

Certification Java Certified Programmer

SCJP/OCJP Mock

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1. Java Certified Programmer

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4. Chapter: Strings

1. Strings Questions

4.1.1. What is the expected output?

Author: Yasser Ibrahim

What is the expected output?

```
public static void main(String[] args) {  
    boolean stmt1 = "champ" == "champ";  
    boolean stmt2 = new String("champ") == "champ";  
    boolean stmt3 = new String("champ") == new String("champ");  
    System.out.println(stmt1 && stmt2 || stmt3);  
}
```

Please choose only one answer:

- true
- false

Check the answer of this question online on QuizOver.com:

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Permalink: <http://www.quizover.com/pdf/java-objects-comparison>

4.1.2. What is the expected output?

Author: JavaChamp Team

What is the expected output?

```
public static void main(String[] args) {  
    boolean stmt1 = "champ" == "champ";  
    boolean stmt2 = new String("champ").equals(new String("champ"));  
    boolean stmt3 = "champ".toString()=="champ";  
  
    System.out.println(stmt1 && stmt2 && stmt3);  
}
```

Please choose only one answer:

- true
- false

Check the answer of this question online on QuizOver.com:

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4.1.3. Select the common methods, which are defined for both type String a...

Author: [JavaChamp Team](#)

Select the common methods, which are defined for both type String and type StringBuffer ?

Please choose all the answers that apply:

- `toString()`
- `length()`
- `append(String)`
- `trim()`
- `equals(Object)`

Check the answer of this question online on [QuizOver.com](#):

Question: [What are common methods between String and StringBuffer?](#)

Permalink: <http://www.quizover.com/pdf/what-are-common-methods-between-string-and-stringbuffer>

4.1.4. Which of the statements would evaluate to true?

Author: JavaChamp Team

Which of the statements would evaluate to true?

```
public class Tester {  
    public static void main(String[] args) {  
        StringBuffer sb = new StringBuffer("javachamp");  
        String s = new String("javachamp");  
        boolean stmt1 = s.equals(sb) ;  
        boolean stmt2 = sb.equals(s) ;  
        boolean stmt3 = sb.toString() == s ;  
        boolean stmt4 = sb.toString().equals(s) ;  
        boolean stmt5 = s.equals(sb.toString()) ;  
    }  
}
```

Please choose all the answers that apply:

- stmt1
- stmt2
- stmt3
- stmt4
- stmt5

Check the answer of this question online on QuizOver.com:

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Permalink: <http://www.quizover.com/pdf/what-is-the-difference-between-string-and-stringbuffer>

4.1.5. Which of the statements will evaluate to true?

Author: JavaChamp Team

Which of the statements will evaluate to true?

```
public class Tester {  
  
    public static void main(String[] args) {  
  
        StringBuffer sb1 = new StringBuffer("javachamp");  
        StringBuffer sb2 = new StringBuffer("javachamp");  
  
        boolean stmt1 = sb1.equals(sb2) ;  
        boolean stmt2 = sb1 == sb2;  
  
        String s1 = new String("javachamp");  
        String s2 = new String("javachamp");  
  
        boolean stmt3 = s1.equals(s2);  
        boolean stmt4 = s1 == s2;  
  
    }  
}
```

Please choose only one answer:

- stmt1
- stmt2
- stmt3
- stmt4

Check the answer of this question online on QuizOver.com:

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Permalink: <http://www.quizover.com/pdf/comparing-string-and-stringbuffer-in-java>

4.1.6. What is the expected output?

Author: Yasser Ibrahim

What is the expected output?

```
public static void main(String args []) {  
    String stmt = null;  
        System.out.print(null+stmt);  
        System.out.print(stmt+null);  
}
```

Please choose only one answer:

- RuntimeException is thrown because of the first print statement
- RuntimeException is thrown because of the second print statement
- nullnullnullnull
- nullnull
- compilation error

Check the answer of this question online on QuizOver.com:

Question: [Concatenating String and null](http://www.quizover.com/pdf/concatenating-string-and-null)

Permalink: <http://www.quizover.com/pdf/concatenating-string-and-null>

4.1.7. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    StringBuffer buffer1 = new StringBuffer("javachamp");  
    StringBuffer buffer2 = new StringBuffer(buffer1);  
    if (buffer1.equals(buffer2))  
        System.out.println("true");  
    else  
        System.out.println("false");  
}
```

Please choose only one answer:

- true
- false

Check the answer of this question online on QuizOver.com:

Question: [Comparing StringBuffer using equals in java](http://www.quizover.com/pdf/comparing-stringbuffer-using-equals-in-java)

Permalink: <http://www.quizover.com/pdf/comparing-stringbuffer-using-equals-in-java>

4.1.8. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    String s1 = null;  
    String s2 = null;  
  
    if (s1 == s2)  
        System.out.print("A");  
  
    if (s1.equals(s2))  
        System.out.print("B");  
}
```

Please choose only one answer:

- "AB" will be printed
- "A" will be printed followed by a NullPointerException thrown
- "B" will be printed
- No output is produced

Check the answer of this question online on QuizOver.com:

Question: [comparing null to String](http://www.quizover.com/pdf/comparing-null-to-string)

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4.1.9. Which of the following methods can be invoked by an object of Patte...

Author: Yasser Ibrahim

Which of the following methods can be invoked by an object of Pattern class?

Please choose all the answers that apply:

- compile
- matches
- group
- toString

Check the answer of this question online on QuizOver.com:

Question: [Methods of java regex Pattern?](#)

Permalink: <http://www.quizover.com/pdf/methods-of-java-regex-pattern>

4.1.10. What is the result of compiling and running the following program?

Author: Yasser Ibrahim

What is the result of compiling and running the following program?

```
public class Tester {  
    public static void main(String[] args) {  
        String a = "javachamp";  
        String b = "javachamp";  
        String c = new String("javachamp");  
  
        System.out.print(a==b);  
        System.out.print(a==c);  
        System.out.print(b.equals(c));  
        System.out.print(b.equals(a));  
    }  
}
```

Please choose only one answer:

- Compilation error
- falsefalsetrue
- true>true>true
- truefalsetrue

Check the answer of this question online on QuizOver.com:

Question: [Comparing Strings for equality in java](http://www.quizover.com/pdf/comparing-strings-for-equality-in-java)

Permalink: <http://www.quizover.com/pdf/comparing-strings-for-equality-in-java>

4.1.11. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
  
    public static void main(String[] args) {  
        String stmt = "JavaChamp is here to help you";  
        for (String token : stmt.split("//s")) {  
            System.out.print(token + " ");  
        }  
    }  
}
```

Please choose only one answer:

- JavaChamp is here to help you
- JavaChamp i here to help you
- No output is produced
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [how to split String in java?](http://www.quizover.com/pdf/how-to-split-string-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-split-string-in-java>

4.1.12. Given the following code, what is the expected output?

Author: JavaChamp Team

Given the following code, what is the expected output?

```
import java.util.regex.Matcher;
import java.util.regex.Pattern;

public class Tester {

    public static void main(String[] args) {
        Pattern p = Pattern.compile("[a-f]\\d+");
        Matcher m = p.matcher("ab34ef0");
        while(m.find()) {
            System.out.print(m.start()+" "+m.group());
        }
    }
}
```

Please choose only one answer:

- 0 ab345 f0
- 0 ab344 ef0
- 1 b35 f0
- 1 b345 f0

Check the answer of this question online on QuizOver.com:

Question: [How to parse String in java?](http://www.quizover.com/pdf/how-to-parse-string-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-parse-string-in-java>

4.1.13. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    public static void main(String[] args) {  
        String s = "";  
        Integer x = 5;  
        StringBuffer sb = new StringBuffer();  
        if (x < 15)  
            s.concat("javachamp");  
        else  
            sb.append("javachamp");  
        System.out.print(s + sb);  
    }  
}
```

Please choose only one answer:

- javachamp
- javachamp javachamp
- No output is produced
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to use StringBuffer in java?](http://www.quizover.com/pdf/how-to-use-stringbuffer-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-use-stringbuffer-in-java>

4.1.14. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
  
    public static void main(String[] args) {  
        String s = "";  
        Integer x = 5;  
        StringBuffer sb = "";  
        if (x < 0)  
            s.concat("javachamp");  
        else  
            sb.append("javachamp");  
        System.out.print(s + sb);  
    }  
}
```

Please choose only one answer:

- javachamp
- javachamp javachamp
- No output is produced
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to use java StringBuffer?](#)

Permalink: <http://www.quizover.com/pdf/how-to-use-java-stringbuffer>

4.1.15. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
import java.util.Scanner;

public class Tester {

    public static void main(String[] args) {
        Scanner sc = new Scanner("javachamp 2009, true 239");
        while (sc.hasNext()) {

            if (sc.hasNextBoolean())
                System.out.print("Boolean");
            if (sc.hasNextInt())
                System.out.print("Int");
            sc.next();
        }
    }
}
```

Please choose only one answer:

- IntBooleanInt
- BooleanInt
- IntInt
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to use java.util.Scanner?](#)

Permalink: <http://www.quizover.com/pdf/how-to-use-javautilsscanner>

4.1.16. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
  
    public static void main(String[] args) {  
        String str = "java";  
        StringBuffer sb = new StringBuffer("javachamp");  
        sb.insert(9, ".com");  
        str.concat("champ");  
        if (sb.length() < 6 || str.equals("javachamp")) {  
            System.out.print(sb);  
        }  
        sb.delete(2, 7);  
        System.out.print(sb);  
    }  
}
```

Please choose only one answer:

- javachamp.comjump.com
- jump
- jump.com
- javachampjump
- jap

Check the answer of this question online on QuizOver.com:

Question: [What are java StringBuffer methods?](#)

Permalink: <http://www.quizover.com/pdf/what-are-java-stringbuffer-methods>

4.1.17. What is the correct answer?

Author: MrDick

What is the correct answer?

```
public class Test {  
    public void method(StringBuffer sb) {  
        System.out.println("StringBuffer method");  
    }  
    public void method(String s) {  
        System.out.println("String method");  
    }  
  
    public static void main(String[] args) {  
        Test test = new Test();  
        test.method(null);  
    }  
}
```

Please choose only one answer:

- StringBuffer method
- String method
- null
- compilation error
- Runtime Exception

Check the answer of this question online on QuizOver.com:

Question: [java string and stringbuffer](#)

Permalink: <http://www.quizover.com/pdf/java-string-and-stringbuffer>

4.1.18. What is the correct output?

Author: MrDick

What is the correct output?

```
class Test {  
  
    public static void main(String[] args) {  
        String jc = "javachamp_champ2012champ";  
        Pattern p = Pattern.compile(".{4}c+(m)*"); //line 1  
        Matcher m = p.matcher(jc);  
        while(m.find()) {  
            System.out.print(m.start());  
        }  
    }  
}
```

Please choose only one answer:

- javacamp_c2012c
- javachamp_champ2012champ
- compliation error in line1
- 0615
- Runtime exception due line 1

Check the answer of this question online on QuizOver.com:

Question: [java regex and pattern](#)

Permalink: <http://www.quizover.com/pdf/java-regex-and-pattern>

4.1.19. What will be the Output?

Author: Sudhakar Nagarajan

What will be the Output?

```
public class InnerClassThis {
    int x=10;
    public void foo() {
        System.out.println("Outer class");
    }
    public class ReallyInner {
        public void foo() {
            System.out.println("Inner class");
        }
        public void test() {
            this.foo();
            InnerClassThis.this.foo();
        }
    }
    public static void main(String... args) {
        InnerClassThis.ReallyInner i = new InnerClassThis().new ReallyInner();
        i.test();
    }
}
```

Please choose only one answer:

- The code does not compile.
- Inner class
Outer class
- The code compiles but throws runtime exception
- Outer class
Inner class

Check the answer of this question online on QuizOver.com:

Question: [Sudhakar Nagarajan What will be the Output?](#)

[public class InnerClassThis {](#)

[int x=10;](#)

[public void](#)

Permalink: <http://www.quizover.com/pdf/sudhakar-nagarajan-what-will-be-the-output-public-class-innerclassthis-int-x-10-public-void>

4.1.20. Choose the correct(s) :

Author: Diogo Dantas

Choose the correct(s) :

```
abstract interface Veloz { void metodo(String x); }

public class A {

    private abstract interface Veloz{ Number metodo(int x); } // 0

    abstract static class B{ // 1

    private abstract static interface Veloz{
        void metodo(long x) throws Exception;
    }

    public void metodo(){

        class Opa implements Veloz{

            public void metodo(long x) throws IOException { } // 2
        }
    }

    public void test(){

        class Opa2 implements Veloz{

            public Integer metodo(int x) throws RuntimeException { // 3
                return (Integer)(int) .5f; //4
            }
        }
    }
}
```

Please choose all the answers that apply:

- Can not be used private abstract at // 0
- Can not be used abstract static at // 1
- OK. Compiles Fine !
- The IOException can be changed to InterruptedException
- Error at // 3
- Error at // 4

Check the answer of this question online on QuizOver.com:

Question: [Diogo Dantas /** AFTER COMPILING THIS FILE test.java THAT CONTAINS: */](http://www.quizover.com/pdf/diogo-dantas-after-compiling-this-file-test-java-that-contains-abstract-interface-veloz)

[abstract interface Veloz](http://www.quizover.com/pdf/diogo-dantas-after-compiling-this-file-test-java-that-contains-abstract-interface-veloz)

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4.1.21. What will be the output upon running this piece of code?

Author: Divya Nagaraj

What will be the output upon running this piece of code?

```
public class Test {  
  
    public static void hello(Collection x) {  
        System.out.println("Collection");  
    }  
  
    public static void main(String[] args) {  
        Test t = new Testing();  
        List x = null;  
        t.hello(x);  
    }  
}  
  
class Testing extends Test {  
    public static void hello(List x) {  
        System.out.println("List");  
    }  
}
```

Please choose only one answer:

- Collection
- List
- compilation error

Check the answer of this question online on QuizOver.com:

Question: [divya nagaraj public class Test {](#)

[public static void hello\(Collection x\){](#)
[System.out.print](#)

Permalink: <http://www.quizover.com/pdf/divya-nagaraj-public-class-test-public-static-void-hello-collection-x-system-out-print2064456>

4. Chapter: Constructors

1. Constructors Questions

4.1.1. Can a constructor be declared static?

Author: Yasser Ibrahim

Can a constructor be declared static?

Please choose only one answer:

- Yes
- No

Check the answer of this question online on QuizOver.com:

Question: [Can java constructors be declared static?](http://www.quizover.com/pdf/can-java-constructors-be-declared-static)

Permalink: <http://www.quizover.com/pdf/can-java-constructors-be-declared-static>

4.1.2. What are the legal modifiers which the constructor can be declared ...

Author: [JavaChamp Team](#)

What are the legal modifiers which the constructor can be declared with?

Please choose all the answers that apply:

- public
- protected
- private
- final
- static
- abstract

Check the answer of this question online on QuizOver.com:

Question: [What are java constructors legal modifiers?](#)

Permalink: <http://www.quizover.com/pdf/what-are-java-constructors-legal-modifiers>

4.1.3. What is the expected output?

Author: JavaChamp Team

What is the expected output?

```
public class Profile {  
  
    private Profile(int w) { // line 1  
        System.out.println(w);  
    }  
  
    public final Profile() { // line 5  
        System.out.println(10);  
    }  
  
    public static void main(String args[]) {  
        Profile obj = new Profile(50);  
    }  
}
```

Please choose only one answer:

- Won't compile because of line (1) – constructor can't be private
- Won't compile because of line (5) – constructor can't be final
- 50
- 10
- 50

Check the answer of this question online on QuizOver.com:

Question: [Can java constructors be declared final?](http://www.quizover.com/pdf/can-java-constructors-be-declared-final)

Permalink: <http://www.quizover.com/pdf/can-java-constructors-be-declared-final>

4.1.4. What is the expected output?

Author: JavaChamp Team

What is the expected output?

```
public class Profile {  
    private Profile(int w) { // line 1  
        System.out.println(w);  
    }  
  
    public static Profile() { // line 5  
        System.out.println(10);  
    }  
  
    public static void main(String args[]) {  
        Profile obj = new Profile(50);  
    }  
}
```

Please choose only one answer:

- Won't compile because of line (1) – constructor can't be private
- 10
- 50
- Won't compile because of line (5) – constructor can't be static

Check the answer of this question online on QuizOver.com:

Question: [Can java constructors be marked static?](http://www.quizover.com/pdf/can-java-constructors-be-marked-static)

Permalink: <http://www.quizover.com/pdf/can-java-constructors-be-marked-static>

4.1.5. What is the expected output?

Author: Yasser Ibrahim

What is the expected output?

```
class Plant {  
    Plant() {  
        System.out.println("Plant created");  
    }  
}  
  
class Tree extends Plant {  
    Tree() {  
        System.out.println("Tree created");  
        super();  
    }  
}  
  
public class Test {  
    public static void main(String args[]) {  
        Tree tree = new Tree();  
    }  
}
```

Please choose only one answer:

- Plant created
Tree created
- Tree created
Plant created
- RuntimeException
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [When can call super\(\) in java constructors?](http://www.quizover.com/pdf/when-can-call-super-in-java-constructors)

Permalink: <http://www.quizover.com/pdf/when-can-call-super-in-java-constructors>

4.1.6. What is the expected output?

Author: JavaChamp Team

What is the expected output?

```
import java.io.IOException;

class AirPlane {
    public AirPlane() throws IOException {
        System.out.print("AirPlane");
        throw new IOException();
    }
}

class AirJet extends AirPlane {
    public AirJet() throws IOException {
        try {
            super();
        } catch (IOException e) {
            System.out.print("IOException is thrown in AirJet");
        }
    }
}

public class Tester {
    public static void main(String args[]) {
        try {
            new AirJet();
        } catch (IOException e) {
            System.out.print("IOException is thrown in Tester");
        }
    }
}
```

Please choose only one answer:

- "AirPlaneIOException is thrown in AirJet" will be printed
- "AirPlaneIOException is thrown in AirJetIOException is thrown in Tester" will be printed
- "AirPlaneIOException is thrown in Tester" will be printed
- Compile error

Check the answer of this question online on QuizOver.com:

Question: [How to call super\(\) in java constructor?](#)

Permalink: <http://www.quizover.com/pdf/how-to-call-super-in-java-constructor>

4.1.7. The following code contains one compilation error, where could it be?

Author: Yasser Ibrahim

The following code contains one compilation error, where could it be?

```
public class Tester {  
    Tester() { } // line 1  
    static void Tester() { this(); } // line 2  
  
    public static void main(String[] args) { // line 3  
        Tester(); // line 4  
    }  
}
```

Please choose only one answer:

- At line 1, constructor Tester must be marked public like its class
- At line 2, constructor call "this()" can only be called inside constructors
- At line 3, compilation error, ambiguity problem, compiler can't determine whether a constructor Tester or method Tester is called

Check the answer of this question online on QuizOver.com:

Question: [How to call this\(\) in java constructor?](http://www.quizover.com/pdf/how-to-call-this-in-java-constructor)

Permalink: <http://www.quizover.com/pdf/how-to-call-this-in-java-constructor>

4. Chapter: Inner class

1. Inner class Questions

4.1.1. What is the expected output?

Author: JavaChamp Team

What is the expected output?

```
public class OuterTest {  
  
    public static void main(String args[]) {  
  
        Airplane airplane = new Airplane(); //line 5  
        Airplane.BlackBox box = airplane.new BlackBox(); // line 6  
        box.printVariables();  
  
    }  
}  
  
class Airplane {  
    String code = "11";  
  
    class BlackBox {  
        String code = "22";  
  
        public void printVariables() {  
            System.out.print(code); // line 19  
            System.out.print(Airplane.this.code); // line 20  
  
        }  
    }  
}
```

Please choose only one answer:

- Compile error because of lines 5-6 (incorrect instantiation)
- Compile error because of line 20 (can't access Airplane's variables)
- 2222
- 1111
- 2211

Check the answer of this question online on QuizOver.com:

Question: [How to access an outer class member from inside its inner class?](http://www.quizover.com/pdf/how-to-access-an-outer-class-member-from-inside-its-inner-class)

Permalink: <http://www.quizover.com/pdf/how-to-access-an-outer-class-member-from-inside-its-inner-class>

4.1.2. What is the expected output?

Author: JavaChamp Team

What is the expected output?

```
public class OuterTest {  
    public static void main(String args[]) {  
        Airplane.BlackBox box = new Airplane().new BlackBox(); // line 1  
        box.printVariables();  
    }  
}  
  
class Airplane {  
    String code = "11";  
  
    class BlackBox {  
        String code = "22";  
  
        public void printVariables() {  
            System.out.print(code);  
            System.out.print(Airplane.this.code); // line 20  
        }  
    }  
}
```

Please choose only one answer:

- Compile error because of line 1 (incorrect instantiation)
- Compile error because of line 20 (can't access Airplane's variables)
- 2222
- 1111
- 2211

Check the answer of this question online on QuizOver.com:

Question: [How to access a member of an outer class from inside its inner class?](http://www.quizover.com/pdf/how-to-access-a-member-of-an-outer-class-from-inside-its-inner-class)

Permalink: <http://www.quizover.com/pdf/how-to-access-a-member-of-an-outer-class-from-inside-its-inner-class>

4.1.3. Which of the instantiations for a BlackBox are correct and compile-...

Author: JavaChamp Team

Which of the instantiations for a BlackBox are correct and compile-free?

```
public class OuterTest {  
    public static void main(String args[]) {  
        // instantiation 1  
        Airplane airplane = new Airplane();  
        Airplane.BlackBox box1 = airplane.new BlackBox();  
  
        // instantiation 2  
        Airplane.BlackBox box2 = new Airplane().new BlackBox();  
  
        // instantiation 3  
        Airplane airplane3 = new Airplane();  
        BlackBox box3 = airplane3.new BlackBox();  
    }  
}  
  
class Airplane {  
    class BlackBox {  
    }  
}
```

Please choose all the answers that apply:

- Instantiation 1
- Instantiation 2
- Instantiation 3

Check the answer of this question online on QuizOver.com:

Question: [How to instantiate an inner class inside main\(\)](http://www.quizover.com/pdf/how-to-instantiate-an-inner-class-inside-main)?

Permalink: <http://www.quizover.com/pdf/how-to-instantiate-an-inner-class-inside-main>

4.1.4. Which of the instantiations for a Engine are correct and compile-free?

Author: JavaChamp Team

Which of the instantiations for a Engine are correct and compile-free?

