    public static void main(String[] args) {
10        List<Integer> numbers = Arrays.asList(1, 2, 3, 4, 5, 6, 7, 8, 9, 10);
11
12        // Sum of squares of odd numbers
13        int sumOddSquares = numbers.stream()
14            .filter(n -> n % 2 != 0)
15            .map(n -> n * n)
16            .reduce(0, Integer::sum);
17
18        // Sum of squares of even numbers
19        int sumEvenSquares = numbers.stream()
20            .filter(n -> n % 2 == 0)
21            .map(n -> n * n)
22            .reduce(0, Integer::sum);
23
24        System.out.println("Sum of squares of odd numbers: " + sumOddSquares);
25        System.out.println("Sum of squares of even numbers: " + sumEvenSquares);
26    }
27 }
28
```

Task List

Find All Activate...

Outline

Assignment_8_qs_9

main(String[]) : void

Problems Javadoc Console

<terminated> Assignment_8_qs_9 [Java Application] C:\Users\Advait\Desktop\SOFTWARES\eclipse-jee-2025-03-R-win32-x86_64\eclipse\plugins\org.eclipse.justj.openjdk.hotspot.jre.full.win32.x86_64_21.0.6.v20250130-
Sum of squares of odd numbers: 165
Sum of squares of even numbers: 220

Writable Smart Insert 10 : 76 : 346

Desktop 01:27 12-06-2025

Package Explorer

CDAC NOIDA PGDAI ASSIGNMENT - 1

CDAC NOIDA PGDAI ASSIGNMENT - 2

CDAC NOIDA PGDAI ASSIGNMENT - 3

CDAC NOIDA PGDAI ASSIGNMENT - 4

CDAC NOIDA PGDAI ASSIGNMENT - 5

CDAC NOIDA PGDAI ASSIGNMENT - 6

CDAC NOIDA PGDAI ASSIGNMENT - 7

CDAC NOIDA PGDAI ASSIGNMENT - 8

src

(default package)

Assignment_8_qs_1.java

Assignment_8_qs_10.java

Assignment_8_qs_2.java

Assignment_8_qs_3.java

Assignment_8_qs_4.java

Assignment_8_qs_5.java

Assignment_8_qs_6.java

Assignment_8_qs_7.java

Assignment_8_qs_8.java

Assignment_8_qs_9.java

JRE System Library [jre]

~\$CDAC NOIDA__PGDAI__MODULE 7 __JAVA PROGRAMMING

CDAC NOIDA__PGDAI__MODULE 7 __JAVA PROGRAMMING

Assignment_...

Assignment_...

Assignment_...

Assignment_...

Assignment_...

Assignment_...

Task List

Find

All

Activate...

Outline

Assignment_8_qs_10

main(String[]) : void

Problems

Javadoc

Console

<terminated> Assignment_8_qs_10 [Java Application] C:\Users\Advait\Desktop\SOFTWARES\eclipse-jee-2025-03-R-win32-x86_64\eclipse\plugins\org.eclipse.justj.openjdk.hotspot.jre.full.win32.x86_64_21.0.6.v20250130

List contains 'chavan': true

Writable

Smart Insert

12 : 38 : 434

Desktop

01:29

12-06-2025