```
public class AirJet {  
    public static void main(String[] args) {  
        // instantiation 1  
        Engine engine1 = new AirJet().new Engine();  
  
        // instantiation 2  
        AirJet.Engine engine2 = new AirJet().new Engine();  
  
        // instantiation 3  
        AirJet airjet = new AirJet();  
        Engine engine3 = airjet.new Engine();  
  
        // instantiation 4  
        Engine engine4 = new Engine();  
    }  
    class Engine{  
    }  
}
```

Please choose all the answers that apply:

- Instantiation 1
- Instantiation 2
- Instantiation 3
- Instantiation 4

Check the answer of this question online on QuizOver.com:

Question: [How to instantiate an inner class?](http://www.quizover.com/pdf/how-to-instantiate-an-inner-class)

Permalink: <http://www.quizover.com/pdf/how-to-instantiate-an-inner-class>

4.1.5. Are the lines 1 and 2 correct and free of compilation errors?

Author: Yasser Ibrahim

Are the lines 1 and 2 correct and free of compilation errors?

```
public class AirPlane {  
    public void fly(int speed) {  
        final int e = 1;  
        class FlyingEquation {  
            {  
                System.out.println(e); // line 1  
                System.out.println(speed); // line 2  
            }  
        }  
    }  
}
```

Please choose only one answer:

- Both statements at lines 1 and 2 are correct
- Both statements at lines 1 and 2 are incorrect and cause compilation errors
- Compilation error at line 1 , inner class can't access outer class local variables
- Compilation error at line 2, inner class can't access method's arguments

Check the answer of this question online on QuizOver.com:

Question: [How to declare java inner class inside a method?](http://www.quizover.com/pdf/how-to-declare-java-inner-class-inside-a-method)

Permalink: <http://www.quizover.com/pdf/how-to-declare-java-inner-class-inside-a-method>

4.1.6. What statement,inserted independently at // insert statement here, ...

Author: JavaChamp Team

What statement,inserted independently at // insert statement here, would produce output "Body" ?

```
public class Body {  
    String name = "Body";  
  
    public static void main(String[] args) {  
        System.out.println(new Body().new Heart().getPName());  
    }  
  
    class Heart {  
        String name = "Heart";  
  
        String getPName() {  
            // insert statement here  
        }  
    }  
}
```

Please choose only one answer:

- return Body.name;
- return Body.this.name;
- return super.name;
- return this.super.name;

Check the answer of this question online on QuizOver.com:

Question: [How java inner class access outer class?](http://www.quizover.com/pdf/how-java-inner-class-access-outer-class)

Permalink: <http://www.quizover.com/pdf/how-java-inner-class-access-outer-class>

4.1.7. whether program will compile?

Author: Aroraila975

whether program will compile?

```
public class outer
{
    public static void main(String[] a)
    {
        static class inner{
        }
    }
}
```

Please choose only one answer:

- No, because local class can not be explicitly declared static.
- Yes its correct

Check the answer of this question online on QuizOver.com:

Question: [java inner class](#)

Permalink: <http://www.quizover.com/pdf/java-inner-class>

4.1.8. What is the right output?

Author: MrDick

What is the right output?

```
class Outer {  
    private int i = 5; // line 1  
  
    Outer(int i){ // line 2  
        this.i = i; // line 3  
        System.out.print(++i); // line 4  
    }  
  
    class Inner{  
        Inner(){  
            System.out.print(", " + i++); // line 5  
        }  
    }  
    public static void main(String[] args) {  
        int i = 6;  
        Outer.Inner in = new Outer(i).new Inner(); // line 6  
    }  
}
```

Please choose only one answer:

- 6,6
- 5,6
- 7,6
- 7,7
- Compilation error in line 6
- Compilation error in line 5 inner class can't access to private variables

Check the answer of this question online on QuizOver.com:

Question: [java inner class access control](http://www.quizover.com/pdf/java-inner-class-access-control)

Permalink: <http://www.quizover.com/pdf/java-inner-class-access-control>

4.1.9. What will be the result of above code ?

Author: Kausik

What will be the result of above code ?

```
public class Test {  
    public static void main(String[] args) {  
        new OuterClass(); // line 3  
    }  
}  
  
class OuterClass {  
    private int x = 9; // line 5  
  
    public OuterClass() {  
        InnerClass inner = new InnerClass(); // line 7  
        inner.innerMethod();  
    }  
  
    class InnerClass {  
        public void innerMethod() {  
            System.out.println(x);  
        }  
    }  
}
```

Please choose only one answer:

- (1) Prints 9
- (2) Error during compilation at line 3
- (3) Error during compilation at line 5
- (4) Error during compilation at line 7

Check the answer of this question online on QuizOver.com:

Question: [java inner class access](http://www.quizover.com/pdf/java-inner-class-access)

Permalink: <http://www.quizover.com/pdf/java-inner-class-access>

4. Chapter: Flow Control

1. Flow Control Questions

4.1.1. What is the expected output?

Author: JavaChamp Team

What is the expected output?

```
public class LoopTest {
    public static void goLoop(int a) {

        start: for (int i = 1; i < 2; i++) {
            for (int j = 1; j < 2; j++) {
                if (a < 5) {
                    break;
                }
                System.out.print(i + j);
            }
        }
        if (a > 5) {
            break start;
        }

    }
}

public static void main(String args[]) {
    LoopTest.goLoop(15);
}
}
```

Please choose only one answer:

- 2
- No output is produced
- Compile Error
- Runtime exception is thrown
- 24

Check the answer of this question online on QuizOver.com:

Question: [How to write java labeled for loop?](http://www.quizover.com/pdf/how-to-write-java-labeled-for-loop)

Permalink: <http://www.quizover.com/pdf/how-to-write-java-labeled-for-loop>

4.1.2. What is the expected output?

Author: JavaChamp Team

What is the expected output?

```
public class LoopTest {  
    public static void goLoop(int a) {  
  
        start: for (int i = 1; i < 2; i++) {  
            for (int j = 1; j < 2; j++) {  
                if (a > 5) {  
                    break start;  
                }  
                System.out.print(i + j);  
            }  
        }  
    }  
  
    public static void main(String args[]) {  
        LoopTest.goLoop(15);  
    }  
}
```

Please choose only one answer:

- 2
- No output is produced
- Compile Error
- Runtime exception is thrown
- 24

Check the answer of this question online on QuizOver.com:

Question: [How to use break and continue in java for loop?](http://www.quizover.com/pdf/how-to-use-break-and-continue-in-java-for-loop)

Permalink: <http://www.quizover.com/pdf/how-to-use-break-and-continue-in-java-for-loop>

4.1.3. What is the result of compiling and running the following code?

Author: [JavaChamp Team](#)

What is the result of compiling and running the following code?

```
public class LoopTest {
    public static void goLoop(int a) {

        start: for (int i = 1; i < 2; i++) {
            for (int j = 1; j < 2; j++) {
                if (a > 5) {
                    break start;
                }
                System.out.print(i + j);
            }
        }

    }

    public static void main(String args[]) {
        LoopTest.goLoop(15);
    }
}
```

Please choose only one answer:

- 2
- No output is produced
- Compile Error
- Runtime exception is thrown
- 24

Check the answer of this question online on [QuizOver.com](http://www.quizover.com):

Question: [How to use break and continue loop control commands in java?](#)

Permalink: <http://www.quizover.com/pdf/how-to-use-break-and-continue-loop-control-commands-in-java>

4.1.4. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class LoopTest {
    public static void goLoop(int a) {

        outside: for (int i = 0; i < 3; i++) {
            inside: for (int j = 1; j < 3; j++) {
                System.out.print(j);
                if (a > 5) {
                    continue outside;
                }
            }
        }

    }

    public static void main(String args[]) {
        LoopTest.goLoop(15);
    }
}
```

Please choose only one answer:

- 121212
- No output is produced
- Compile Error
- Runtime exception is thrown
- 111

Check the answer of this question online on QuizOver.com:

Question: [How to use break and continue in java labeled for loop?](http://www.quizover.com/pdf/how-to-use-break-and-continue-in-java-labeled-for-loop)

Permalink: <http://www.quizover.com/pdf/how-to-use-break-and-continue-in-java-labeled-for-loop>

4.1.5. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class LoopTest {  
    public static void main(String args[]) {  
        int a = 15;  
        outside: for (int i = 0; i < 3; i++) { // line 4  
            inside: System.out.print(i); // line 5  
            for (int j = 1; j < 3; j++) {  
                if (a > 5)  
                    continue inside; // line 8  
                break outside; // line 9  
            }  
        }  
    }  
}
```

Please choose only one answer:

- Compile Error at line 5
- Runtime exception is thrown at line 5
- Compile Error at line 8
- Runtime exception is thrown at line 8
- No output is produced
- Compile Error at line 4
- Compile Error at line 9
- Runtime exception is thrown at line 9

Check the answer of this question online on QuizOver.com:

Question: [How to use break and continue in java loop?](http://www.quizover.com/pdf/how-to-use-break-and-continue-in-java-loop)

Permalink: <http://www.quizover.com/pdf/how-to-use-break-and-continue-in-java-loop>

4.1.6. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class LoopTest {  
    public static void main(String args[]) {  
        int a = 5;  
        outside: for (int i = 1; i < 3; i++) {  
            inside: for (int j = 1; j < 3; j++) {  
                System.out.print(j);  
                if (a++ > 6)  
                    continue inside;  
                break outside;  
            }  
        }  
    }  
}
```

Please choose only one answer:

- Compile error
- Runtime exception is thrown
- 1
- 123

Check the answer of this question online on QuizOver.com:

Question: [How to use continue and break in java loop?](http://www.quizover.com/pdf/how-to-use-continue-and-break-in-java-loop)

Permalink: <http://www.quizover.com/pdf/how-to-use-continue-and-break-in-java-loop>

4.1.7. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    int j = 10;  
    switch (1) {  
        case 20:  
            j += 1;  
        case 40:  
            j += 2;  
        default:  
            j += 3;  
        case 0:  
            j += 4;  
    }  
    System.out.print(j);  
}
```

Please choose only one answer:

- Compile error, can't use constant 1 in the switch, must be final variable
- Compile error, default must be the last statement after all the cases
- Compile error, must have break statement within each case
- 17
- 13

Check the answer of this question online on QuizOver.com:

Question: [How to write java switch statement?](#)

Permalink: <http://www.quizover.com/pdf/how-to-write-java-switch-statement>

4.1.8. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
    public static void main(String[] args) {  
  
        do {  
            System.out.print("inside do");  
        } while (false);  
  
        while (false) {  
            System.out.print("inside while");  
        }  
        System.out.print("outside");  
    }  
}
```

Please choose only one answer:

- inside dooutside
- outside
- compilation error because of the second loop (while statement)

Check the answer of this question online on QuizOver.com:

Question: [do while loop syntax in java](http://www.quizover.com/pdf/do-while-loop-syntax-in-java)

Permalink: <http://www.quizover.com/pdf/do-while-loop-syntax-in-java>

4.1.9. Which of the following is correct after running this code ?

Author: Yasser Ibrahim

Which of the following is correct after running this code ?

```
public class Tester {  
  
    public static void main(String[] args) {  
        char code = 'a';  
        for (int i = 1; i <= 10; i++) {  
            switch (i) {  
  
                case 5: {  
                    System.out.println("match");  
                }  
  
                default: {  
                    System.out.println("default");  
                }  
            }  
        }  
    }  
}
```

Please choose all the answers that apply:

- match will be printed 0 time
- match will be printed one time
- default will be printed 10 times
- default will be printed 11 times

Check the answer of this question online on QuizOver.com:

Question: [Java switch statement syntax](#)

Permalink: <http://www.quizover.com/pdf/java-switch-statement-syntax>

4.1.10. What is the result of running the following program (which was comp...

Author: JavaChamp Team

What is the result of running the following program (which was compiled fine) given the command line:

java Tester one two

```
public class Tester {  
    public static void main(String[] args) {  
        if (args.length > 0)  
            for (String str : args)  
                System.out.print(str);  
                System.out.print("--");  
    }  
}
```

Please choose only one answer:

- one--two--
- onetwo
- onetwo--
- Tester--one--two--
- Testeronetwo--

Check the answer of this question online on QuizOver.com:

Question: [How to use java main method argument?](http://www.quizover.com/pdf/how-to-use-java-main-method-argument)

Permalink: <http://www.quizover.com/pdf/how-to-use-java-main-method-argument>

4.1.11. Given the following code, which of if-statements declared is correc...

Author: JavaChamp Team

Given the following code, which of if-statements declared is correctly written and causes no compilation error?

```
public class Tester {  
  
    public static void main(String[] args) {  
        int x = 9;  
  
        // stmt 1  
        if (x>0){}  
  
        // stmt 2  
        if (x=9){} else {}  
  
        // stmt 3  
        if (true){  
        } else if (x<0){  
        }  
  
        // stmt 4  
        if (true){  
        } else {x<0}{  
        } else {  
        }  
  
        // stmt 5  
        if(true){  
            if (false){  
            }  
        } else {  
        }  
    } else {  
        if (true){  
        }  
    }  
}
```

Please choose all the answers that apply:

- stmt 1
- stmt 2
- stmt 3
- stmt 4
- stmt 5

Check the answer of this question online on QuizOver.com:

Question: [how to write if statement in java?](#)

Permalink: <http://www.quizover.com/pdf/how-to-write-if-statement-in-java>

4.1.12. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    boolean flag = false;  
    int x = 0;  
    do {  
        x++;  
    } while (flag!=flag);  
    System.out.println(x);  
}
```

Please choose only one answer:

- 0
- 1
- 2
- 3
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to write do while statement in java?](http://www.quizover.com/pdf/how-to-write-do-while-statement-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-write-do-while-statement-in-java>

4.1.13. What is the output of this code?

Author: Abhishek Sawant

What is the output of this code?

```
public class SwitchTest{
enum Color {RED, GREEN, BLUE};
public static void main(String []args){
    Color clr = Color.GREEN;
    long x = 2;

    switch(x){ // #1
    case 1:
        System.out.println("1");
        break;

    case 2:
        System.out.println("2");

    case 3:
        System.out.println("3");
        break;

    default:
        System.out.println("default");
        break;
    }

    switch(clr){ // #2
    case RED:
        System.out.println("Red");
        break;

    case GREEN:
        System.out.println("Green");
        break;

    case BLUE:
        System.out.println("Blue");
        break;
    }
    }
}
```

Please choose only one answer:

- a) 2 Green
- b) 2 3 Green
- c) 2 3
- d) Compilation error at #1
- e) Compilation error at #2
- f) Runtime exception at #2

Check the answer of this question online on QuizOver.com:

Question: [java switch control example](#)

Permalink: <http://www.quizover.com/pdf/java-switch-control-example>

4.1.14. what will be the output of compiling and running this code:

Author: Pankaj Gupta

what will be the output of compiling and running this code:

```
class TestByte{
public static void main(String arg[])
{
final Integer a=10;
int b=2;
switch(b)
{
case 1: System.out.println("1");
break;
case 2: System.out.println("2");
break;
case a: System.out.println("3");
break;
}
}
}
```

Please choose only one answer:

- compiler error
- prints 2
- Runtime exception is generated.
- prints 3

Check the answer of this question online on QuizOver.com:

Question: [how to write switch case statement in java](http://www.quizover.com/pdf/how-to-write-switch-case-statement-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-write-switch-case-statement-in-java>

4.1.15. Knowing that character 'a' has a numeric value equal to 97, what is...

Author: Pedro Kowalski

Knowing that character 'a' has a numeric value equal to 97, what is the output of the following code

```
public class CaseTest {  
    public static void main(String... s) {  
        char c = 'a';  
  
        switch (c) {  
            case 'a': {  
                System.out.println("a");  
                break;  
            }  
  
            case 97: {  
                System.out.println("(int)a");  
                break;  
            }  
        }  
    }  
}
```

Please choose only one answer:

- a
- (int)a
- a (int)a
- compilation fails

Check the answer of this question online on QuizOver.com:

Question: [switch with char variable and duplicate cases in java](http://www.quizover.com/pdf/switch-with-char-variable-and-duplicate-cases-in-java)

Permalink: <http://www.quizover.com/pdf/switch-with-char-variable-and-duplicate-cases-in-java>

4.1.16. what is the result of running and the compiling the following code?

Author: Nikhil Kumar

what is the result of running and the compiling the following code?

```
class ExamDemo3{
static{new ExamDemo3();}
{System.out.println("Init Block");}
ExamDemo3(){
System.out.println("Constructor Runs");
}
static{System.out.println("static init 2");}
public static void main(String... args){
System.out.println("Inside main method");
}
}
```

Please choose only one answer:

- Compile Time Error
- ExceptionInitializerError is thrown
- Init Block
- Constructor Runs
- static init 2
- Inside main method

Check the answer of this question online on QuizOver.com:

Question: [static block order changed Nikhil Kumar](#)

Permalink: <http://www.quizover.com/pdf/static-block-order-changed-nikhil-kumar>

4. Chapter: Declarations and Access Control

1. Declarations and Access Control Questions

4.1.1. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
    static int x = 4;  
  
    public Tester() {  
        System.out.print(this.x); // line 4  
        Tester();  
    }  
  
    public static void Tester() { // line 8  
        System.out.print(this.x); // line 9  
    }  
  
    public static void main(String... args) { // line 12  
        new Tester();  
    }  
}
```

Please choose only one answer:

- Compile error at line 4 (static x must be only accessed inside static methods)
- Compile error at line 8 (constructors can't be static)
- Compile error at line 9 (static methods can't invoke this)
- Compile error at line 12 (invalid argument type for method main)
- 44

Check the answer of this question online on QuizOver.com:

Question: [Can java static methods invoke this?](http://www.quizover.com/pdf/can-java-static-methods-invoke-this)

Permalink: <http://www.quizover.com/pdf/can-java-static-methods-invoke-this>

4.1.2. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    static int x = 4;  
    int y = 9;  
  
    public Tester() {  
        System.out.print(this.x); // line 7  
        printVariables();  
    }  
  
    public static void printVariables() {  
        System.out.print(x); // line 12  
        System.out.print(y); // line 13  
    }  
  
    public static void main(String... args) { // line 16  
        new Tester();  
    }  
}
```

Please choose only one answer:

- Compile error at line 7 (static x must be only accessed inside static methods)
- Compile error at line 13 (static methods cant make reference to non-static variables)
- Compile error at line 16 (invalid argument type for method main)
- 49
- Compile error at line 12 (must access x by writing Tester.x)

Check the answer of this question online on QuizOver.com:

Question: [What can java static methods make references to?](http://www.quizover.com/pdf/what-can-java-static-methods-make-references-to)

Permalink: <http://www.quizover.com/pdf/what-can-java-static-methods-make-references-to>

4.1.3. You have two packages, trunk1 and trunk2 where class Sheet declared...

Author: Yasser Ibrahim

You have two packages, trunk1 and trunk2 where class Sheet declared in trunk1

and class Container declared in trunk2, the following code contains a compilation error, where could it be?

```
package trunk1;

public class Sheet {

    public static int pageNumber = 99; // line 1
    Sheet() {} // line 2
}

package trunk2;

import trunk1.Sheet;

public class Container {

    public static void main(String... args) { //line 1
        System.out.print(Sheet.pageNumber); //line 2
        Sheet sheet = new Sheet(); //line 3
    }
}
```

Please choose only one answer:

- In package trunk1 at line 2, constructor Sheet must be marked public like its class
- In package trunk2 at line 1, invalid string argument for method main()
- In package trunk2 at line 2, invalid access to member pageNumber
- In package trunk2 at line 3, invalid call to constructor Sheet()

Check the answer of this question online on QuizOver.com:

Question: [How to access a class from another package in java?](http://www.quizover.com/pdf/how-to-access-a-class-from-another-package-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-access-a-class-from-another-package-in-java>

4.1.4. You have three packages, trunk1, trunk2 and trunk3, What is the expected output of compiling and running file Tester?

Author: JavaChamp Team

You have three packages, trunk1, trunk2 and trunk3, What is the expected output of compiling and running file Tester?

```
package trunk1;

public class Account {

    Account() { //line 1
        System.out.println("Account");
    }
}

package trunk2;

import trunk1.Account;

public class CurrentAccount extends Account{
    public CurrentAccount() { // line 2
        System.out.println("CurrentAccount");
    }
}

package trunk3;

import trunk1.Account;
import trunk2.CurrentAccount; // line 3

public class Tester {

    public static void main(String[] args) {
        Account c = new Account(); // line 4
        CurrentAccount ca = new CurrentAccount();
    }
}
```

Please choose all the answers that apply:

- Account
CurrentAccount
- Account
Account
CurrentAccount
- Compilation error in package trunk1 at line 1
- Compilation error, in package trunk2 at line 2

- Compilation error, in package trunk3 at line 3
- Compilation error, in package trunk3 at line 4

Check the answer of this question online on QuizOver.com:

Question: [packages and access scope in java](#)

Permalink: <http://www.quizover.com/pdf/packages-and-access-scope-in-java>

4.1.5. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
    static int p = test(); //line 1  
  
    static public int test() {  
        System.out.print(p); //line 4  
        return 99;  
    }  
  
    public static void main(String[] args)  
    {  
        System.out.print(p); //line 11  
    }  
}
```

Please choose only one answer:

- 099
- Compilation error at line 1, p must be initialized by a value
- Compilation error at line 4, using uninitialized variable p
- Compilation error at line 11, p must be called using its class by writing Tester.p

Check the answer of this question online on QuizOver.com:

Question: [How to use java static members?](http://www.quizover.com/pdf/how-to-use-java-static-members)

Permalink: <http://www.quizover.com/pdf/how-to-use-java-static-members>

4.1.6. Consider the following two classes declared and defined in two diff...

Author: JavaChamp Team

Consider the following two classes declared and defined in two different packages, what can be added in class B to form what considered a correct access to class A from main() method of class B?

```
package subPackage;

public class A { }


package anotherPackage;
// line 1
public class B {
    public static void main(String[] args) {
        // line 2
    }
}
```

Please choose all the answers that apply:

- at line 1 add nothing
at line 2 add : new A();
- at line 1 add: import package.*;
at line 2 add : new subPackage.A();
- at line 1 add: import subPackage.*;
at line 2 add : new A();
- at line 1 add: import subPackage.A;
at line 2 add : new A();
- at line 1 add nothing
at line 2 add : new subPackage.A();

Check the answer of this question online on QuizOver.com:

Question: [How to access java class from another package?](http://www.quizover.com/pdf/how-to-access-java-class-from-another-package)

Permalink: <http://www.quizover.com/pdf/how-to-access-java-class-from-another-package>

4.1.7. Given the following declarations, what is considered a correct stat...

Author: JavaChamp Team

Given the following declarations, what is considered a correct statement?

```
interface Chewable {}  
interface Eatable extends Chewable{}  
class Vitamin{}  
class Food implements Eatable { Vitamin[] vitamins;}
```

Please choose all the answers that apply:

- Eatable is Chewable
- Vitamin is Eatable
- Food is Chewable
- Food has Vitamin
- Vitamin has Food
- Food is an Object

Check the answer of this question online on QuizOver.com:

Question: [types of relationships between java classes](http://www.quizover.com/pdf/types-of-relationships-between-java-classes)

Permalink: <http://www.quizover.com/pdf/types-of-relationships-between-java-classes>

4.1.8. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
class Base {  
    private Base() {System.out.print("Base");}  
}  
  
public class Derived extends Base {  
    public Derived() {System.out.print("Derived");}  
  
    public static void main(String[] args) {  
        new Derived();  
    }  
}
```

Please choose only one answer:

- BaseDerived
- Derived
- Exception is thrown at runtime
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [Can java constructor be private?](http://www.quizover.com/pdf/can-java-constructor-be-private)

Permalink: <http://www.quizover.com/pdf/can-java-constructor-be-private>

4.1.9. Which of the following is true?

Author: Yasser Ibrahim

Which of the following is true?

Please choose all the answers that apply:

- When a class marked final, it cannot be extended
- When a method marked final, it cannot be overridden
- When a method marked final, it cannot be overloaded
- Local variables of a method cannot be final
- A variable of a primitive type (int,float,..) which marked final, its value at initialization cannot be changed

Check the answer of this question online on QuizOver.com:

Question: [what does final do in java?](#)

Permalink: <http://www.quizover.com/pdf/what-does-final-do-in-java>

4.1.10. What does it mean to mark a class strictfp?

Author: JavaChamp Team

What does it mean to mark a class strictfp?

Please choose only one answer:

- it means this class can't be subclassed
- it means this class can never be instantiated and it is to be extended
- it means that any method code in the class will conform to the IEEE 754 standard rules for floating points

Check the answer of this question online on QuizOver.com:

Question: [strictfp in java](#)

Permalink: <http://www.quizover.com/pdf/strictfp-in-java>

4.1.11. What can be marked with strictfp modifier?

Author: Yasser Ibrahim

What can be marked with strictfp modifier?

Please choose all the answers that apply:

- an interface
- a class
- a member method
- a member field
- a local variable

Check the answer of this question online on QuizOver.com:

Question: [strictfp modifier in java](#)

Permalink: <http://www.quizover.com/pdf/strictfp-modifier-in-java>

4.1.12. A top level Java class can have the following modifiers:

Author: [JavaChamp Team](#)

A top level Java class can have the following modifiers:

Please choose all the answers that apply:

- strictfp and final
- abstract and final
- public and abstract
- protected
- private

Check the answer of this question online on [QuizOver.com](#):

Question: [top level class modifiers in java](#)

Permalink: <http://www.quizover.com/pdf/top-level-class-modifiers-in-java>

4.1.13. An inner class in java can have the following modifiers (at the sam...

Author: JavaChamp Team

An inner class in java can have the following modifiers (at the same time):

Please choose all the answers that apply:

- public and abstract
- abstract and final
- protected
- private

Check the answer of this question online on QuizOver.com:

Question: [inner class modifiers in java](#)

Permalink: <http://www.quizover.com/pdf/inner-class-modifiers-in-java>

4.1.14. What is the output ?

Author: Nikhil Kumar

What is the output ?

```
class InitDemo{
    static int i=demo();
    static{System.out.println(i);}
    InitDemo(){
        System.out.println("hello 1");
    }
    public static void main(String... args){
        System.out.println("Hello 2");
    }
    static int demo(){
        System.out.println("Inside Demo");
        return 10;
    }
}
```

Please choose only one answer:

- Compilation error
- IllegalArgumentException is thrown at runtime.
- Inside Demo
10
Hello 2
- Hello 2
Inside Demo
10

Check the answer of this question online on QuizOver.com:

Question: [static public private access modifiers java nikhil kumar](#)

Permalink: <http://www.quizover.com/pdf/static-public-private-access-modifiers-java-nikhil-kumar>

4.1.15. This is legal or not?

Author: MrDick

This is legal or not?

```
final strictfp public class Parent implements Serializable {}
```

Please choose only one answer:

- legal and compile free
- No, there is compliation error(s)

Check the answer of this question online on QuizOver.com:

Question: [java final strictfp public class](#)

Permalink: <http://www.quizover.com/pdf/java-final-strictfp-public-class>

4.1.16. Which of the following are NOT LEGAL Java identifiers according to ...

Author: Alinaloana Florea

Which of the following are NOT LEGAL Java identifiers according to the "java language specification"?

```
int ; // line 1
int ____9_y; // line 2
int €a; // line 3
int £b_, c; // line 4
int this_is_a_way_too_long_name_for_an_identifier; // line 5
int d3#; // line 6
int -e, 7g, :h; // line 7
float .f; // line 8
double _$$_; // line 9
int true = 10; // line 10
int null = 4; // line 11
int foo = 3; // line 12
int Foo = 3; // line 13
int continue = 6; // line 14
int Volatile = 6; // line 15
public abstract void addEvent(); // line 16
```

Please choose all the answers that apply:

- lines 1, 3, 4 - contain invalid characters for Java identifiers
- line 5 - is too long
- line 16 - is not a valid JavaBean identifier for a method that wants to add a listener to an event source
- lines 6 and 8 - can NOT contain "#" and "." even if assigned to a numeric or floating point variable
- line 7 - can NOT contain the characters "-" and ":", nor can a Java identifier start with a digit
- lines 10, 11 and 14

Check the answer of this question online on QuizOver.com:

Question: [Alinaloana Florea legal java identifiers](#)

Permalink: <http://www.quizover.com/pdf/question-alinaioana-florea-legal-java-identifiers>

4.1.17. Which of the following are NOT valid JavaBeans identifiers for meth...

Author: Alinaloana Florea

Which of the following are NOT valid JavaBeans identifiers for methods that add/remove listeners from an event source?

```
// Event subscribers:  
public void addXListener(MyListener m) // line 1  
void addXListener() // line 2  
public void addEvent(Event e) // line 3  
public void addEventListener(EventListener e) // line 4  
// Event removers:  
public void removeMyListener(MyListener m) // line 5  
public void removeMyListener() // line 6  
public void deleteActionListner(ActionListsnr m) // line 7
```

Please choose all the answers that apply:

- lines 1 and 3 - the names of the methods do not match the type of argument they receive + JavaBeans adder/remover methods should always end with "Listener"
- line 2 - JavaBeans methods must be public in order to provide access to the private variables of a class + it's missing an argument of type XListener
- line 4 - it's adding or missing something
- line 5 - the name of its argument should be more meaningful
- line 6 - it misses the event to be removed
- line 7 - should be "remove" instead of "delete"

Check the answer of this question online on QuizOver.com:

Question: [illegal javabeans identifiers for methods that add /remove listeners](http://www.quizover.com/pdf/illegal-javabeans-identifiers-for-methods-that-add-remove-listeners)

Permalink: <http://www.quizover.com/pdf/illegal-javabeans-identifiers-for-methods-that-add-remove-listeners>

4.1.18. Which of the following are NOT valid JavaBeans method identifiers f...

Author: Alinaloana Florea

Which of the following are NOT valid JavaBeans method identifiers for setters/getters of private class variables?

```
// Property setters:  
void setCustomername() // line 1  
public int modifyValue(int val) // line 2  
public void setCustomerName(String customer) // line 3  
public void setIsAlive(boolean isAlive) // line 4  
public void addSize(int size) // line 5  
public void putSize(int size) // line 6  
// Property getters:  
public int getMyValue() // line 7  
public int getAccount#(String clientName) // line 8  
protected boolean getHappy() // line 9  
public boolean isHappy() // line 10  
public boolean getHappy() // line 11  
public int isNrOfFlowers() // line 12
```

Please choose all the answers that apply:

- lines 1 and 9 - JavaBeans methods must be public in order to provide access to the private variables of a class
- lines 2, 5 and 6 - according to JavaBeans "add" should be used only with listener methods, and "set" should be used instead of "put" and "modify"
line 8 - will produce a compile-time error due to invalid Java identifier
- line 3 - the method's argument name should match the one its name: "customerName"
- lines 4, 7 and 11 - are adding or missing some things
- line 10 - it should be getHappy() because it's a getter method as it returns a value
- line 12 - "nrOfFlowers" seems to be of type "int" not "boolean", as that's what the method is returning, so it should be "get" instead of "is"

Check the answer of this question online on QuizOver.com:

Question: [legal javabeans method identifiers for setters /getters](http://www.quizover.com/pdf/legal-javabeans-method-identifiers-for-setters-getters)

Permalink: <http://www.quizover.com/pdf/legal-javabeans-method-identifiers-for-setters-getters>

4.1.19. Correct the code in AnimalXyZ.java:

Author: Alinaloana Florea

Correct the code in AnimalXyZ.java:

```
public /*x1*/ class /*x2*/ Animal implements Runnable {}

package test2;
/*x3*/import java.io.Serializable;

/*x4*/public class Dog extends Animal implements /*x5*/ Serializable
{
    void /*x6*/ doStuff(/*x7*/int arg1, int /*x8*/ arg2) {} // wrong comments
}

class X{}
class Y{}
```

Please choose all the answers that apply:

- remove the "x#" comments, they are placed in wrong places
- move the package and the import statements at the beginning of the file
- make "Animal" and "Dog" abstract as they do NOT implement the run() from the Runnable interface
- remove the "public" from "Dog", as only one class can be public in a .java file
- - rename "Animal" to "AnimalXyZ" as the only public class in a .java file must match the name of the file
- OR make ALL classes in the file "default"
- "import java.lang.Runnable;" is necessary at beginning of the file

Check the answer of this question online on QuizOver.com:

Question: [java comments packages imports](#)

Permalink: <http://www.quizover.com/pdf/java-comments-packages-imports>

4.1.20. Choose all the lines which if inserted independently instead of "//...

Author: Alinaloana Florea

Choose all the lines which if inserted independently instead of "//insert code here" will allow the following code to compile:

```
public class Test
{
    public static void main(String[] args)
    {
        add();
        add(1);
        add(1, 2);
    }

    // insert code here
}
```

Please choose only one answer:

- 1. void add(Integer... args){}
- 2. static void add(int... args, int y){}
- 3. static void add(int args...){}
- 4. static void add(int[]... args){}
- 5. static void add(int...args){} ;

Check the answer of this question online on QuizOver.com:

Question: [correct usage of var-args](#) Choose all the Alinaloana Oracle Certified

Permalink: <http://www.quizover.com/pdf/question-correct-usage-of-var-args-choose-all-the-alinaioana-oracle-ce>

4.1.21. Correct the following code: (consider the packages as each being in...

Author: Alinaloana Florea

Correct the following code: (consider the packages as each being in a different file)

```
package pkgA;

public class X1
{
    X1() // line 1
    {
        public int x1 = 11; // line 2
        protected int x2=22; // line 2
        int x3 = 33;
        private int x4 = 44; // line 2

        System.out.println(x1 + "" + x2 + x3 + x4); // line 3
    }

    public int x1 = 1;
    static protected int x2 = 2;
    int x3 = 3;
    private int x4 = 4;
}

class X2 extends X1
{
    private int x4 = 4; // line 3.5

    public X2()
    {
        System.out.println(x1 + x2 + x3 + x4); // line 4

        X1 x1 = new X1();
        System.out.println(x1.x1 + x1.x2 + x1.x3 + x1.x4); // line 4
    }
}

protected class X3 {} // line 5
private class X4 {} // line 5

//
package pkgB;
import pkgA.*;

class Y extends X1
{
    Y()
    {
        System.out.println(x1 + x2 + x3 + x4); // line 6.1

        X2 x2 = new X2(); // line 7

        X1 x1 = new X1(); // line 8
        System.out.println(x1.x1+ x1.x2 + x1.x3 + x1.x4); // line 6.2
    }
}

public class Test extends Y
{
}
```



```
public static void main(String[] args)
{
    new Test().go();
}

void go()
{
    System.out.println(x1 + x2); // line 6.1

    Y y = new Y();
    System.out.println(y.x1+ y.x2 + y.x3 + y.x4); // line 6.2
}
```

Please choose all the answers that apply:

- line 1 - X1's constructor must be public for "new" to succeed on line 8. And a similar thing is on line 7, which will work only if the class X2 is made public in its package.
- lines 2 - local/method variables can be only "final" or "default"
- line 3 - won't compile because of the quotes added to those integers
line 3.5 - is not allowed to define a var with the same name as in the superclass
- lines 4 - can not print "x4" as it's private in class X1 so it can be used only inside X1
- lines 5 - when defined in a package, classes are allowed to be also static, private or protected
- lines 6 - should follow the same rules as the lines 4: "default" and "private" variables must be removed + the "protected" vars kept only when used through inheritance: on lines 6.1

Check the answer of this question online on QuizOver.com:

Question: [java access modifiers for non inner classes](http://www.quizover.com/pdf/java-access-modifiers-for-non-inner-classes)

Permalink: <http://www.quizover.com/pdf/java-access-modifiers-for-non-inner-classes>

4.1.22. (SCJP6) Correct the following code:

Author: Alinaloana Florea

(SCJP6) Correct the following code:

```
final class X1
{
    final X1() { System.out.print(B); } // line 1

    final int B = 9;

    final private void doStuff() {} // line 2
}

class X2 extends X1 // line 3
{
    final int B = 9;

    final static void doStuff() { System.out.println("hello from X2"); }
}

public class Test extends X2
{
    public static void main(String[] args)
    {
        doStuff();
        new Test().doStuff(3);
    }

    static void doStuff() {} // line 4
    void doStuff(int arg) { System.out.println("hello from Test"); } // line 5
}
```

Please choose all the answers that apply:

- line 1 - can not make a constructor final because it's not inheritable so it can not be anyway overridden
- lines 3 - can not extend/subclass a final class
- Can not use in class X2 the same variable and method names as in its superclass X1
- line 4 - can not override a final inherited method
- line 5 - can not overload a final inherited method
- line 2 - "final" can not be mixed with "private"

Check the answer of this question online on QuizOver.com:

Question: [how to write java final classes methods and primitives?](http://www.quizover.com/pdf/how-to-write-java-final-classes-methods-and-primitives?)

Permalink: <http://www.quizover.com/pdf/how-to-write-java-final-classes-methods-and-primitives>

4.1.23. (SCJP 6) Find the errors in:

Author: Alinaloana Florea

(SCJP 6) Find the errors in:

```
static class X // line 1
{
    static { a = 3; } // line 2

    static X() {} // line 1

    int a;
    static int b;

    void doX(){ System.out.println("In X" + a + b); } // line 3
    static void doStuff() { System.out.println("In X" + /*a*/ + b); } // line 4
}

public class Test extends X
{
    public static void main(String[] args)
    {
        X x = new X();

        doStuff();
        x.doStuff(); // line 5
        X.doStuff(); // line 5.2
    }

    void doStuff() // line 6
    {
        System.out.println("In Test");
    }
}
```

Please choose all the answers that apply:

- lines 1 - "static" can not mark classes and constructors
- line 2 - "static" can not mark an initialization block {}
- lines 2 - "b" must be used instead of "a" as in a static context(method/init block) it's possible to access only static variables
- lines 3 - a non-static context can access only non-static variables
- line 4 - a static method can access non-static variables("a"), but an error will occur because of the way "a" is commented leaving two "+" inside the print()
- line 6 - to be a valid override it must not be less accessible, so it must keep its static status + "static" is needed also because it's called directly in the static method main()

Check the answer of this question online on QuizOver.com:

Question: [how to write java static non inner classes?](http://www.quizover.com/pdf/how-to-write-java-static-non-inner-classes)

Permalink: <http://www.quizover.com/pdf/how-to-write-java-static-non-inner-classes>

4.1.24. Spot the errors in:

Author: Alinaloana Florea

Spot the errors in:

```
static int x; // line 1
static { System.out.println(x); x = 1; } // line 1

class X
{
    int x;
    static int y;
    static Integer z = new Integer(1);

    System.out.println(x + y); // line 2

    X()
    {
        for(int __x = 0; __x < 3; __x++) ;
        int #lb = 7; // line 3

        long [] arr [5]; // line 4
        Boolean []b[];

        System.out.println(x + y + z); // line 5
        System.out.println(x + y + "" + z); // line 6

        System.out.println(new X()); // line 7
    }
}
```

Please choose all the answers that apply:

- lines 1 - everything in Java must be within a class
line 2- can not print here
- line 3 - will produce a compilation error because it's using an invalid Java identifier
- the "for" statement before line 3 will not compile because of the semicolon following it
- line 4 - an array must specify its size only when creating an object of its type not at declaration
- line 6 - will not compile because of the added quotes
- line 7 - will produce a run-time infinite loop which will crash JVM

Check the answer of this question online on QuizOver.com:

Question: [how to write java variable declarations?](http://www.quizover.com/pdf/how-to-write-java-variable-declarations)

Permalink: <http://www.quizover.com/pdf/how-to-write-java-variable-declarations>

4.1.25. (SCJP6) Correct the following code:

Author: Alinaloana Florea

(SCJP6) Correct the following code:

```
class X
{
    X()
    {
        System.out.print(B);

        final int B; // line 1
        B=7;
        System.out.print(B);
        B=8; // line 2
        System.out.print(B);
    }

    int a;
    final int B = 9; // line 3
}

public class Test
{
    public static void main(String[] args)
    {
        final X x = new X();
        System.out.print(x.a);

        x = new X(); // line 4
        x.a = 3; // line 5
        System.out.println(x.a);
    }
}
```

Please choose only one answer:

- Final variables must be assigned an initial value, so the final variable "B" from line 1 must receive an initial value at its declaration time
- Lines 2 and 4 must be removed as final variables can not be reassigned
- Line 5 must be removed as is not allowed to modify the object referred by a final reference variable

Check the answer of this question online on QuizOver.com:

Question: [final variables SCJP6 Correct the following Alinaloana Oracle Quest](http://www.quizover.com/pdf/question-final-variables-scorp6-correct-the-following-alinaloana-oracle)

Permalink: <http://www.quizover.com/pdf/question-final-variables-scorp6-correct-the-following-alinaloana-oracle>

4.1.26. (SCJP 6) Find the errors in:

Author: Alinaloana Florea

(SCJP 6) Find the errors in:

```
class X
{
    X()
    {
        System.out.print(a);

        static int a; // line 1
        a=4;

        System.out.print(a);
        System.out.print(b);
    }

    int a;
    static int b;
}

public class Test extends X
{
    public static void main(String[] args)
    {
        X x = new X();

        System.out.println(a + "" + x.a + X.a); // line 2
        System.out.println(b + "" + x.b + X.b);
    }
}
```

Please choose all the answers that apply:

- line 1 - inside a method there can be only "final" and "default" variables, so line 1 should be removed
- line 1 - it would anyway not be allowed to define another "int a;" inside the constructor X()
- line 2 - "a" is not static inside X so it can not be called directly in a static context/main(), nor can it be called directly on class X
- The print lines inside main() will produce a compile-time error due to the quotes added to integer variables
- Static variables must be given a default value at their declaration time

Check the answer of this question online on QuizOver.com:

Question: [how to write java non static variables?](http://www.quizover.com/pdf/how-to-write-java-non-static-variables)

Permalink: <http://www.quizover.com/pdf/how-to-write-java-non-static-variables>

4. Chapter: Interfaces and Abstract Classes

1. Interfaces and Abstract Classes Questions

4.1.1. Is the following declaration for interface Bendable correct and fre...

Author: Yasser Ibrahim

Is the following declaration for interface Bendable correct and free of compilation error?

```
abstract interface Bendable { // line 1  
  
    final int x = 2009; // line 3  
  
    void method1() ; // line 5  
    public static class Angle {} // line 6  
}
```

Please choose only one answer:

- Yes, this is a correct and free of error declaration
- No, compilation error at line 1 , abstract should be removed
- No, compilation error at line 3 , x should be declared public final
- No, compilation error at line 5 , method method1() should be declared public abstract
- No, compilation error at line 6 , can't declare a class inside an interface

Check the answer of this question online on QuizOver.com:

Question: [How to declare a class inside an interface in java?](http://www.quizover.com/pdf/how-to-declare-a-class-inside-an-interface-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-declare-a-class-inside-an-interface-in-java>

4.1.2. Is the following declaration for interface Bendable correct and fre...

Author: Yasser Ibrahim

Is the following declaration for interface Bendable correct and free of compilation error?

```
abstract interface Bendable { // line 1  
  
    final int x = 2009; // line 3  
  
    void method1(); // line 5  
}
```

Please choose only one answer:

- Yes, this is a correct and free of error declaration
- No, compilation error at line 1, Bendable should be declared public abstract
- No, compilation error at line 3, x should be declared public final
- No, compilation error at line 5, method method1() should be declared public abstract

Check the answer of this question online on QuizOver.com:

Question: [How to declare java interface?](http://www.quizover.com/pdf/how-to-declare-java-interface)

Permalink: <http://www.quizover.com/pdf/how-to-declare-java-interface>

4.1.3. Is the following declaration for interface Bendable correct and fre...

Author: JavaChamp Team

Is the following declaration for interface Bendable correct and free of compilation error?

```
abstract interface Bendable { // line 1  
  
    final int x = 2009; // line 3  
  
    void method1(){}; // line 5  
}
```

Please choose only one answer:

- Yes, this is a correct and free of error declaration
- No, compilation error at line 1
- No, compilation error at line 3
- No, compilation error at line 5

Check the answer of this question online on QuizOver.com:

Question: [What are java interface legal declaration rules?](http://www.quizover.com/pdf/what-are-java-interface-legal-declaration-rules)

Permalink: <http://www.quizover.com/pdf/what-are-java-interface-legal-declaration-rules>

4.1.4. Will the following code compile correctly?

Author: Yasser Ibrahim

Will the following code compile correctly?

```
abstract class AirPlane {  
    abstract void fly();  
  
    void land() { // line 5  
        System.out.print("Landing..");  
    }  
}  
  
class AirJet extends AirPlane {  
    AirJet() {  
        super(); // line 14  
    }  
  
    void fly() {  
        System.out.print("Flying..");  
    }  
}
```

Please choose only one answer:

- Yes, it will compile with no errors
- No, because at line 5 method land() must be abstract since class AirPlane is abstract
- No, because class AirJet must override method land()
- No, because at line 14 AirJet constructor is calling the super() while AirPlane has no constructor defined

Check the answer of this question online on QuizOver.com:

Question: [How to extend java abstract class?](http://www.quizover.com/pdf/how-to-extend-java-abstract-class)

Permalink: <http://www.quizover.com/pdf/how-to-extend-java-abstract-class>

4.1.5. The following code contains a compilation error , what can be done ...

Author: Yasser Ibrahim

The following code contains a compilation error , what can be done to fix this error - independently?

```
abstract class AirPlane { // line 1
    abstract void fly(); // line 2

    void land() {
        System.out.print("Landing..");
    }
}

class AirJet extends AirPlane { // line 10

    AirJet() {
        super(); // line 13
    }

    void fly() {
        System.out.print("Flying..");
    }

    abstract void land() ; // line 20
}
```

Please choose all the answers that apply:

- Remove abstract from line 20 and add body to method land()
- Declare class AirJet as abstract to at line 10
- Remove super() call at line 13
- Remove abstract at line 1 and line 2

Check the answer of this question online on QuizOver.com:

Question: [Extending java abstract class](http://www.quizover.com/pdf/extending-java-abstract-class)

Permalink: <http://www.quizover.com/pdf/extending-java-abstract-class>

4.1.6. Which of the following is true?

Author: Yasser Ibrahim

Which of the following is true?

Please choose all the answers that apply:

- If a class is declared abstract , it must contain at least one abstract method
- If a class is declared abstract , all its methods must be abstract
- A method can either be final or abstract
- If a method is abstract then its class must be declared abstract
- An Abstract method has no body and ends with a semicolon

Check the answer of this question online on QuizOver.com:

Question: [Rules of declaring java abstract Class](#)

Permalink: <http://www.quizover.com/pdf/rules-of-declaring-java-abstract-class>

4.1.7. Which of the following variables is incorrectly declared?

Author: JavaChamp Team

Which of the following variables is incorrectly declared?

```
public abstract interface Bouncable {  
  
    int a = 0;  
    public int b = 1;  
    public static int c = 2;  
    public static transient int d = 3;  
    public final int e = 3;  
    public static final int f = 3;  
  
}
```

Please choose only one answer:

- a
- b
- c
- d
- e
- f

Check the answer of this question online on QuizOver.com:

Question: [How to declare variables inside java interface?](http://www.quizover.com/pdf/how-to-declare-variables-inside-java-interface)

Permalink: <http://www.quizover.com/pdf/how-to-declare-variables-inside-java-interface>

4.1.8. Three of the methods are incorrectly declared, which are they?

Author: JavaChamp Team

Three of the methods are incorrectly declared, which are they?

```
public abstract class Tester {  
    public void test1();  
    public final void test2() {};  
    public static void test3() {};  
    public abstract static void test4();  
    public abstract final void test5();  
}
```

Please choose only one answer:

- test1 , test2 and test4
- test2 , test4 and test5
- test1 , test4 and test5

Check the answer of this question online on QuizOver.com:

Question: [How to declare java abstract method?](http://www.quizover.com/pdf/how-to-declare-java-abstract-method)

Permalink: <http://www.quizover.com/pdf/how-to-declare-java-abstract-method>

4.1.9. Considering the following declaration for interface Convertable, wh...

Author: Yasser Ibrahim

Considering the following declaration for interface Convertable, which of the following code segments will compile?

```
public interface Convertable {  
  
    int convertToInt();  
    char convertToChar();  
  
}
```

Please choose all the answers that apply:

- class Digit implements Convertable {
 public char convertToChar() {
 return 0;
 }
 public int convertToInt() {
 return 0;
 }
}
- abstract class Digit implements Convertable {
 int convertToInt() ;
 char convertToChar();
}
- abstract class Digit implements Convertable {

 public int convertToInt() {
 return 0;
 }
}
- abstract class Digit implements Convertable {
 public int convertToInt() {
 return 0;
 }
 char convertToChar();
}
- class Digit implements Convertable {
 int convertToInt() {
 return 0;
 }

 char convertToChar() {

```
    return 0;
}
}
• interface Roundable extends Convertable {
    int roundUp();
}
```

Check the answer of this question online on QuizOver.com:

Question: [What are the rules to implement an interface?](http://www.quizover.com/pdf/what-are-the-rules-to-implement-an-interface)

Permalink: <http://www.quizover.com/pdf/what-are-the-rules-to-implement-an-interface>

4.1.10. Which of the following declaration will compile without errors?

Author: JavaChamp Team

Which of the following declaration will compile without errors?

Please choose all the answers that apply:

- `public abstract class Digit { public abstract void print(); }`
- `public class Digit { public abstract void print(); }`
- `public abstract class Digit { public abstract void print(){} }`
- `public abstract class Digit { public void print(); }`
- `public class Digit { public void print(){}; }`

Check the answer of this question online on QuizOver.com:

Question: [How to declare java abstract class?](http://www.quizover.com/pdf/how-to-declare-java-abstract-class)

Permalink: <http://www.quizover.com/pdf/how-to-declare-java-abstract-class>

4.1.11. Which of the following is correct about an interface in java?

Author: Yasser Ibrahim

Which of the following is correct about an interface in java?

Please choose all the answers that apply:

- An Interface can declare data members but must be constants
- All methods in an interface are implicitly abstract
- Methods in an interface may be public, private, protected.
- An interface can implement an abstract class
- An interface can be final

Check the answer of this question online on QuizOver.com:

Question: [how to write an interface?](#)

Permalink: <http://www.quizover.com/pdf/how-to-write-an-interface>

4.1.12. To resolve the compilation error(s) in the following code, what can...

Author: Yasser Ibrahim

To resolve the compilation error(s) in the following code, what can be done independently :

```
interface Movable {  
    public abstract void m1(); // line 1  
    void m2(); // line 2  
    public void m3(); // line 3  
    abstract void m4(); // line 4  
}  
  
class Chair implements Movable { // line 5  
    public void m1() { } // line 6  
    void m2() { } // line 7  
}
```

Please choose all the answers that apply:

- mark class Chair "abstract"
- mark Chair "abstract" and mark m2() "public"
- implement m3() and m4() in Chair (with public access modifier)
- implement the methods m3() and m4() in Chair (with public access modifier) and mark m2() in Chair "public"

Check the answer of this question online on QuizOver.com:

Question: [how to implement an interface in java?](http://www.quizover.com/pdf/how-to-implement-an-interface-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-implement-an-interface-in-java>

4.1.13. What is the correct output?

Author: MrDick

What is the correct output?

```
public interface Father {  
    public void go();  
}  
  
public interface Mother {  
    public void go();  
}  
  
class Test implements Father, Mother { // line 1  
    @Override  
    public void go(){ // line 2  
        System.out.println("Child");  
    }  
  
    public static void main(String args[]) {  
        new Test().go(); // line 3  
    }  
}
```

Please choose only one answer:

- Compilation error in line 1
- compilation error in line 2
- Child
- compilation error in line 3

Check the answer of this question online on QuizOver.com:

Question: [java interfaces](#)

Permalink: <http://www.quizover.com/pdf/java-interfaces>

4.1.14. Correct the following code:

Author: Alinaloana Florea

Correct the following code:

```
interface Pet
{
    int MAX_PET_NR = 10;
    void play();
}

interface Dressable
{
    void dress();
}

interface Animal {} // line 1

abstract class Dog extends Animal, Dressable, Pet // line 2
{
    public void play(int min){}
    void dress(){} // line 3
    void bark(){}
}

class Bulldog extends Dog implements Pet
{
    Dog dog;
    Dog dog1 = new Dog(); // line 4
    Dog dog2 = new Bulldog();

    void bark() throws RuntimeException // line 5
    {
        MAX_PET_NR = 2; // line 6
    }; // line 5
}
```

Please choose all the answers that apply:

- line 1 - a class (abstract or concrete) can not be empty
- line 2 - interfaces must be "implemented" by non-interface classes, and "extended" only by other interfaces
- line 3 - to be a valid implementation/override, dress() must stay at least the same as available, so it must keep the "public" access with which was marked automatically in its interface
- line 4 - is not ok as Dog is abstract so might not contain fully implemented methods from which to create a whole object. Also Bulldog has to implement play() as the version inherited from Dog is an overload not an override.
- line 5 - to be a valid override bark() may not throw any exception if the class it overrides doesn't throw an exception. Nor is it valid for Bulldog to extend again Pet as it inherits it already from Dog.

Check the answer of this question online on QuizOver.com:

Question: [how to implement java interfaces?](http://www.quizover.com/pdf/how-to-implement-java-interfaces)

Permalink: <http://www.quizover.com/pdf/how-to-implement-java-interfaces>

4. Chapter: Exceptions

1. Exceptions Questions

4.1.1. What is the expected output?

Author: JavaChamp Team

What is the expected output?

```
import java.io.IOException;

class Father {
    public Father() throws IOException {
        System.out.print("Father");
        throw new IOException();
    }
}

class Son extends Father {
    public Son() throws IOException {
        System.out.print("Son");
    }
}

public class Tester {
    public static void main(String[] args) {
        try {
            new Son();
        } catch (IOException e) {
            System.out.print("Inside catch");
        }
    }
}
```

Please choose only one answer:

- Compile error, constructors can't throw Exceptions
- FatherSon
- FatherInside catch
- Father, then an IOException is thrown
- Son
- SonInside catch

Check the answer of this question online on QuizOver.com:

Question: [Catching java exceptions](#)

Permalink: <http://www.quizover.com/pdf/catching-java-exceptions>

4.1.2. What is the expected output of compiling and running this code?

Author: Yasser Ibrahim

What is the expected output of compiling and running this code?

```
class Father {  
    public Father() throws RuntimeException {  
        System.out.print("Father");  
        throw new RuntimeException();  
    }  
}  
  
class Son extends Father {  
    public Son() throws RuntimeException {  
        System.out.print("Son");  
    }  
}  
  
public class Tester {  
    public static void main(String[] args) {  
        new Son(); // line 17  
    }  
}
```

Please choose only one answer:

- Compile error, an import to java.lang.RuntimeException is required
- Father will be printed then a RuntimeException would be thrown
- Compile error at line 17, new Son() should be within a try/catch block
- Son
- SonFather
- FatherSon

Check the answer of this question online on QuizOver.com:

Question: [How to handle java unchecked exceptions?](http://www.quizover.com/pdf/how-to-handle-java-unchecked-exceptions)

Permalink: <http://www.quizover.com/pdf/how-to-handle-java-unchecked-exceptions>

4.1.3. What is the expected result of compiling and running the following ...

Author: Yasser Ibrahim

What is the expected result of compiling and running the following code?

```
import java.io.IOException;

class AirPlane {
    public AirPlane() {
        System.out.print("AirPlane");
    }
}

class AirJet extends AirPlane {
    public AirJet() throws IOException {
        try {
            throw new IOException();
        } catch (IOException e) {
            System.out.print("IOException is thrown in AirJet");
        }
    }
}

public class Tester {
    public static void main(String args[]) {
        try {
            new AirJet();
        } catch (IOException e) {
            System.out.print("IOException is thrown in Tester");
        }
    }
}
```

Please choose only one answer:

- "AirPlaneIOException is thrown in AirJetIOException is thrown in Tester" will be printed
- "AirPlaneIOException is thrown in AirJet" will be printed
- "AirPlaneIOException is thrown in Tester" will be printed
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to catch java exceptions?](http://www.quizover.com/pdf/how-to-catch-java-exceptions)

Permalink: <http://www.quizover.com/pdf/how-to-catch-java-exceptions>

4.1.4. What is the expected output of compiling and running the following ...

Author: JavaChamp Team

What is the expected output of compiling and running the following code?

```
import java.io.IOException;

class AirPlane {
    public AirPlane() throws IOException, RuntimeException {
        System.out.println("AirPlane");
    }
}

class AirJet extends AirPlane { } // line 7

public class Tester {
    public static void main(String args[]) throws IOException { // line 10
        new AirPlane(); // line 11
    }
}
```

Please choose only one answer:

- AirPlane
- Compile error at line 7, AirJet must declare a constructor that throws IOException or any of its supertypes
- Compile error at line 10, main() must throw also RuntimeException
- Compile error at line 11 ,new AirPlane() must be within try/catch block

Check the answer of this question online on QuizOver.com:

Question: [Can java constructors throw exceptions?](http://www.quizover.com/pdf/can-java-constructors-throw-exceptions)

Permalink: <http://www.quizover.com/pdf/can-java-constructors-throw-exceptions>

4.1.5. What is the expected output?

Author: Yasser Ibrahim

What is the expected output?

```
interface Foldable {  
    public void fold() throws Exception ;  
}  
  
class Paper implements Foldable {  
    public void fold() { // line 6  
        System.out.print("Fold");  
    }  
}  
  
public class Tester {  
    public static void main(String args []) {  
        Foldable obj1 = new Paper();  
        obj1.fold(); // line 8  
        Paper obj2 = new Paper(); // line 10  
        obj2.fold();  
    }  
}
```

Please choose only one answer:

- FoldFold
- Compilation error at line 6, fold() must declare at header throws Exception
- Compilation error at line 8, unhandled exception
- RuntimeException at line 8
- Compilation error at line 10, unhandled exception

Check the answer of this question online on QuizOver.com:

Question: [How to use a try catch in java?](#)

Permalink: <http://www.quizover.com/pdf/how-to-use-a-try-catch-in-java>

4.1.6. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
    public static void main(String[] args) {  
  
        System.out.print("1");  
        try {  
            System.out.print("2");  
            System.exit(0);  
        } finally {  
            System.out.print("3");  
        }  
    }  
}
```

Please choose only one answer:

- 123
- 12
- Compilation error , there should be at least one catch before finally

Check the answer of this question online on QuizOver.com:

Question: [How to declare try catch finally block in java?](http://www.quizover.com/pdf/how-to-declare-try-catch-finally-block-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-declare-try-catch-finally-block-in-java>

4.1.7. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
    public static void main(String[] args) {  
  
        System.out.print("1");  
        try {  
            return;  
        } catch (Exception e) {  
            System.out.print("2");  
        } finally {  
            System.out.print("3");  
        }  
        System.out.print("4");  
    }  
}
```

Please choose only one answer:

- 1234
- 13
- 1
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [try catch finally block in java](#)

Permalink: <http://www.quizover.com/pdf/try-catch-finally-block-in-java>

4.1.8. What is the result of compiling and running the following program?

Author: JavaChamp Team

What is the result of compiling and running the following program?

```
public class Tester {  
    public static void main(String[] args) {  
        try {  
            throw new RuntimeException();  
        } catch (RuntimeException e) {  
            System.out.println("RuntimeException");  
        } catch (ArithmeticException e) {  
            System.out.println("ArithmeticException");  
        } catch (Exception e) {  
            System.out.println("Exception");  
        }  
    }  
}
```

Please choose only one answer:

- "RuntimeException" is printed
- "Exception" is printed
- "ArithmeticException" is printed
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to write java try catch statement?](#)

Permalink: <http://www.quizover.com/pdf/how-to-write-java-try-catch-statement>

4.1.9. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    static void method() throws Exception {  
        throw new Exception();  
    }  
  
    public static void main(String[] args) {  
  
        try {  
            method();  
        } catch (Throwable e) {  
            try {  
                throw new Exception() ;  
            } catch (Exception ex) {  
                System.out.print("exception");  
            } finally {  
                System.out.print("finally");  
            }  
        }  
    }  
}
```

Please choose only one answer:

- "exception" is printed
- "finally" is printed
- "exceptionfinally" is printed
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to write java nested try catch?](http://www.quizover.com/pdf/how-to-write-java-nested-try-catch)

Permalink: <http://www.quizover.com/pdf/how-to-write-java-nested-try-catch>

4.1.10. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
  
    static void method(){  
        throw new Exception();  
    }  
  
    public static void main(String[] args) {  
  
        try {  
            method();  
        } catch (Throwable e) {  
            try {  
                throw new Exception() ;  
            } catch (Exception ex) {  
                System.out.print("exception");  
            } finally {  
                System.out.print("finally");  
            }  
        }  
    }  
}
```

Please choose only one answer:

- exception
- finally
- exceptionfinally
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to write nested try catch in java?](http://www.quizover.com/pdf/how-to-write-nested-try-catch-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-write-nested-try-catch-in-java>

4.1.11. The following code contains compilation errors, what of the followi...

Author: JavaChamp Team

The following code contains compilation errors, what of the following possible solutions (made together) can be done to remove these errors, putting in mind that all necessary imports will be added automatically?

```
import java.io.File;
import java.text.DateFormat;
import java.util.Date;

public class Tester {

    static void call() { // line 3
        File file = new File("javachamp.dat"); //line 4
        file.createNewFile(); // line 5
        throw new IllegalArgumentException(); // line 6
    }

    public static void main(String[] args) {

        call(); // line 11
        DateFormat df = DateFormat.getDateInstance(); // line 12
        Date parse = df.parse("12.11.2009"); // line 13
    }
}
```

Please choose all the answers that apply:

- Add throws IOException declaration to call() at line 3
- Add throws FileNotFoundException declaration to call() at line 3
- Add throws IllegalArgumentException declaration to call() at line 3
- Surround code from line 11 to 13 with try { } catch (IOException e) {} block
- Surround code from line 11 to 13 with try { } catch (Exception e) {} block

Check the answer of this question online on QuizOver.com:

Question: [how to handle exceptions in java?](http://www.quizover.com/pdf/how-to-handle-exceptions-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-handle-exceptions-in-java>

4.1.12. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    public static void main(String[] args) {  
        String stmt = "javachamp 2009";  
        String[] arr = stmt.split(" ");  
        try {  
            int x = Integer.parseInt(arr[1]);  
            System.out.print(x);  
        } finally {  
            System.out.print("finally");  
        }  
    }  
}
```

Please choose only one answer:

- 2009
- finally
- 2009finally
- No output will be produced
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to handle exceptions using try/catch block?](#)

Permalink: <http://www.quizover.com/pdf/how-to-handle-exceptions-using-trycatch-block>

4.1.13. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    public static void main(String[] args) {  
        String stmt = "javachamp 2009";  
        String[] arr = stmt.split(" ");  
        try {  
            int x = Integer.parseInt(arr[0]);  
            System.out.print(x);  
        } catch (Exception e) {  
            System.out.print("catch");  
        } finally {  
  
            System.out.print("finally");  
        }  
    }  
}
```

Please choose only one answer:

- 2009
- 2009finally
- catchfinally
- No output will be produced
- Compilation error
- 2009catchfinally

Check the answer of this question online on QuizOver.com:

Question: [How to write try catch statement in java?](http://www.quizover.com/pdf/how-to-write-try-catch-statement-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-write-try-catch-statement-in-java>

4.1.14. In which case a NoClassDefFoundError will be thrown?

Author: JavaChamp Team

In which case a NoClassDefFoundError will be thrown?

Please choose only one answer:

- When try to compile a non found java file
- When try to run a non found java .class file
- When try to compile a non found java file or try to run a non found java .class file

Check the answer of this question online on QuizOver.com:

Question: [When java NoClassDefFoundError is thrown?](http://www.quizover.com/pdf/when-java-noclassdeffoundererror-is-thrown)

Permalink: <http://www.quizover.com/pdf/when-java-noclassdeffoundererror-is-thrown>

4.1.15. What is the output of the following code

Author: Pedro Kowalski

What is the output of the following code

```
public class Tester {  
  
    public static void main(String[] args) {  
        Double d = -4.0;  
  
        try {  
            d /= 0;  
        } catch (ArithmeticException e) {  
            System.out.println("EXCEPTION!");  
        } finally {  
            System.out.println(d);  
        }  
    }  
}
```

Please choose only one answer:

- NotANumber
- NaN
- EXCEPTION! -4.0
- -Infinity
- EXCEPTION! 0.0
- Compilation fails

Check the answer of this question online on QuizOver.com:

Question: [how does division by zero with doubles work pedro kowalski](http://www.quizover.com/pdf/how-does-division-by-zero-with-doubles-work-pedro-kowalski)

Permalink: <http://www.quizover.com/pdf/how-does-division-by-zero-with-doubles-work-pedro-kowalski>

4. Chapter: Inheritance

1. Inheritance Questions

4.1.1. Are the following declarations correct, if you knew that they are ...

Author: [JavaChamp Team](#)

Are the following declarations correct, if you knew that they are in the same package?

```
interface Bouncable{ } // line 1
interface Colorable extends Bouncable{ } // line 2
class Super implements Colorable{ } // line 3
class Sub implements Colorable extends Super { } // line 4
```

Please choose only one answer:

- Yes, the declarations are correct
- No there is a compilation error at line 2, must implements not extends
- No there is a compilation error at line 4, over implementing for interface Colorable, Super is already implementing it
- No there is a compilation error at line 4, extends should come before implements

Check the answer of this question online on [QuizOver.com](#):

Question: [How to extend or implement in java?](#)

Permalink: <http://www.quizover.com/pdf/how-to-extend-or-implement-in-java>

4.1.2. Which of the following is true?

Author: JavaChamp Team

Which of the following is true?

Please choose all the answers that apply:

- A class can extend more than one class
- A class can extend only one class but many interfaces
- An interface can extend many interfaces
- An interface can implement many interface
- A class can extend one class and implement many interfaces

Check the answer of this question online on QuizOver.com:

Question: [How to implement or extend in java?](#)

Permalink: <http://www.quizover.com/pdf/how-to-implement-or-extend-in-java>

4.1.3. Which lines will evaluate to true?

Author: Yasser Ibrahim

Which lines will evaluate to true?

```
interface Colorable { }

interface Bouncable extends Colorable { }

class Super implements Bouncable { }

class Sub extends Super implements Bouncable { }

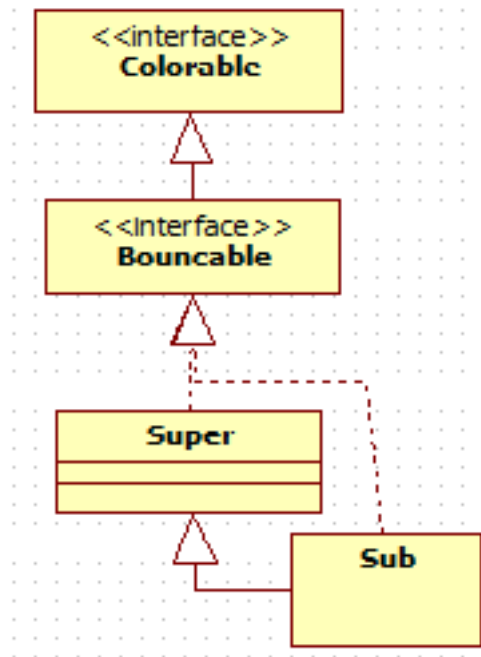
public class Tester {

    public static void main(String[] args) {

        System.out.println(new Sub() instanceof Super); //line 1
        System.out.println(new Sub() instanceof Bouncable); //line 2
        System.out.println(new Sub() instanceof Colorable); //line 3
        System.out.println(new Super() instanceof Sub); //line 4
        System.out.println(new Super() instanceof Colorable); //line 5

    }

}
```



Please choose only one answer:

- All lines will evaluate to true
- All lines will evaluate to true and only line 4 will evaluate to false
- Only line 1 and 2 will evaluate to true

- Lines 3 and 5 will evaluate to false

Check the answer of this question online on QuizOver.com:

Question: [How to use java instanceof?](#)

Permalink: <http://www.quizover.com/pdf/how-to-use-java-instanceof>

4.1.4. what is the result of compiling and running the following code?

Author: [JavaChamp Team](#)

what is the result of compiling and running the following code?

```
interface Colorable { }

interface Bouncable extends Colorable { }

class Super implements Bouncable { }

class Sub extends Super implements Bouncable { }

class Individual { }

public class Tester {

    public static void main(String[] args) {

        System.out.print(new Sub() instanceof Super);
        System.out.print(new Sub() instanceof Colorable);
        System.out.print(new Super() instanceof Sub);
        System.out.print(new Individual() instanceof Super);
    }
}
```

Please choose only one answer:

- true true false false
- true false false false
- Compilation error
- RuntimeException because of the print statemen

Check the answer of this question online on [QuizOver.com](#):

Question: [how to use instanceof java?](#)

Permalink: <http://www.quizover.com/pdf/how-to-use-instanceof-java>

4.1.5. Will the following code compile and if yes , what is the output?

Author: Yasser Ibrahim

Will the following code compile and if yes , what is the output?

```
interface Colorable {}

class Vehicle {}

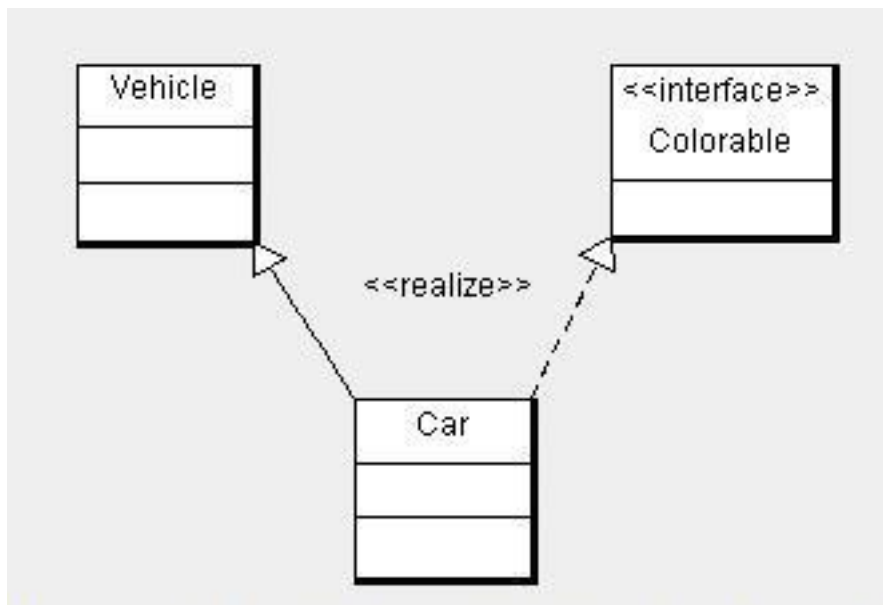
class Car extends Vehicle implements Colorable {}

public class Tester {

    public static void main(String[] args) {

        Vehicle a = new Car();
        Colorable i = (Colorable) a;

        Vehicle b = new Vehicle();
        Colorable j = (Colorable) b;
    }
}
```



Please choose only one answer:

- The code compiles fine and produces no output
- The code compiles fine but throws a RuntimeException because of the second casting
- There is a compilation error because of the second casting
- The code compiles fine but throws a RuntimeException because of the first casting

Check the answer of this question online on QuizOver.com:

Question: [How to cast java variables?](#)

Permalink: <http://www.quizover.com/pdf/how-to-cast-java-variables>

4.1.6. Would the following code compile and if yes , what is the output?

Author: Yasser Ibrahim

Would the following code compile and if yes , what is the output?

```
interface Colorable {}

class Vehicle {}

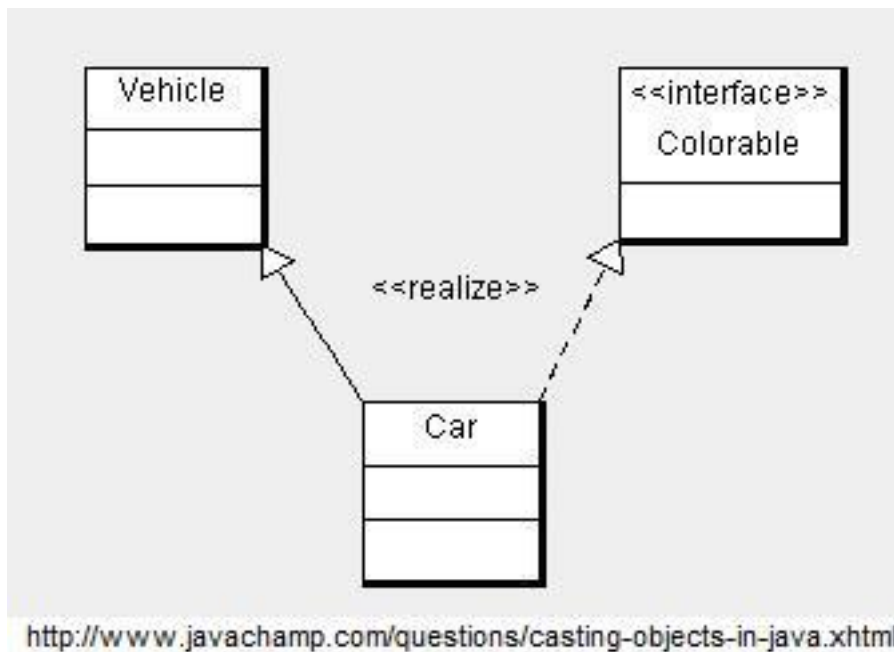
class Car extends Vehicle implements Colorable {}

public class Tester {

    public static void main(String[] args) {

        Vehicle a = new Car();
        Colorable i = (Colorable) a;

        Vehicle b = new Vehicle();
        Colorable j = (Colorable) b;
    }
}
```



Please choose only one answer:

- The code compiles fine and produces no output
- The code compiles fine but throws a RuntimeException because of the second casting
- There is a compilation error because of the second casting

Check the answer of this question online on QuizOver.com:
Question: [casting objects in java](#)
Permalink: <http://www.quizover.com/pdf/casting-objects-in-java>

4.1.7. What is the output of compiling and running the following program?

Author: Yasser Ibrahim

What is the output of compiling and running the following program?

```
class Category {
    Category() {
        System.out.print("Category_");
    }
}

class SubCategory extends Category {
    SubCategory() {
        System.out.print("SubCategory_");
    }
}

class SubSubCategory extends SubCategory {
    SubSubCategory() {
        System.out.print("SubSubCategory_");
    }
}

public class Tester {

    public static void main(String[] args) {
        new SubSubCategory();
    }
}
```

Please choose only one answer:

- SubSubCategory_SubCategory_Category_
- SubSubCategory_
- Category_SubCategory_SubSubCategory_

Check the answer of this question online on QuizOver.com:

Question: [Order of constructor calls of java derived classes](http://www.quizover.com/pdf/order-of-constructor-calls-of-java-derived-classes)

Permalink: <http://www.quizover.com/pdf/order-of-constructor-calls-of-java-derived-classes>

4.1.8. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
interface Chewable {}
interface Eatable extends Chewable {}
class Food implements Chewable {}
class Meat extends Food {}
class Gum implements Chewable {}

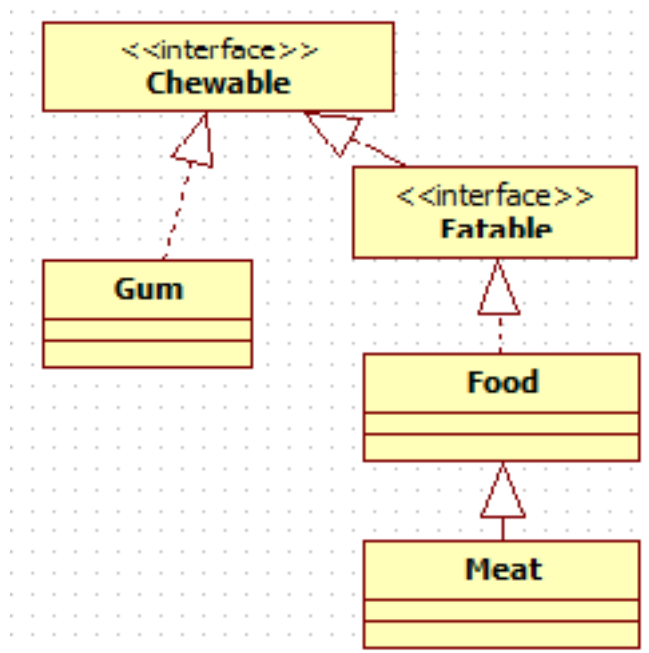
public class Tester {

    public static void main(String[] args) {

        Food food = new Food();
        Meat meat = new Meat();
        Gum gum = new Gum();

        System.out.print(food instanceof Eatable);
        System.out.print(meat instanceof Food);
        System.out.print(gum instanceof Food);
        System.out.print(gum instanceof Chewable);

    }
}
```



Please choose only one answer:

- true true true true
- true true false true

- false>true>false>true
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [using instanceof in java](#)

Permalink: <http://www.quizover.com/pdf/using-instanceof-in-java>

4.1.9. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
interface Chewable {}
interface Eatable extends Chewable {}
class Food implements Eatable {}
class Meat extends Food {}
class Gum implements Chewable {}

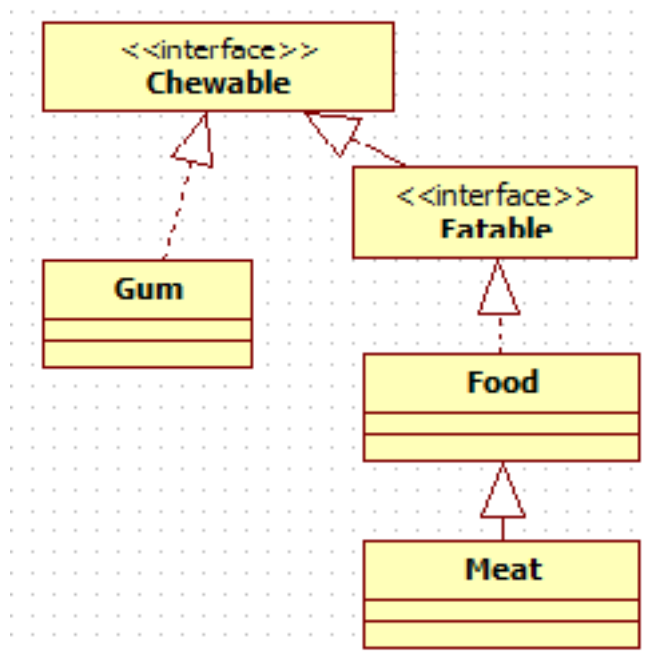
public class Tester {

    public static void main(String[] args) {

        Food food = new Food();
        Meat meat = new Meat();
        Gum gum = new Gum();

        System.out.print(food instanceof Chewable);
        System.out.print(meat instanceof Eatable);
        System.out.print(gum instanceof Eatable);
        System.out.print(gum instanceof Chewable);

    }
}
```



Please choose only one answer:

- false true false true
- true true false true

- true true true true
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to use instanceof in java?](#)

Permalink: <http://www.quizover.com/pdf/how-to-use-instanceof-in-java>

4.1.10. Which of the following statements are correct?

Author: JavaChamp Team

Which of the following statements are correct?

Please choose all the answers that apply:

- A class can extend one class and many interfaces
- A class can implement one class and many interfaces
- A class can extend one class and implements many interfaces
- An interface can extend many classes and interfaces
- An interface can implement many classes and interfaces
- An interface can implement many interfaces
- An interface can extend many interfaces

Check the answer of this question online on QuizOver.com:

Question: [how to implement interface or extend class in java?](http://www.quizover.com/pdf/how-to-implement-interface-or-extend-class-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-implement-interface-or-extend-class-in-java>

4.1.11. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
class Base {  
    public void Base() {System.out.print("Base");}  
}  
  
public class Derived extends Base {  
    public Derived() {System.out.print("Derived");}  
  
    public static void main(String[] args) {  
        new Derived();  
    }  
}
```

Please choose only one answer:

- BaseDerived
- DerivedBase
- Derived
- Base
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to write constructor for derived class in java?](http://www.quizover.com/pdf/how-to-write-constructor-for-derived-class-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-write-constructor-for-derived-class-in-java>

4.1.12. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
class Base {  
  
    public Base(String n) {System.out.print("Base1");}  
    public void Base(String n) {System.out.print("Base2");}  
  
}  
  
public class Derived extends Base {  
  
    public Derived() {System.out.print("Derived");}  
  
    public static void main(String[] args) {  
        new Derived();  
    }  
  
}
```

Please choose only one answer:

- Base1Derived
- Base2Derived
- Derived
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [Inheritance and constructors in java](#)

Permalink: <http://www.quizover.com/pdf/inheritance-and-constructors-in-java>

4.1.13. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
class Base {  
    public Base() {System.out.print("Base");}  
}  
  
public class Derived extends Base {  
    public Derived() {this("JavaChamp"); System.out.print("Derived");}  
    public Derived(String s) { System.out.print(s);}  
  
    public static void main(String[] args) {  
        new Derived();  
    }  
}
```

Please choose only one answer:

- JavaChampDerived
- JavaChampBaseDerived
- BaseJavaChampDerived
- JavaChampDerivedBase
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to call this inside java constructor?](http://www.quizover.com/pdf/how-to-call-this-inside-java-constructor)

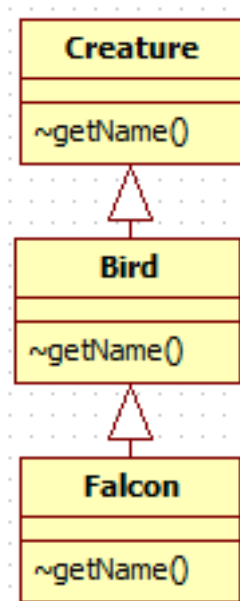
Permalink: <http://www.quizover.com/pdf/how-to-call-this-inside-java-constructor>

4.1.14. Which statement(s), inserted independently at // insert code here, ...

Author: Yasser Ibrahim

Which statement(s), inserted independently at // insert code here, will compile?

```
class Creature {  
    String getName() {  
        return "Creature";  
    }  
}  
  
class Bird extends Creature {  
    String getName() {  
        return "Bird";  
    }  
}  
  
class Falcon extends Bird {  
    String getName() {  
        return "Falcon";  
    }  
}  
  
public class Tester {  
  
    public static Bird getIt(Creature c) {  
        System.out.println(c.getName());  
        return (Bird) c;  
    }  
  
    public static void main(String[] args) {  
        // insert code here  
    }  
}
```



Please choose all the answers that apply:

- `getIt(new Creature());`
- `getIt(new Bird());`
- `getIt(new Falcon());`
- `getIt(new Object());`

Check the answer of this question online on QuizOver.com:

Question: [When java classCastException is thrown?](http://www.quizover.com/pdf/when-java-classcastexception-is-thrown)

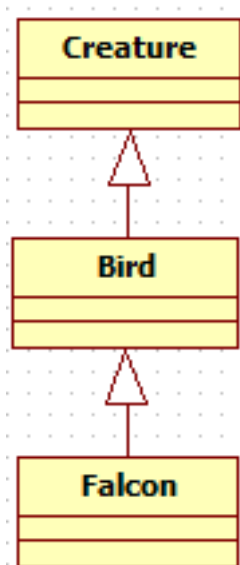
Permalink: <http://www.quizover.com/pdf/when-java-classcastexception-is-thrown>

4.1.15. The following program fails to compile, where could possibly be the...

Author: JavaChamp Team

The following program fails to compile, where could possibly be the compilation error(s)?

```
class Creature {}  
  
class Bird extends Creature {}  
  
class Falcon extends Bird {}  
  
public class Tester {  
  
    public static void main(String[] args) {  
        Creature c1 = new Creature();  
        Creature c2 = new Bird();  
  
        Bird b1 = (Bird) c1; // Line 1  
        Bird b2 = (Falcon) c2; // Line 2  
        Bird b3 = c2; // Line 3  
        Bird b4 = new Falcon(); // Line 4  
        Bird b5 = (Bird) new Creature(); // Line 5  
        Falcon f1 = b4; // Line 6  
    }  
}
```



Please choose all the answers that apply:

- Line 1
- Line 2
- Line 3
- Line 4
- Line 5

- Line 6

Check the answer of this question online on QuizOver.com:

Question: [How to cast in java?](#)

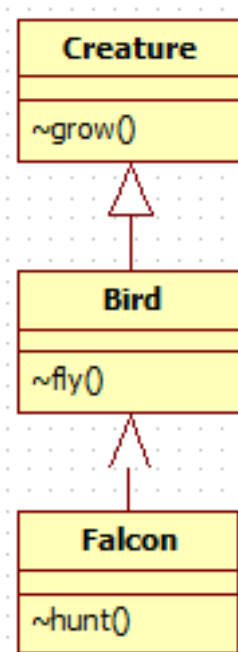
Permalink: <http://www.quizover.com/pdf/how-to-cast-in-java>

4.1.16. What inserted, independently at // insert code here , will compile?

Author: Yasser Ibrahim

What inserted, independently at // insert code here , will compile?

```
class Creature {  
    void grow() {  
    }  
}  
  
class Bird extends Creature {  
    void fly() {  
    }  
}  
  
class Falcon extends Bird {  
    void hunt() {  
    }  
}  
  
public class Tester {  
  
    public static void main(String[] args) {  
        Creature c1 = new Bird();  
        Falcon c2 = new Falcon();  
  
        // insert code here  
    }  
}
```



Please choose all the answers that apply:

- `c1.grow();`
- `c1.fly();`
- `((Bird)c1).fly();`
- `((Falcon)c1).hunt();`

Check the answer of this question online on QuizOver.com:

Question: [Casting rules in java](#)

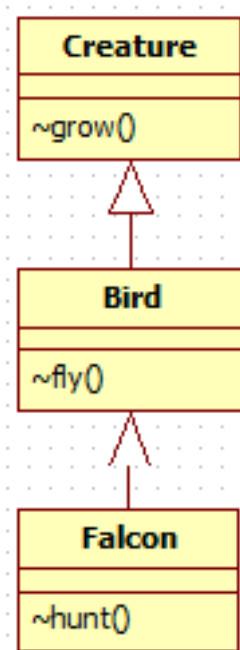
Permalink: <http://www.quizover.com/pdf/casting-rules-in-java>

4.1.17. What inserted, independently at // insert code here , will compile ...

Author: JavaChamp Team

What inserted, independently at // insert code here , will compile and run with no errors and exceptions?

```
class Creature {  
    void grow() {  
    }  
}  
  
class Bird extends Creature {  
    void fly() {  
    }  
}  
  
class Falcon extends Bird {  
    void hunt() {  
    }  
}  
  
public class Tester {  
  
    public static void main(String[] args) {  
        Creature c1 = new Bird();  
        Falcon c2 = new Falcon();  
  
        // insert code here  
    }  
}
```



Please choose all the answers that apply:

- `c1.grow();`
- `c1.fly();`
- `((Bird)c1).fly();`
- `((Falcon)c1).hunt();`

Check the answer of this question online on QuizOver.com:

Question: [How to java cast?](#)

Permalink: <http://www.quizover.com/pdf/how-to-java-cast>

4.1.18. considering AnyClassOrInterface is a class or an interface in java ...

Author: JavaChamp Team

considering AnyClassOrInterface is a class or an interface in java

what would the following statement print?

```
System.out.print(null instanceof AnyClassOrInterface );
```

Please choose only one answer:

- true
- false
- compilation error
- NullPointerException is thrown at runtime

Check the answer of this question online on QuizOver.com:

Question: [null and instanceof in java](#)

Permalink: <http://www.quizover.com/pdf/null-and-instanceof-in-java>

4.1.19. What is the output ?

Author: Nikhil Kumar

What is the output ?

```
class A{
    A(){
        System.out.println("Hello");
    }
}
class InitDemo extends A{
    A ob=new A();
    InitDemo(){
        System.out.println("hello 1");
    }
    public static void main(String... args){
        System.out.println("Hello 2");
        new InitDemo();
    }
}
```

Please choose only one answer:

- Hello 2
hello 1
Hello
Hello
- Hello 2
Hello
Hello
hello 1
- Hello 2
Hello
hello 1
Hello
- Exception is thrown at runtime.

Check the answer of this question online on QuizOver.com:

Question: [inheritance in java Nikhil Kumar](http://www.quizover.com/pdf/inheritance-in-java-nikhil-kumar)

Permalink: <http://www.quizover.com/pdf/inheritance-in-java-nikhil-kumar>

4. Chapter: Arrays

1. Arrays Questions

4.1.1. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    int[] a = new int[0];  
    System.out.print(a.length);  
}
```

Please choose only one answer:

- 0
- Compilation error, arrays cannot be initialized to zero size
- Compilation error, it is a.length() not a.length

Check the answer of this question online on QuizOver.com:

Question: [how to declare java array?](http://www.quizover.com/pdf/how-to-declare-java-array)

Permalink: <http://www.quizover.com/pdf/how-to-declare-java-array>

4.1.2. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    static void test(int[] a) {  
        int[] b = new int[2];  
        a = b;  
        System.out.print(b.length);  
        System.out.print(a.length);  
    }  
  
    public static void main(String[] args) {  
  
        int[] a = new int[5];  
        test(a);  
        System.out.print(a.length);  
  
    }  
}
```

Please choose only one answer:

- 225
- 255
- 200
- 222

Check the answer of this question online on QuizOver.com:

Question: [array size in java](#)

Permalink: <http://www.quizover.com/pdf/array-size-in-java>

4.1.3. What is true after running the following code?

Author: JavaChamp Team

What is true after running the following code?

```
public static void main(String[] args) {  
    String entries[] = {"entry1","entry2"};  
    int count=0;  
    while (entries [count++]!=null){  
        System.out.println(count);  
    }  
        System.out.println(count);  
}
```

Please choose all the answers that apply:

- An Exception will be thrown
- 0 will be printed as part of the output
- 2 will be printed as part of the output
- 3 will be printed as part of the output

Check the answer of this question online on QuizOver.com:

Question: [When ArrayIndexOutOfBoundsException is thrown?](http://www.quizover.com/pdf/when-arrayindexoutofboundsexception-is-thrown)

Permalink: <http://www.quizover.com/pdf/when-arrayindexoutofboundsexception-is-thrown>

4.1.4. Which of the following declarations of an array is incorrect?

Author: Yasser Ibrahim

Which of the following declarations of an array is incorrect?

```
public static void main(String[] args) {  
    int[] a[];  
    int b[3];  
    int []c[];  
    int[] d[];  
}
```

Please choose only one answer:

- a
- b
- c
- d

Check the answer of this question online on QuizOver.com:

Question: [Array declaration in java](#)

Permalink: <http://www.quizover.com/pdf/array-declaration-in-java>

4.1.5. What is the result of compiling and running the following program?

Author: JavaChamp Team

What is the result of compiling and running the following program?

```
public class Tester {  
    final static int x[] = new int[5];  
    public static void main(String[] args) {  
        final int x = new Tester().x[5];  
        if (x <= 10)  
            System.out.println("javachamp");  
    }  
}
```

Please choose only one answer:

- Compilation error
- `ArrayIndexOutOfBoundsException` is thrown
- javachamp
- No output is produced

Check the answer of this question online on QuizOver.com:

Question: [When java ArrayIndexOutOfBoundsException is thrown?](http://www.quizover.com/pdf/when-java-arrayindexoutofboundsexception-is-thrown)

Permalink: <http://www.quizover.com/pdf/when-java-arrayindexoutofboundsexception-is-thrown>

4.1.6. public static void main(String[] args)

```
{  
byte b1= 25;  
byte b2=45...
```

Author: VenkaTESH POLNEEDI

```
public static void main(String[] args)
```

```
{  
  
byte b1= 25;  
  
byte b2=45;  
  
byte b3= b1+b2;
```

```
}
```

Please choose only one answer:

- a)70
- b)CompileError
- c)25
- d)RunTimeException

Check the answer of this question online on QuizOver.com:

Question: [type mismatch cannot convert from int to byte](http://www.quizover.com/pdf/type-mismatch-cannot-convert-from-int-to-byte)

Permalink: <http://www.quizover.com/pdf/type-mismatch-cannot-convert-from-int-to-byte>

4.1.7. Consider the following command-line invocations?

i. java Arrays

...

Author: Waduge Livera

Consider the following command-line invocations?

i. java Arrays

ii. java Arrays 12

iii. java Arrays 12 32

```
class Arrays
{
    public static void main(String [ ] args){
        for(int x=0;args.length>x++;){
            System.out.print(args[x]+ " ");
        }
    }
}
```

Please choose all the answers that apply:

- A. Only the invocation i will complete without throwing exceptions
- B. Only Invocation i will throw an exception.
- C. Invocation ii will produce the output 12.
- D. Invocation iii will produce the output 12 32.
- E. Invocations ii and iii will throw exceptions.

Check the answer of this question online on QuizOver.com:

Question: [java command-line invocation](http://www.quizover.com/pdf/java-commandline-invocation)

Permalink: <http://www.quizover.com/pdf/java-commandline-invocation>

4.1.8. What is the result?

Author: Vinay K

What is the result?

```
public static void main(String[] args) {  
  
    Object obj = new int[] { 1, 2, 3 }; // line 12  
    int[] someArray = (int[])obj; // line 13  
    for (int i : someArray) System.out.print(i + " "); // line 14  
  
}
```

Please choose only one answer:

- A. 1 2 3
- B. Compilation fails because of an error in line 12.
- C. Compilation fails because of an error in line 13.
- D. Compilation fails because of an error in line 14.
- E. A ClassCastException is thrown at runtime.

Check the answer of this question online on QuizOver.com:

Question: [java array casting](http://www.quizover.com/pdf/java-array-casting)

Permalink: <http://www.quizover.com/pdf/java-array-casting>

4.1.9. What is the result of running the following code with "java Test de...

Author: Alinaloana Florea

What is the result of running the following code with "java Test debug":

```
class Test
{
    public static void main(String [ ] args)
    {
        if (args.length == 1 | args[1].equals("debug"))
        {
            System.out.println(args[0]);
        }
        else
        {
            System.out.println("Release");
        }
    }
}
```

Please choose only one answer:

- Debug
- Release
- Compilation fails
- An exception is thrown at run-time

Check the answer of this question online on QuizOver.com:

Question: [how to implement java arrays and command line arguments?](http://www.quizover.com/pdf/how-to-implement-java-arrays-and-command-line-arguments)

Permalink: <http://www.quizover.com/pdf/how-to-implement-java-arrays-and-command-line-arguments>

4. Chapter: Operators

1. Operators Questions

4.1.1. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
    static int i ;  
  
    private static int increment(int i) {  
        return i++;  
    }  
  
    public Tester() {  
        i = 1;  
    }  
  
    public static void main(String[] args) {  
        System.out.print(i);  
        System.out.print(i = increment(i));  
    }  
}
```

Please choose only one answer:

- 01
- 00
- 12
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [Incrementing java static variable](http://www.quizover.com/pdf/incrementing-java-static-variable)

Permalink: <http://www.quizover.com/pdf/incrementing-java-static-variable>

4.1.2. Which of the following "if" statement(s) will throw a NullPointerException...

Author: JavaChamp Team

Which of the following "if" statement(s) will throw a NullPointerException (assuming each statement will be executed independently)?

```
public class Tester {  
    public int code;  
    public static void main(String[] args) {  
        Tester val = null;  
        if((val!=null) & (val.code >0));//line 1  
        if((val!=null) && (val.code >0));//line 2  
        if((val==null) | (val.code==0));//line 3  
        if((val==null) || (val.code==0));//line 4  
    }  
}
```

Please choose all the answers that apply:

- Line 1
- Line 2
- Line 3
- Line 4

Check the answer of this question online on QuizOver.com:

Question: [How to use java short circuit operators Which of the following if](http://www.quizover.com/pdf/how-to-use-java-short-circuit-operators-which-of-the-following-if)

Permalink: <http://www.quizover.com/pdf/how-to-use-java-short-circuit-operators-which-of-the-following-if>

4.1.3. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    static boolean isEven(int x) {  
        return (x % 2 == 0) ? true : false;  
    }  
  
    public static void main(String[] args) {  
        System.out.print(isEven(2));  
        System.out.print(isEven(3));  
        System.out.print(isEven(4));  
    }  
}
```

Please choose only one answer:

- truefalsetrue
- falsefalsetrue
- falsefalsefalse
- a compilation error
- an exception is thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [How to use java conditional operators?](http://www.quizover.com/pdf/how-to-use-java-conditional-operators)

Permalink: <http://www.quizover.com/pdf/how-to-use-java-conditional-operators>

4.1.4. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
  
    public static void main(String[] args) {  
        int x = 0;  
        int i = 1;  
        for (; i > 0; i--)  
            if ((++x > 0) | (--i > 0))  
                x++;  
        System.out.println(x + "" + i);  
    }  
}
```

Please choose only one answer:

- Compilation error
- 21
- 20
- 2-1

Check the answer of this question online on QuizOver.com:

Question: [Short circuit vs non shortcircuit operators in java](http://www.quizover.com/pdf/short-circuit-vs-non-shortcircuit-operators-in-java)

Permalink: <http://www.quizover.com/pdf/short-circuit-vs-non-shortcircuit-operators-in-java>

4.1.5. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    public static void main(String[] args) {  
        int x = 0;  
        int y = 0;  
        if ((true & false) | (true & false) & x++>0)  
            System.out.print("stmt1 ");  
        if (false || true | (++y> 0 | y++>0))  
            System.out.print("stmt2 ");  
        System.out.print(x+ " "+y);  
    }  
}
```

Please choose only one answer:

- stmt1 stmt2 1 2
- stmt1 stmt2 0 0
- stmt2 1 2
- stmt2 0 2
- 0 0

Check the answer of this question online on QuizOver.com:

Question: [short circuit operators in java](#)

Permalink: <http://www.quizover.com/pdf/short-circuit-operators-in-java>

4.1.6. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    public static void main(String[] args) {  
        System.out.print("" + 7 + 2 + " ");  
        System.out.print(7 + 2 + " ");  
    }  
}
```

Please choose only one answer:

- 9 9
- 72 9
- 9 72
- 72 72

Check the answer of this question online on QuizOver.com:

Question: [Concatenating operands in java](#)

Permalink: <http://www.quizover.com/pdf/concatenating-operands-in-java>

4.1.7. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
    public static void main(String[] args) {  
        boolean flag = true;  
        int x = 5;  
        int result = (8 * 2) % x;  
        System.out.print(!(result > 0) ^ true ^ (flag = false));  
        System.out.print(flag);  
    }  
}
```

Please choose only one answer:

- truefalse
- truetrue
- falsefalse
- falsetrue
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [Java Boolean Logical Operators](#)

Permalink: <http://www.quizover.com/pdf/java-boolean-logical-operators>

4.1.8. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
    public static void main(String[] args) {  
        boolean flag = true;  
        int x = 5;  
        int result = (8 * 2) % x;  
        System.out.print(!(result > 0) ^ true ^ !(flag = false));  
        System.out.print(flag);  
    }  
}
```

Please choose only one answer:

- truefalse
- truetrue
- falsefalse
- falsetrue
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [short circuit logical operators in java](http://www.quizover.com/pdf/short-circuit-logical-operators-in-java)

Permalink: <http://www.quizover.com/pdf/short-circuit-logical-operators-in-java>

4.1.9. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Test{  
    public static void main(String argv[]) {  
        Foo x = new Foo();  
        Foo y = new Foo();  
        Foo z = x;  
  
        System.out.print(x == y);  
        System.out.print(x == z);  
    }  
}  
  
class Foo {}
```

Please choose only one answer:

- false>true
- false>false
- true>true
- compilation error

Check the answer of this question online on QuizOver.com:

Question: [using == in java](#)

Permalink: <http://www.quizover.com/pdf/using-in-java>

4.1.10. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Test{  
  
    public static void main(String argv[]) {  
        int a = 6;  
        if (a = 6)  
            System.out.print("true");  
        }  
    }  
}
```

Please choose only one answer:

- no output is produced
- true
- a compilation error

Check the answer of this question online on QuizOver.com:

Question: [if condition in java](#)

Permalink: <http://www.quizover.com/pdf/if-condition-in-java>

4.1.11. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    System.out.print("4" + 5);  
    System.out.print(4 + 5);  
    System.out.print(4 + 5 + "9");  
}
```

Please choose only one answer:

- 4545459
- 459459
- 45999

Check the answer of this question online on QuizOver.com:

Question: [String and + operator in java](#)

Permalink: <http://www.quizover.com/pdf/string-and-operator-in-java>

4.1.12. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    int x = 0, y = 0;  
    x = 5 + y++;  
    System.out.print(x + "" + y);  
  
    x = 0;  
    y = 0;  
    x = 5 + ++y;  
    System.out.print(x + "" + y);  
}
```

Please choose only one answer:

- 6161
- 671
- 5161

Check the answer of this question online on QuizOver.com:

Question: [++ and -- in java](#)

Permalink: <http://www.quizover.com/pdf/-and-in-java>

4.1.13. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    int x = 1, y = 0;  
    if ((y == x++) && (x < ++y)) { }  
    System.out.println(x + "" + y);  
}
```

Please choose only one answer:

- 20
- 21
- 10
- 11

Check the answer of this question online on QuizOver.com:

Question: [short-circuit AND in java](#)

Permalink: <http://www.quizover.com/pdf/shortcircuit-and-in-java>

4.1.14. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    int x = 1, y = 0;  
    if ((y == x++) || (x < ++y)) { }  
    System.out.println(x + "" + y);  
}
```

Please choose only one answer:

- 10
- 11
- 20
- 21

Check the answer of this question online on QuizOver.com:

Question: [short-circuit OR in java](#)

Permalink: <http://www.quizover.com/pdf/shortcircuit-or-in-java>

4.1.15. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    int x = 0, y = 0;  
    if ((y == ++x) & (x < ++y)) {}  
    System.out.println(x + "" + y);  
}
```

Please choose only one answer:

- 10
- 11
- 20
- 21

Check the answer of this question online on QuizOver.com:

Question: [& non-short-circuit AND in java](#)

Permalink: <http://www.quizover.com/pdf/-nonshortcircuit-and-in-java>

4.1.16. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    int x = 0, y = 0;  
  
    if ((y == x++) | (x < ++y)) {  
        ++y;  
    }  
    System.out.println(x + " " + y);  
}
```

Please choose only one answer:

- 00
- 10
- 11
- 12
- 22

Check the answer of this question online on QuizOver.com:

Question: | [non-short-circuit OR in java](#)

Permalink: <http://www.quizover.com/pdf/-nonshortcircuit-or-in-java>

4.1.17. What is the result of compiling and running the following code?

Author: [JavaChamp Team](#)

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    System.out.print(false ^ true);  
    System.out.print(!false);  
}
```

Please choose only one answer:

- falsefalse
- falsetrue
- truefalse
- truetrue

Check the answer of this question online on [QuizOver.com](#):

Question: [Logical Operators ^ and ! in java](#)

Permalink: <http://www.quizover.com/pdf/logical-operators-and-in-java>

4.1.18. what will be the output when we compile and execute the code below:

Author: Pankaj Gupta

what will be the output when we compile and execute the code below:

```
class Compound{
public static void main(String args[])
{
int k=12;
k/=--k;
System.out.println(k);
k*=k++;
System.out.println(k);
k*=++k;
System.out.println(k);
}
}
```

Please choose only one answer:

- It will compile successfully and display 1 followed by 2 and then 3 as an output.
- It will compile successfully and display 1 followed by 1 and then 2 as an output.
- It will compile successfully and display 1 followed by 3 and then 4 as an output.
- It will generate compile time error.

Check the answer of this question online on QuizOver.com:

Question: [java compound operator](#)

Permalink: <http://www.quizover.com/pdf/java-compound-operator>

4.1.19. What is the output of the running the following program?

Author: JavaChamp Team

What is the output of the running the following program?

```
class Test {
    public static void main(String arg[]) {
        A b = new B(1000);
        A c = new C(1000);
        System.out.println(b==c);
        System.out.println(b <= c);
    }
}

class A {
    int value;
}

class B extends A {
    B(int val) {
        value = val;
    }
}

class C extends A {
    C(int val) {
        value = val;
    }
}
```

Please choose only one answer:

- "true" then "false" will be printed
- "false" then "false" will be printed
- "false" then "true" will be printed
- compilation error at the first print statement
- compilation error at the second print statement

Check the answer of this question online on QuizOver.com:

Question: [which operands can be used in the comparison operators?](http://www.quizover.com/pdf/which-operands-can-be-used-in-the-comparison-operators)

Permalink: <http://www.quizover.com/pdf/which-operands-can-be-used-in-the-comparison-operators>

4.1.20. What is the output of compiling and running the following code?

Author: JavaChamp Team

What is the output of compiling and running the following code?

```
class Test {  
    public static void main(String arg[]) {  
        Integer x = 1000;  
        long y = 1000;  
        Integer z = 1000;  
        System.out.println(x==y);  
        System.out.println(x==z);  
    }  
}
```

Please choose only one answer:

- true then false will be printed
- true then true will be printed
- false then true will be printed
- false then false will be printed
- compilation error at the first print statement
- compilation error at the second print statement

Check the answer of this question online on QuizOver.com:

Question: [which operands can be used in the equality comparison operators?](http://www.quizover.com/pdf/which-operands-can-be-used-in-the-equality-comparison-operators)

Permalink: <http://www.quizover.com/pdf/which-operands-can-be-used-in-the-equality-comparison-operators>

4.1.21. What is the output of the following code?

Author: Pedro Kowalski

What is the output of the following code?

```
import java.util.Arrays;
import java.util.List;

public class Tester {
    public static void main(String[] arg) {
        int i = 1;
        int[] arr = {0, 1, 2};
        int z = 0;

        arr[i] = z = ++i;

        List<Integer> li = Arrays.asList(arr);

        System.out.println(li + "#" + z);
    }
}
```

Please choose only one answer:

- [0, 2, 2]#2
- [0, 1, 2]#2
- [0, 1, 2]#1
- [0, 2, 2]#1
- [0, 1, 2]#2
- compilation fails

Check the answer of this question online on QuizOver.com:

Question: [how arrays aslist method works](http://www.quizover.com/pdf/how-arrays-aslist-method-works)

Permalink: <http://www.quizover.com/pdf/how-arrays-aslist-method-works>

4.1.22. What is the output of the following code?

Author: Pedro Kowalski

What is the output of the following code?

```
import java.util.Arrays;
import java.util.List;

public class Tester {
    public static void main(String... xyz) {
        int i = 1;
        Integer[] arr = {0, 1, 2};
        int z = 0;

        arr[i] = z = ++i;

        List<Integer> li = Arrays.asList(arr);

        System.out.println(li + "#" + z);
    }
}
```

Please choose only one answer:

- [0, 2, 2]#2
- [0, 1, 2]#2
- [0, 1, 2]#1
- [0, 2, 2]#1
- compilation fails

Check the answer of this question online on QuizOver.com:

Question: [arrays aslist method and wrappers in java](http://www.quizover.com/pdf/arrays-aslist-method-and-wrappers-in-java)

Permalink: <http://www.quizover.com/pdf/arrays-aslist-method-and-wrappers-in-java>

4.1.23. What is the result of compiling and running the following program?

Author: Nikhil Kumar

What is the result of compiling and running the following program?

```
class ExamDemo2{
public static void main(String [] args){
    byte b=10;
    b+=10;
    System.out.println(b);
}
}
```

Please choose only one answer:

- Compilation Fails due to possible loss of precision
- 20

Check the answer of this question online on QuizOver.com:

Question: [use of compound assignment operator in java nikhil kumar](#)

Permalink: <http://www.quizover.com/pdf/use-of-compound-assignment-operator-in-java-nikhil-kumar>

4.1.24. What is the result of compiling and running the following code?

Author: Anonymous User

What is the result of compiling and running the following code?

```
public class Test {  
    public static void main(String... parans) {  
        System.out.println(true?false?"7":false?"6":false?true?"5": true?"4":"3":"2":"1");  
    }  
}
```

Please choose only one answer:

- 1
- 2
- 3
- 4
- 5
- 6

Check the answer of this question online on QuizOver.com:

Question: [operators in java clelson](#)

Permalink: <http://www.quizover.com/pdf/operators-in-java-clelson>

4.1.25. Taking in consideration the following declarations, which lines wil...

Author: Alinaloana Florea

Taking in consideration the following declarations, which lines will compile?

```
float f = 1.1f;  
float[] f1 = { 2.0f };  
float[][] f2 = { {1.1f, 1.2f}, {2.0f}, {3.1f, 3.2f, 3.3f} };  
  
Long b= 2L;
```

Please choose all the answers that apply:

- `if (f == f2) {}`
- `if (f == f2[0][0]) {}`
- `if (b= f2[1][0]) {}`
- `if (f == f2[2, 1]) {}`
- `if (f1 == f2[1]) {}`

Check the answer of this question online on QuizOver.com:

Question: [java arrays\[\] + "==" signs](#)

Permalink: <http://www.quizover.com/pdf/java-arrays-quotquot-signs>

4.1.26. (SCJP6) What is printed from:

Author: Alinaloana Florea

(SCJP6) What is printed from:

```
byte b=10;  
b += (b<127)? b>-128? b+=10 :0 : "5" ;  
System.out.println(b);
```

Please choose only one answer:

- 20
- 30
- Compilation fails because "b > -128" is not surrounded by parenthesis
- Compilation fails because a String("5") can not be assigned to a "byte"
- An exception is thrown at runtime

Check the answer of this question online on QuizOver.com:

Question: [ternary/conditional operator SCJP6 What Alinaloana Florea Oracle](http://www.quizover.com/pdf/question-ternary-conditional-operator-scp6-what-alinaloana-florea-ora)

Permalink: <http://www.quizover.com/pdf/question-ternary-conditional-operator-scp6-what-alinaloana-florea-ora>

4. Chapter: Variables and Methods

1. Variables and Methods Questions

4.1.1. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public static void main(String[] args) {  
    int x = 5, y;  
    while (++x < 7) {  
        y = 2;  
    }  
    System.out.println(x + y);  
}
```

Please choose only one answer:

- 7
- 8
- 9
- a compilation error

Check the answer of this question online on QuizOver.com:

Question: [Using java variable before initialization](http://www.quizover.com/pdf/using-java-variable-before-initialization)

Permalink: <http://www.quizover.com/pdf/using-java-variable-before-initialization>

4.1.2. Would the following code compile and run?

Author: JavaChamp Team

Would the following code compile and run?

```
public class Tester {  
  
    public static void main(String args) {  
        System.out.println("JavaChamp");  
    }  
}
```

Please choose only one answer:

- The program will compile and run fine printing JavaChamp as output
- The program will compile fine but won't run correctly, a NoSuchMethodError exception would be thrown
- There is a compilation error at declaring the main() argument, should be an array of String instead

Check the answer of this question online on QuizOver.com:

Question: [How to write method main in java?](http://www.quizover.com/pdf/how-to-write-method-main-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-write-method-main-in-java>

4.1.3. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    static {  
        int x = 3;  
    }  
  
    static int x;  
  
    public static void main(String[] args) {  
        x--; // line 7  
        System.out.println(x);  
    }  
}
```

Please choose only one answer:

- 3
- 2
- -1
- Compilation error at line 7, x is not initialized

Check the answer of this question online on QuizOver.com:

Question: [java class data members](#)

Permalink: <http://www.quizover.com/pdf/java-class-data-members>

4.1.4. What is the result of compiling and running the following program?

Author: JavaChamp Team

What is the result of compiling and running the following program?

```
public class Tester {  
  
    public static void main(String[] args) {  
        int x = 1;  
        int y;  
        while(++x<5) y++;  
        System.out.println(y);  
    }  
}
```

Please choose only one answer:

- 0
- 3
- 4
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to use java local variables?](#)

Permalink: <http://www.quizover.com/pdf/how-to-use-java-local-variables>

4.1.5. What is the result of compiling and running the following program?

Author: Yasser Ibrahim

What is the result of compiling and running the following program?

```
public class Tester {  
  
    public static void main(String[] args) {  
        int x = 1;  
        int y=0;  
        while(++x<5) y++;  
        System.out.println(y);  
    }  
}
```

Please choose only one answer:

- 0
- 3
- 4
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [Java local variables initialization](#)

Permalink: <http://www.quizover.com/pdf/java-local-variables-initialization>

4.1.6. What is the result of compiling and running the following program?

Author: Yasser Ibrahim

What is the result of compiling and running the following program?

```
public class Tester {  
    public static void print(Integer arg){  
        System.out.print("Integer");  
    }  
  
    public void print(int arg){  
        System.out.print("int");  
    }  
  
    public static void main(String[] args) {  
        print(new Integer(3));  
    }  
}
```

Please choose only one answer:

- int
- Integer
- RuntimeException is thrown at run time
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to call java static method?](#)

Permalink: <http://www.quizover.com/pdf/how-to-call-java-static-method>

4.1.7. Which of the following is a valid variable declaration?

Author: [JavaChamp Team](#)

Which of the following is a valid variable declaration?

Please choose all the answers that apply:

- `int _javaChamp;`
- `int _;%javaChamp;`
- `int ;javaChamp;`
- `int 2009JavaChamp;`
- `int $JavaChamp;`

Check the answer of this question online on [QuizOver.com](#):

Question: [how to declare valid java variable?](#)

Permalink: <http://www.quizover.com/pdf/how-to-declare-valid-java-variable>

4.1.8. Which of the following methods follow the JavaBean standards?

Author: [JavaChamp Team](#)

Which of the following methods follow the JavaBean standards?

Please choose all the answers that apply:

- `public void addJCListener(JCListener listener)`
- `void setName(String name)`
- `public void removeJCListener(MCListener listener)`
- `public boolean isDeleted()`
- `public void fetchName(String name)`

Check the answer of this question online on [QuizOver.com](#):

Question: [How to write a java bean?](#)

Permalink: <http://www.quizover.com/pdf/how-to-write-a-java-bean>

4.1.9. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    public static void main(String[] args) {  
        if(true){  
            int x = 5;  
            System.out.print(x);  
        } else {  
            ++x;  
            System.out.print(x);  
        }  
    }  
}
```

Please choose only one answer:

- 5
- 56
- 6
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [What is java local variables scope?](http://www.quizover.com/pdf/what-is-java-local-variables-scope)

Permalink: <http://www.quizover.com/pdf/what-is-java-local-variables-scope>

4.1.10. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
    int x = 12;  
  
    static void reset(Tester obj) {  
        obj = null;  
    }  
  
    public static void main(String[] args) {  
        Tester o1 = new Tester();  
        reset(o1);  
        System.out.print(o1.x);  
    }  
}
```

Please choose only one answer:

- 0
- 12
- Compilation error
- NullPointerException is thrown
- Another type of exception is thrown

Check the answer of this question online on QuizOver.com:

Question: [How to pass variables in java?](#)

Permalink: <http://www.quizover.com/pdf/how-to-pass-variables-in-java>

4.1.11. What is the result of compiling and running the following code?

Author: [JavaChamp Team](#)

What is the result of compiling and running the following code?

```
public class Tester {  
  
    int x = 12;  
  
    static Tester reset( Tester obj) {  
        obj = null;  
        return obj;  
    }  
  
    public static void main(String[] args) {  
        Tester o1 = new Tester();  
        o1 = reset(o1);  
        System.out.print(o1.x);  
    }  
}
```

Please choose only one answer:

- 0
- 12
- Compilation error
- NullPointerException is thrown
- Another type of exception is thrown

Check the answer of this question online on [QuizOver.com](#):

Question: [How variables are passed in java?](#)

Permalink: <http://www.quizover.com/pdf/how-variables-are-passed-in-java>

4.1.12. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
    final short s = 12; // Line 3  
  
    static void swap( Tester obj) {  
        obj.s = 11; // Line 6  
    }  
  
    public static void main(String[] args) {  
        final Tester obj1 = new Tester();  
        swap(obj1);  
        System.out.print(obj1.s); // Line 12  
    }  
}
```

Please choose only one answer:

- 11
- 12
- Compilation error at line 3
- Compilation error at line 6
- Compilation error at line 12

Check the answer of this question online on QuizOver.com:

Question: [How to use java final variable?](http://www.quizover.com/pdf/how-to-use-java-final-variable)

Permalink: <http://www.quizover.com/pdf/how-to-use-java-final-variable>

4.1.13. What is the output for following program?

Author: Kishor Shamra

What is the output for following program?

```
public class SomeClass {  
    static int i ;  
  
    private static int increment(int i) {  
        return ++i;  
    }  
  
    public SomeClass() {  
        i = 1;  
    }  
  
    public static void main(String[] args) {  
        System.out.print(i);  
        System.out.print( increment(i));  
        System.out.print(i);  
    }  
}
```

Please choose only one answer:

- 000
- 012
- 010
- compilation error

Check the answer of this question online on QuizOver.com:

Question: [static variable in java kishor shamra](#)

Permalink: <http://www.quizover.com/pdf/static-variable-in-java-kishor-shamra>

4. Chapter: Wrappers and Autoboxing

1. Wrappers and Autoboxing Questions

4.1.1. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
    public static void main(String[] args) {  
        Integer sum1 = 125; //line 1  
        int sum2 = 125; //line 2  
  
        System.out.print(sum1.equals(sum2)); //line 3  
        System.out.print(sum2.equals(sum1)); //line 4  
        System.out.print(sum1==sum2); //line 5  
    }  
}
```

Please choose only one answer:

- Compilation error at line 3
- Compilation error at line 4
- true>true>false
- true>true>true

Check the answer of this question online on QuizOver.com:

Question: [invoking equals\(\) on java primitive type](http://www.quizover.com/pdf/invoking-equals-on-java-primitive-type)

Permalink: <http://www.quizover.com/pdf/invoking-equals-on-java-primitive-type>

4.1.2. Which, inserted independently at // insert code here , will compile...

Author: JavaChamp Team

Which, inserted independently at // insert code here , will compile? (choose four)

```
public class Tester {  
    // insert code here  
    public static void main(String[] args) {  
        calculate(12);  
    }  
}
```

Please choose all the answers that apply:

- static void calculate(Double i) {}
- static void calculate(Integer i) {}
- static void calculate(int i) {}
- static void calculate(int... i) {}
- static void calculate(Integer... i) { }

Check the answer of this question online on QuizOver.com:

Question: [var-args vs autoboxing in java](#)

Permalink: <http://www.quizover.com/pdf/varargs-vs-autoboxing-in-java>

4.1.3. Given that Long and Integer extend Number, what is the result of co...

Author: Yasser Ibrahim

Given that Long and Integer extend Number, what is the result of compiling and running the following code?

```
public class Tester {  
    public static void main(String[] args) {  
        Number x = 12; // Line 5  
        Number y = (Long) x; // Line 6  
        System.out.print(x+""+y); // Line 7  
    }  
}
```

Please choose only one answer:

- 1212
- Compilation error at line 5
- Compilation error at line 6
- Compilation error at line 7
- An exception is thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [How does java autoboxing work?](#)

Permalink: <http://www.quizover.com/pdf/how-does-java-autoboxing-work>

4.1.4. What causes the compilation to fail?

Author: JavaChamp Team

What causes the compilation to fail?

```
public class Tester {  
    public static void main(String[] args) {  
        Long var = (long) 999; // Line 3  
        long x1 = var.longValue(); // Line 5  
        double x2 = var.longValue(); // Line 7  
        double x3 = (double) var.longValue(); // Line 9  
        Double x4 = Long.valueOf("999"); // Line 11  
        Number x5 = Integer.parseInt("999"); // Line 13  
        Long x6 = Integer.parseInt("999"); // Line 15  
    }  
}
```

Please choose all the answers that apply:

- Line 3
- Line 5
- Line 7
- Line 9
- Line 11
- Line 13
- Line 15

Check the answer of this question online on QuizOver.com:

Question: [How does autoboxing work in java?](http://www.quizover.com/pdf/how-does-autoboxing-work-in-java)

Permalink: <http://www.quizover.com/pdf/how-does-autoboxing-work-in-java>

4.1.5. Given the following code fragment, what is true about the following...

Author: Yasser Ibrahim

Given the following code fragment, what is true about the following System.out statements?

```
public class Tester {  
  
    public static void main(String[] args) {  
        Integer[][] arr1 = { { 1, 2 }, { 3, 4 } };  
        Number[] arr2 = arr1[0];  
        int x = 1;  
  
        System.out.print(arr1[0][0] == 1);  
        System.out.print(arr2[0] == x);  
        System.out.print(x instanceof Integer);  
        System.out.print(arr1[1][0] > (Integer) arr2[0]);  
    }  
}
```

Please choose only one answer:

- All statements will compile
- Only one will compile and will print true
- Only two statements will compile and both will print true
- Only three statements will compile, only two of them will print true

Check the answer of this question online on QuizOver.com:

Question: [How to compare between java wrappers?](http://www.quizover.com/pdf/how-to-compare-between-java-wrappers)

Permalink: <http://www.quizover.com/pdf/how-to-compare-between-java-wrappers>

4.1.6. what will be the output when attempt to compile and execute this code:

Author: Pankaj Gupta

what will be the output when attempt to compile and execute this code:

```
class Test{
public static void main(String arg[])
{
    Number n=10;
    int i=10;
    System.out.println(n==i);
}}
```

Please choose only one answer:

- true
- false
- compile time error
- run time exception

Check the answer of this question online on QuizOver.com:

Question: [how to use the equality operator to compare a primitive to a primitive?](http://www.quizover.com/pdf/how-to-use-the-equality-operator-to-compare-a-primitive-to-a-primitive)

Permalink: <http://www.quizover.com/pdf/how-to-use-the-equality-operator-to-compare-a-primitive-to-a-primitive>

4.1.7. What is the output ?

Author: Nikhil Kumar

What is the output ?

```
class BoxVar{  
    static void call(Integer... i){  
        System.out.println("hi"+i);  
    }  
    static void call(int... i ){  
        System.out.println("hello"+i);  
    }  
    public static void main(String... args){  
        call(10);  
    }  
}
```

Please choose only one answer:

- compilation fails
- 10

Check the answer of this question online on QuizOver.com:

Question: [boxing and varargs issue in java](#) Nikhil Kumar

Permalink: <http://www.quizover.com/pdf/boxing-and-varargs-issue-in-java-nikhil-kumar>

4.1.8. What is the result of compiling and running the following program?

Author: Nikhil Kumar

What is the result of compiling and running the following program?

```
class ExamDemo2{
    static Byte b;
    public static void main(String [] args){
        b=10;
        b+=10;
        System.out.println(b);
    }
}
```

Please choose only one answer:

- Compilation Fails
- 20
- Run Time Error

Check the answer of this question online on QuizOver.com:

Question: [boxing unboxing issue using compound assignment Nikhil Kumar](http://www.quizover.com/pdf/boxing-unboxing-issue-using-compound-assignment-nikhil-kumar)

Permalink: <http://www.quizover.com/pdf/boxing-unboxing-issue-using-compound-assignment-nikhil-kumar>

4.1.9. What is the correct output?

Author: MrDick

What is the correct output?

```
class Test {  
  
    static void go(int z){  
        System.out.println("int");  
    }  
  
    static void go(Object z){  
        System.out.println("Object");  
    }  
  
    static void go(Double z){  
        System.out.println("Double");  
    }  
  
    static void go(Number z){  
        System.out.println("Number");  
    }  
  
    public static void main(String... args) {  
  
        Integer i = 6;  
        go(i);  
    }  
}
```

Please choose only one answer:

- "Number"
- "Double"
- "Object"
- "int"

Check the answer of this question online on QuizOver.com:

Question: [java primitive wrappers](#)

Permalink: <http://www.quizover.com/pdf/java-primitive-wrappers>

4.1.10. What is the output of the following sequence?

Author: Cosmin Bolocan

What is the output of the following sequence?

```
public static void main(String[] args) {  
    int i1 = 120;  
    int i2 = 180;  
    Integer in1 = Integer.valueOf(i2);  
    Integer in2 = Integer.valueOf(i2);  
    System.out.print(in1==in2);  
    in1 = Integer.valueOf(i1);  
    in2 = Integer.valueOf(i1);  
    System.out.print(in1==in2);  
}
```

Please choose only one answer:

- falsefalse
- falsetrue
- truefalse
- truetrue

Check the answer of this question online on QuizOver.com:

Question: [Wrapper comparison](#) What is the output of the following sequence

Permalink: <http://www.quizover.com/pdf/wrapper-comparation-what-is-the-output-of-the-following-sequence>

4. Chapter: Garbage Collection

1. Garbage Collection Questions

4.1.1. How many objects are eligible for garbage collection after executin...

Author: JavaChamp Team

How many objects are eligible for garbage collection after executing line 7?

```
public class Tester {  
    public static void main(String[] args) {  
        Integer x = new Integer(3000);  
        Integer y = new Integer(4000);  
        Integer z = new Integer(5000);  
  
        Object a = x;  
        x = y;  
        y = z;  
        z = null; //line 7  
    }  
}
```

Please choose only one answer:

- 0
- 1
- 2
- 3

Check the answer of this question online on QuizOver.com:

Question: [When java object is eligible for garbage collection?](http://www.quizover.com/pdf/when-java-object-is-eligible-for-garbage-collection)

Permalink: <http://www.quizover.com/pdf/when-java-object-is-eligible-for-garbage-collection>

4.1.2. What can be inserted at // insert code here, to make object created...

Author: Yasser Ibrahim

What can be inserted at // insert code here, to make object created at line 5 eligible for garbage collection?

```
public static void main(String[] args) {  
    Integer[] arr = new Integer[3];  
    arr[0] = new Integer("3"); // Line 5  
    Integer x = arr[0];  
    // insert code here  
}
```

Please choose only one answer:

- arr[0] = null;
- x = null;
- arr = null; x = new Integer(450);
- All of the above

Check the answer of this question online on QuizOver.com:

Question: [What makes java object eligible for garbage collection?](http://www.quizover.com/pdf/what-makes-java-object-eligible-for-garbage-collection)

Permalink: <http://www.quizover.com/pdf/what-makes-java-object-eligible-for-garbage-collection>

4.1.3. An object is subject to garbage collection in java :

Author: JavaChamp Team

An object is subject to garbage collection in java :

Please choose only one answer:

- when the program is at a point of execution that is out the scope of the object
- when the object is set to null
- when the object becomes unreachable

Check the answer of this question online on QuizOver.com:

Question: [when does an object become subject to garbage collection in java?](http://www.quizover.com/pdf/when-does-an-object-become-subject-to-garbage-collection-in-java)

Permalink: <http://www.quizover.com/pdf/when-does-an-object-become-subject-to-garbage-collection-in-java>

4. Chapter: Overriding and Overloading

1. Overriding and Overloading Questions

4.1.1. What modification is necessary to produce the following output : S...

Author: Yasser Ibrahim

What modification is necessary to produce the following output : SubType

```
class Type {
    public Object getTypeName(){
        return "Type";
    }
}

class SubType extends Type {
    public String getTypeName(){//line 8
        return "SubType";
    }
}

public class Tester {

    public static void main(String[] args) {
        Type first = new SubType(); //line 16
        System.out.println(first.getTypeName()); //line 17
    }
}
```

Please choose only one answer:

- No modification is needed
- At line 8 change the return type from String to Object to be a correct overloading of getTypeName()
- At line 16 change Type to SubType
- At line 17 cast first.getTypeName() to String

Check the answer of this question online on QuizOver.com:

Question: [Java overloading rules](#)

Permalink: <http://www.quizover.com/pdf/java-overloading-rules>

4.1.2. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
class Base {
    public final int getNext(int i) {
        return ++i;
    }
}

public class Derived extends Base {

    public int getNext(int i) {
        return i++;
    }

    public static void main(String[] args) {
        int result = new Derived().getNext(3);
        System.out.print(result);
        result = new Base().getNext(3);
        System.out.print(result);
    }
}
```

Please choose only one answer:

- 33
- 34
- 44
- 43
- a compilation error

Check the answer of this question online on QuizOver.com:

Question: [Can override java final method?](http://www.quizover.com/pdf/can-override-java-final-method)

Permalink: <http://www.quizover.com/pdf/can-override-java-final-method>

4.1.3. Which statement(s), inserted independently at // insere code here, ...

Author: JavaChamp Team

Which statement(s), inserted independently at // insere code here, will compile?

```
class Creature {  
    Creature getIt() {  
        return this;  
    }  
}  
  
class Bird extends Creature {  
    // insere code here  
}  
  
class Falcon extends Bird {  
}
```

Please choose all the answers that apply:

- Creature getIt() { return this;}
- private Falcon getIt() { return new Falcon();}
- Falcon getIt() {return this;}
- public Bird getIt() {return this;}
- Creature getIt(Creature c) {return this;}

Check the answer of this question online on QuizOver.com:

Question: [Overriding rules in java](#)

Permalink: <http://www.quizover.com/pdf/overriding-rules-in-java>

4.1.4. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    static void call(Long x, Long y) {  
        System.out.print("Long x, Long y");  
    }  
  
    static void call(int... x) {  
        System.out.print("int... x");  
    }  
  
    public static void main(String[] args) {  
        int val = 3;  
        call(val, val);  
    }  
}
```

Please choose only one answer:

- Long x, Long y
- int... x
- Compilation error
- An exception is thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [var-args vs widening vs autoboxing in java](#)

Permalink: <http://www.quizover.com/pdf/varargs-vs-widening-vs-autoboxing-in-java>

4.1.5. What is the result of compiling and running the following code?

Author: [JavaChamp Team](#)

What is the result of compiling and running the following code?

```
public class Tester {  
  
    static void call(Long x, Long y) {  
        System.out.print("Long x, Long y");  
    }  
  
    static void call(int... x) {  
        System.out.print("int... x");  
    }  
  
    static void call(Number x, Number y) {  
        System.out.print("Number x, Number y");  
    }  
  
    public static void main(String[] args) {  
        int val = 3;  
        call(val, val);  
    }  
}
```

Please choose only one answer:

- Long x, Long y
- int... x
- Number x, Number y
- Compilation error
- An exception is thrown at run time

Check the answer of this question online on [QuizOver.com](http://www.quizover.com):

Question: [var-args vs autoboxing vs widening in java](#)

Permalink: <http://www.quizover.com/pdf/varargs-vs-autoboxing-vs-widening-in-java>

4.1.6. Which, inserted independently at //insert overridden call() here, w...

Author: JavaChamp Team

Which, inserted independently at //insert overridden call() here, will represent an overridden call() and compile with no error?

```
class Base {  
    void call() throws IllegalArgumentException {  
    }  
}  
  
public class Derived extends Base {  
    //insert overridden call() here  
}
```

Please choose all the answers that apply:

- public void call() throws IllegalArgumentException {}
- void call() throws IllegalArgumentException,FileNotFoundException {}
- void call() throws RuntimeException {}
- void call() throws IllegalArgumentException,RuntimeException { }
- private void call() {}

Check the answer of this question online on QuizOver.com:

Question: [How to override method with exceptions in java?](http://www.quizover.com/pdf/how-to-override-method-with-exceptions-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-override-method-with-exceptions-in-java>

4.1.7. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
class Base {  
    public void method(final int x) {  
        System.out.print("Base");  
    }  
}  
  
public class Derived extends Base {  
  
    public void method(int x) { // line 1  
        System.out.print("Derived");  
    }  
  
    public static void main(String[] args) {  
        Base b = new Derived();  
        b.method(3);  
    }  
}
```

Please choose only one answer:

- will compile fine and wil print "Derived"
- will compile fine and wil print "Base"
- Won't compile because of line 1.Can be corrected by marking x as final,then the output will be "Derived"
- Won't compile because of line 1.Can be corrected by marking x as final,then the output will be "Base"

Check the answer of this question online on QuizOver.com:

Question: [final parameters when overriding](http://www.quizover.com/pdf/final-parameters-when-overriding)

Permalink: <http://www.quizover.com/pdf/final-parameters-when-overriding>

4.1.8. What is the o/p of the given code?

Author: Abhishek Sawant

What is the o/p of the given code?

```
class Ret{
    public long tryIt(){
        long num = 25;
        return num;    // $1
    }
}

class ReturnType extends Ret{
    public long tryIt(){
        char ch = 'a';
        long num = 50;
        return ch;    // $2
    }
}

public static void main(String []args){
    Ret r = new ReturnType();    // $3
    System.out.println(r.tryIt());    // $4
}
```

Please choose only one answer:

- a) 25
- b) 50
- c) Compilation Error at \$2
- d) Compilation Error at \$3
- e) Runtime Exception at \$4
- f) None of the above

Check the answer of this question online on QuizOver.com:

Question: [valid return types in overriding in java](http://www.quizover.com/pdf/valid-return-types-in-overriding-in-java)

Permalink: <http://www.quizover.com/pdf/valid-return-types-in-overriding-in-java>

4.1.9. o/p of this program is 35. Which method executes, ; whether it is m...

Author: Abhishek Sawant

o/p of this program is 35. Which method executes, ; whether it is method Overloading or method Overriding?

```
class BaseI{
    public int doSum(short a, short b){ // #1
        return(a+b);
    }
}

public class DerivedI extends BaseI{
    public int doSum(int a,short b){ // #2
        return(a+b);
    }

    public int doSum(short a, short b){ // #3
        return(a+b);
    }

    public static void main(String []args){
        DerivedI d = new DerivedI();
        short x =15;
        short y =20;
        System.out.println(d.doSum(x,y));
    }
}
```

Please choose only one answer:

- a) #1 ; superclass method. No overloading or overriding
- b) #2 ; overriding
- c) #2 ; overloading
- d) #3 ; overriding
- e) #3 ; overloading
- f) None of the above

Check the answer of this question online on QuizOver.com:

Question: [legal overriding in java](http://www.quizover.com/pdf/legal-overriding-in-java)

Permalink: <http://www.quizover.com/pdf/legal-overriding-in-java>

4.1.10. What will be the output :

Author: Pankaj Gupta

What will be the output :

```
class MySuper
{
    MySuper(){disp();}
    void disp(){System.out.println("superclass");}
}
class MySub extends MySuper
{
    double i=Math.ceil(8.4f);
    public static void main(String arg[])
    {
        MySuper obj= new MySub();
        obj.disp();
    }
    void disp(){System.out.println(i);}
}
```

Please choose only one answer:

- The program displays "superclass" followed by "9.0" as an output.
- The program displays "superclass" followed by "superclass" as an output.
- The program displays "9.0" followed by "9.0" as an output.
- The program displays "0.0" followed by "9.0" as an output.

Check the answer of this question online on QuizOver.com:

Question: [Java overriding \(the flow of control\)](#)

Permalink: <http://www.quizover.com/pdf/java-overriding-the-flow-of-control>

4.1.11. What is the result of compiling and running this program ?If compil...

Author: Nikhil Kumar

What is the result of compiling and running this program ?If compiles successfully assume "java Dont" at command line

```
class Test
{
    Test(){
        System.out.println("Hello");
    }
    public void showItem(){

    }
}
abstract class A extends Test
{
    A(){
        System.out.println("Hi everyOne");
    }
    abstract public void showItem();
}
class Dont extends A
{
    public void showItem(){

    }
    public static void main(String... args){
        new Dont();
    }
}
```

Please choose only one answer:

- Compile time error
- an exception may be thrown
- Hello
Hi everyOne

Check the answer of this question online on QuizOver.com:

Question: [overriding in java nikhil kumar](http://www.quizover.com/pdf/overriding-in-java-nikhil-kumar)

Permalink: <http://www.quizover.com/pdf/overriding-in-java-nikhil-kumar>

4.1.12. Given the code. What is the result?

Author: Robin Singh

Given the code. What is the result?

```
class Hotel {
    public int bookings;
    public void book() {
        bookings++;
    }
}

public class SuperHotel extends Hotel {
    public void book() {
        bookings--;
    }

    public void book(int size) {
        book();
        super.book();
        bookings += size;
    }

    public static void main(String args[]) {
        Hotel hotel = new SuperHotel();
        hotel.book(2);
        System.out.print(hotel.bookings);
    }
}
```

Please choose only one answer:

- Compilation fails.
- An exception is thrown at runtime.
- 0
- 1
- 2
- -1

Check the answer of this question online on QuizOver.com:

Question: [java method overloading](#)

Permalink: <http://www.quizover.com/pdf/java-method-overloading>

4. Chapter: Collections

1. Collections Questions

4.1.1. What is the output of compiling and running the following program?

Author: JavaChamp Team

What is the output of compiling and running the following program?

```
import java.util.NavigableMap;
import java.util.TreeMap;

public class Tester {

    public static void main(String[] args) {

        TreeMap tree = new TreeMap();
        tree.put("aa", 1);
        tree.put("cc", 2);
        tree.put("ee", 3);
        tree.put("gg", 4);

        NavigableMap nvMap = tree.headMap("ee", false);
        nvMap.put("nn", 5); // line 16
        System.out.println(nvMap);

    }

}
```

Please choose only one answer:

- {aa=1, cc=2, ee=3}
- {aa=1, cc=2, ee=3, nn=5}
- Compilation error at line 16
- Exception is thrown at line 16

Check the answer of this question online on QuizOver.com:

Question: [How to use java headMap?](http://www.quizover.com/pdf/how-to-use-java-headmap)

Permalink: <http://www.quizover.com/pdf/how-to-use-java-headmap>

4.1.2. What is the output of compiling and running the following program?

Author: JavaChamp Team

What is the output of compiling and running the following program?

```
import java.util.NavigableMap;
import java.util.TreeMap;

public class Tester{

    public static void main(String[] args) {
        TreeMap tree = new TreeMap();
        tree.put("aa", 1);
        tree.put("cc", 2);
        tree.put("ee", 3);
        tree.put("gg", 4);

        NavigableMap nvMap = tree.headMap("ee", false);
        System.out.print(nvMap);

    }
}
```

Please choose only one answer:

- {aa=1, cc=2}
- {aa=1, cc=2, ee=3}
- {aa=1, cc=2, ee=3, gg=4}
- No output is produced
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [What does java headMap\(\) do?](http://www.quizover.com/pdf/what-does-java-headmap-do)

Permalink: <http://www.quizover.com/pdf/what-does-java-headmap-do>

4.1.3. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
import java.util.Arrays;
import java.util.Set;
import java.util.TreeSet;

public class Tester extends Thread {

    public static void main(String[] args) {
        Integer[] arr = {7,5,7,3};
        Set<Integer> set = new TreeSet<Integer>(Arrays.asList(arr));
        set.add(4);
        for(Integer value: set){
            System.out.print(value);
        }
    }
}
```

Please choose only one answer:

- Compilation error
- 75734
- 3457
- 34577

Check the answer of this question online on QuizOver.com:

Question: [how to sort java TreeSet?](#)

Permalink: <http://www.quizover.com/pdf/how-to-sort-java-treeset>

4.1.4. What is the expected output after compiling and running the followi...

Author: Yasser Ibrahim

What is the expected output after compiling and running the following code?

```
import java.util.HashSet;
import java.util.Set;

public class Test{
    public static void main(String[] args) {

        Set<Foo> myFooSet = new HashSet<Foo>();
        myFooSet.add(new Foo(2));
        myFooSet.add(new Foo(1));
        myFooSet.add(new Foo(3));
        myFooSet.add(new Foo(3));
        myFooSet.add(new Foo(2));

        System.out.print(myFooSet.size());

    }
}

class Foo {
    Integer code;

    Foo(Integer c) {
        code = c;
    }

    public boolean equals(Foo f) {
        return false;
    }

    public boolean equals(Object f) {
        return true;
    }

    public int hashCode() {
        return 17;
    }
}
```

Please choose only one answer:

- 1
- 3
- 5
- compilation error

Check the answer of this question online on QuizOver.com:

Question: [how to override equals\(\) in java?](http://www.quizover.com/pdf/how-to-override-equals-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-override-equals-in-java>

4.1.5. What is the output of compiling and running the following code?

Author: Yasser Ibrahim

What is the output of compiling and running the following code?

```
public class Test{
    public static void main(String[] args) {

        Foo foo1 = new Foo(1);
        Foo foo2 = new Foo(2);

        System.out.print(foo1.equals(foo2));
    }
}

class Foo {
    Integer code;

    Foo(Integer c) {
        code = c;
    }

    public boolean equals(Foo f) {
        return false;
    }

    public boolean equals(Object f) {
        return true;
    }
}
```

Please choose only one answer:

- true
- false

Check the answer of this question online on QuizOver.com:

Question: [overriding equals\(\) method in java](http://www.quizover.com/pdf/overriding-equals-method-in-java)

Permalink: <http://www.quizover.com/pdf/overriding-equals-method-in-java>

4.1.6. The following code will throw a runtime exception, which line cause...

Author: Yasser Ibrahim

The following code will throw a runtime exception, which line causes the exception?

```
import java.util.HashSet;
import java.util.Set;
import java.util.TreeSet;

public class Test{
    public static void main(String[] args) {

        Set s = new HashSet();
        s.add("A"); // Line 1
        s.add(new Foo()); // Line 2

        Set t = new TreeSet();
        t.add("A"); // Line 3
        t.add(new Foo()); // Line 4
    }
}

class Foo {}
```

Please choose only one answer:

- Line 1
- Line 2
- Line 3
- Line 4

Check the answer of this question online on QuizOver.com:

Question: [inserting into a TreeSet in java](http://www.quizover.com/pdf/inserting-into-a-treeset-in-java)

Permalink: <http://www.quizover.com/pdf/inserting-into-a-treeset-in-java>

4.1.7. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
import java.util.Arrays;

public class Tester{
    public static void main(String[] args) {

        String[] arr = { "java", "champ", "champion" };
        Arrays.sort(arr);
        System.out.print(Arrays.binarySearch(arr, "champion"));
        System.out.print(Arrays.binarySearch(arr, "You"));

    }
}
```

Please choose only one answer:

- 10
- 1-1
- un expected result
- 20
- 2-1
- compilation error

Check the answer of this question online on QuizOver.com:

Question: [using binarySearch with an array in java](http://www.quizover.com/pdf/using-binarysearch-with-an-array-in-java)

Permalink: <http://www.quizover.com/pdf/using-binarysearch-with-an-array-in-java>

4.1.8. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
import java.util.Arrays;

public class Tester {
    public static void main(String[] args) {

        String[] arr = { "java", "champ", "you" };
        System.out.print(Arrays.binarySearch(arr, "java"));
        System.out.print(Arrays.binarySearch(arr, "You"));

    }
}
```

Please choose only one answer:

- 02
- 0-1
- 13
- the result is unpredictable
- compilation error

Check the answer of this question online on QuizOver.com:

Question: [searching an array using binarySearch in java](http://www.quizover.com/pdf/searching-an-array-using-binarysearch-in-java)

Permalink: <http://www.quizover.com/pdf/searching-an-array-using-binarysearch-in-java>

4.1.9. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
import java.util.Arrays;

public class Tester {
    public static void main(String[] args) {
        Integer[] arr = { 1, 2, 3 };
        System.out.print(Arrays.binarySearch(arr, 1)); // line 1
        System.out.print(Arrays.binarySearch(arr, "javachamp")); // line 2
    }
}
```

Please choose all the answers that apply:

- line 1 will print 0
- line 1 will print 1
- line 1 causes compilation error
- line 2 will print 0
- line 2 will causes compilation error
- line 2 will causes RunTimeException

Check the answer of this question online on QuizOver.com:

Question: [binarySearch in java](#)

Permalink: <http://www.quizover.com/pdf/binarysearch-in-java>

4.1.10. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
import java.util.ArrayList;
import java.util.Collections;
import java.util.List;

public class Test{

    public static void main(String[] args) {

        List<Human> humans = new ArrayList<Human>();
        humans.add(new Human(13));
        humans.add(new Human(33));
        humans.add(new Human(21));
        humans.add(new Human(21));
        Collections.sort(humans);
        System.out.print(humans.get(0).age);
        System.out.print(humans.size());

    }

}

class Human implements Comparable<Human> {
    int age;

    public Human(int age) {
        this.age = age;
    }

    public int compareTo(Human h) {
        return h.age.compareTo(this.age);
    }

}
```

Please choose only one answer:

- 333
- 334
- 133
- 134
- Compilation fails

Check the answer of this question online on QuizOver.com:

Question: [How to implement Comparable in java](http://www.quizover.com/pdf/how-to-implement-comparable-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-implement-comparable-in-java>

4.1.11. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
import java.util.ArrayList;
import java.util.Collections;
import java.util.Comparator;
import java.util.List;

public class Tester{

    public static void main(String[] args) {

        List<Human> humans = new ArrayList<Human>();
        humans.add(new Human(13));
        humans.add(new Human(33));
        humans.add(new Human(21));
        humans.add(new Human(21)); // line 1
        HumanComparator c = new HumanComparator(); // line 2
        Collections.sort(humans, c); // line 3
        System.out.print(humans.get(0).age);
        Collections.sort(humans); // line 4
        System.out.print(humans.get(0).age);

    }

}

class Human implements Comparable<Human> {
    Integer age;

    public Human(int age) {
        this.age = age;
    }

    public int compareTo(Human h) {
        return h.age.compareTo(this.age);
    }

}

class HumanComparator implements Comparator<Human> {

    public int compare(Human h1, Human h2) {
        return h1.age.compareTo(h2.age);
    }

}
```

Please choose only one answer:

- line 1 causes a compilation error (no duplicates are allowed)
- line 2 causes a compilation error, the correct instantiation for HumanComparator is as so :
new HumanComparator<Human>()
- line 4 causes a compilation error, must supply a Comparator to methos sort.

- The program compiles and runs fine printing 1333
- The program compiles and runs fine printing 3313

Check the answer of this question online on QuizOver.com:

Question: [how to sort a collection in java?](#)

Permalink: <http://www.quizover.com/pdf/how-to-sort-a-collection-in-java>

4.1.12. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
import java.util.HashSet;
import java.util.Set;

public class Test{

    public static void main(String[] args) {

        Set<Human> humans = new HashSet<Human>();
        humans.add(new Human(13));
        humans.add(new Human(33));
        humans.add(new Human(21));
        humans.add(new Human(21));
        System.out.print(humans.size()+" ");
        System.out.print(humans);

    }

}

class Human implements Comparable<Human> {
    Integer age;

    public Human(int age) {
        this.age = age;
    }

    public int compareTo(Human h) {
        return h.age.compareTo(this.age);
    }

    public String toString() {
        return ""+this.age;
    }

}
```

Please choose only one answer:

- 4 [33, 21, 13, 21]
- 3 [21, 33, 13]
- compilation error
- exception is thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [inserting into a HashSet in java](http://www.quizover.com/pdf/inserting-into-a-hashset-in-java)

Permalink: <http://www.quizover.com/pdf/inserting-into-a-hashset-in-java>

4.1.13. In this program, the set humans allows for objects of type Human wi...

Author: Yasser Ibrahim

In this program, the set humans allows for objects of type Human with the same age to be inserted. What can be done to make the set reject any Human object with value age equals to age value for an already inserted human object?

```
import java.util.HashSet;
import java.util.Set;

public class Test{

    public static void main(String[] args) {

        Set<Human> humans = new HashSet<Human>();
        humans.add(new Human(13));
        humans.add(new Human(33));
        humans.add(new Human(21));
        humans.add(new Human(21));
    }

}

class Human {
    Integer age;

    public Human(int age) {
        this.age = age;
    }

}
```

Please choose only one answer:

- only override method equals() in Human as follows:

```
public boolean equals(Object h) {
    return this.age==((Human)h).age;
}
```

- only override method hashCode() in Human as follows:

```
public int hashCode(){
    return 17;
}
```

- must override both methods hashCode() and equals() as illustrated in the above answers

Check the answer of this question online on QuizOver.com:

Question: [How the Set collection allows no duplicates in java ?](http://www.quizover.com/pdf/how-the-set-collection-allows-no-duplicates-in-java)

Permalink: <http://www.quizover.com/pdf/how-the-set-collection-allows-no-duplicates-in-java>

4.1.14. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
import java.util.TreeMap;

public class Test {

    public static void main(String[] args) {
        TreeMap<Integer,String> map = new TreeMap<Integer,String>();
        map.put(1, "one");
        map.put(2, "two");
        map.put(3, "three");
        map.put(4, "four");
        System.out.print(map.higherKey(2));
        System.out.print(map.ceilingKey(2));
        System.out.print(map.floorKey(1));
        System.out.print(map.lowerKey(1));
    }
}
```

Please choose only one answer:

- 3211
- 321null
- 321-1
- 231null
- 2310

Check the answer of this question online on QuizOver.com:

Question: [TreeMap methods in java](http://www.quizover.com/pdf/treemap-methods-in-java)

Permalink: <http://www.quizover.com/pdf/treemap-methods-in-java>

4.1.15. What does the method ceilingKey in TreeMap do?

Author: Yasser Ibrahim

What does the method ceilingKey in TreeMap do?

Please choose only one answer:

- Returns the least key greater than or equal to the given key, or null if there is no such key.
- Returns the least key strictly greater than the given key, or null if there is no such key.
- Returns the least key in the tree

Check the answer of this question online on QuizOver.com:

Question: [ceilingKey in TreeMap in java](#)

Permalink: <http://www.quizover.com/pdf/ceilingkey-in-treemap-in-java>

4.1.16. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
import java.util.SortedMap;
import java.util.TreeMap;

public class Test {

    public static void main(String[] args) {
        TreeMap<Integer,String> map = new TreeMap<Integer,String>();
        map.put(1, "one");
        map.put(2, "two");
        map.put(3, "three");
        map.put(4, "four");
        SortedMap<Integer, String> smap1 = map.tailMap(2);
        SortedMap<Integer, String> smap2 = smap1.headMap(4);
        SortedMap<Integer, String> smap3 = smap2.subMap(2, 3);
        System.out.println(smap3);
    }
}
```

Please choose only one answer:

- {2=two, 3=three, 4=four}
- {2=two, 3=three}
- {2=two}
- no output is printed

Check the answer of this question online on QuizOver.com:

Question: [tailMap, headMap and subMap in java](http://www.quizover.com/pdf/tailmap-headmap-and-submap-in-java)

Permalink: <http://www.quizover.com/pdf/tailmap-headmap-and-submap-in-java>

4.1.17. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
import java.util.SortedSet;
import java.util.TreeSet;

public class Test {

    public static void main(String[] args) {
        TreeSet<Integer> map = new TreeSet<Integer>();
        map.add(1);
        map.add(2);
        map.add(4);
        map.add(7);
        SortedSet<Integer> smap = map.subSet(2,7);
        map.add(5);
        map.add(9);
        System.out.println(smap);
    }
}
```

Please choose only one answer:

- [2, 4, 5, 7]
- [2, 4, 7]
- [2, 4, 5, 7, 9]
- [2, 4, 5]
- [2, 4]

Check the answer of this question online on QuizOver.com:

Question: [subSet in java](http://www.quizover.com/pdf/subset-in-java)

Permalink: <http://www.quizover.com/pdf/subset-in-java>

4.1.18. What can be inserted, independently, at line // insert code here to...

Author: Yasser Ibrahim

What can be inserted, independently, at line // insert code here to cause the program to print out : [3, 4, 7, 0]

```
import java.util.*;

public class Test {

    public static void main(String[] args) {
        Queue<Integer> queue = new LinkedList<Integer>();
        queue.add(1);
        queue.add(3);
        queue.add(4);
        queue.add(7);

        // insert code here

        System.out.println(queue);
    }
}
```

Please choose all the answers that apply:

- queue.poll();queue.offer(0);queue.peek();
- queue.peek();queue.add(0);queue.peek();queue.poll();
- queue.add(0);queue.remove();queue.peek();
- queue.add(0);queue.poll();queue.remove();

Check the answer of this question online on QuizOver.com:

Question: [PriorityQueue methods in java](http://www.quizover.com/pdf/priorityqueue-methods-in-java)

Permalink: <http://www.quizover.com/pdf/priorityqueue-methods-in-java>

4.1.19. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
import java.util.*;

public class Test {

    public static void main(String[] args) {
        TreeSet s = new TreeSet();
        s.add(1);
        s.add(99.9);
        s.add(99.9);
        s.add(96.9);

        for (int i = 0; i < s.size(); i++) {
            System.out.print(s.pollFirst()+" ");
        }
    }
}
```

Please choose only one answer:

- 1 96.9 99.9
- 1 96.9 99.9 99.9
- 1
- compilation error
- an exception is thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [inserting into a non generic TreeSet in java](http://www.quizover.com/pdf/inserting-into-a-non-generic-treeset-in-java)

Permalink: <http://www.quizover.com/pdf/inserting-into-a-non-generic-treeset-in-java>

4.1.20. Based on equals() and hashCode() contract in java, which of the fol...

Author: JavaChamp Team

Based on equals() and hashCode() contract in java, which of the following is true?

Please choose all the answers that apply:

- if o1.equals(o2) is true, then hashCode(o1)== hashCode(o2) must return true
- if o1.equals(o2) is true, then hashCode(o1)== hashCode(o2) might return true
- if o1.equals(o2) is false, then hashCode(o1)== hashCode(o2) must return false
- if o1.equals(o2) is false, then hashCode(o1)== hashCode(o2) might return true
- if hashCode(o1)== hashCode(o2) returns true then o1.equals(o2) must return true

Check the answer of this question online on QuizOver.com:

Question: [equals and hashCode contract in java](http://www.quizover.com/pdf/equals-and-hashcode-contract-in-java)

Permalink: <http://www.quizover.com/pdf/equals-and-hashcode-contract-in-java>

4.1.21. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
import java.util.*;

public class Test {

    public static void main(String[] args) {

        String[] arr = { "Java", "Champ", "." };
        List<String> list = (List<String>) Arrays.asList(arr); // line 1
        arr[2] = ".com"; // line 2
        for (String word : list) {
            System.out.print(word);
        }
    }
}
```

Please choose only one answer:

- JavaChamp.
- JavaChamp.com
- compilation error at line 1, the correct method is toList not asList
- compilation error at line 2, cannot modify array after converting to a List
- compilation error in other lines than lines 1 and 2

Check the answer of this question online on QuizOver.com:

Question: [asList in java](#)

Permalink: <http://www.quizover.com/pdf/aslist-in-java>

4. Chapter: Generics

1. Generics Questions

4.1.1. What is the result of compiling and running the following program?

Author: Yasser Ibrahim

What is the result of compiling and running the following program?

```
import java.util.ArrayList;
import java.util.List;

public class Tester {

    public static void main(String[] args) {

        List<String> list1 = new ArrayList<String>();//line 1
        List<Object> list2 = list1;//line 2
        list2.add(new Integer(12));//line 3
        System.out.println(list2.size());//line 4

    }
}
```

Please choose only one answer:

- Compilation error at line 1, must initialize the size
- Compilation error at line 2, Type mismatch, cannot convert from List<String> to List<Object>
- Compilation error at line 3, can add objects of type String only
- 1

Check the answer of this question online on QuizOver.com:

Question: [How to declare instantiate java generic collection?](http://www.quizover.com/pdf/how-to-declare-instantiate-java-generic-collection)

Permalink: <http://www.quizover.com/pdf/how-to-declare-instantiate-java-generic-collection>

4.1.2. What is the result of compiling and running the following program u...

Author: JavaChamp Team

What is the result of compiling and running the following program using JDK 1.5 or higher?

```
import java.util.ArrayList;
import java.util.List;

interface chewable {}

class Gum implements chewable {}

public class Tester {

    public static void main(String[] args) {
        List<Gum> list1 = new ArrayList<Gum>();
        list1.add(new Gum());
        List list2 = list1;
        list2.add(new Integer(9));
        System.out.println(list2.size());
    }
}
```

Please choose only one answer:

- Compilation error
- 2 will be printed but with warnings
- 2 will be printed without warnings
- An exception will be thrown at runtime

Check the answer of this question online on QuizOver.com:

Question: [How to add to java generic collection?](http://www.quizover.com/pdf/how-to-add-to-java-generic-collection)

Permalink: <http://www.quizover.com/pdf/how-to-add-to-java-generic-collection>

4.1.3. What is the result of compiling and running the following program u...

Author: Yasser Ibrahim

What is the result of compiling and running the following program using jdk 1.5 or higher?

```
import java.util.ArrayList;
import java.util.List;

interface chewable {}

class Gum implements chewable {}

class Meat implements chewable {}

public class Tester {

    public static void main(String[] args) {
        List list1 = new ArrayList<chewable>();// line 1
        list1.add(new Gum());// line 2
        list1.add(new Meat());// line 3
        list1.add(new Integer(9));// line 4
        System.out.println(list1.size());// line 5
    }
}
```

Please choose only one answer:

- Compilation error at line 1
- Compilation error at line 4
- Runtime exception thrown at line 1
- Runtime exception thrown at line 4
- 3

Check the answer of this question online on QuizOver.com:

Question: [How to declare java generic collection?](#)

Permalink: <http://www.quizover.com/pdf/how-to-declare-java-generic-collection>

4.1.4. Which of the following is a correct declaration and instantiation o...

Author: [JavaChamp Team](#)

Which of the following is a correct declaration and instantiation of list?

Please choose all the answers that apply:

- `List<String> list = new ArrayList<String>();`
- `List<?> list = new ArrayList<String>();`
- `List<? extends Object> list = new ArrayList<String>();`
- `List<Object> list = new ArrayList<String>();`
- `List list = new ArrayList<String>();`
- `List list = new ArrayList<?>();`

Check the answer of this question online on QuizOver.com:

Question: [java generic collection rules?](#)

Permalink: <http://www.quizover.com/pdf/java-generic-collection-rules>

4.1.5. The following code contains a compilation error, at what line?

Author: Yasser Ibrahim

The following code contains a compilation error, at what line?

```
import java.util.ArrayList;
import java.util.List;

interface Chewable {}
class Meat implements Chewable {}

public class Tester {

    public static void main(String[] args) {

        List<? extends Chewable> list1 = new ArrayList<Meat>(); // Line 11

        List<Chewable> list2      = new ArrayList<Chewable>(); // Line 13

        Meat meat = new Meat();

        list1.add(meat); // Line 17

        list2.add(meat); // Line 19
    }
}
```

Please choose only one answer:

- Line 11
- Line 13
- Line 17
- Line 19

Check the answer of this question online on QuizOver.com:

Question: [When cannot add to a generic collection?](http://www.quizover.com/pdf/when-cannot-add-to-a-generic-collection)

Permalink: <http://www.quizover.com/pdf/when-cannot-add-to-a-generic-collection>

4.1.6. The following program contains two compilation errors, at what lines?

Author: JavaChamp Team

The following program contains two compilation errors, at what lines?

```
import java.util.ArrayList;
import java.util.List;

interface Chewable {}
class Meat implements Chewable {}

public class Tester {

    public static List<? extends Chewable> printSize(List<? extends Chewable> list) { // Line 10
        System.out.println(list.size());
        return list;
    }
    public static void main(String[] args) {

        List<? extends Chewable> list1 = new ArrayList<Meat>(); // Line 16
        List<Chewable> list2 = new ArrayList<Chewable>(); // Line 17
        List<Meat> list3 = new ArrayList<Meat>(); // Line 18

        list1 = printSize(list1); // Line 20
        list2 = printSize(list2); // Line 21
        list3 = printSize(list3); // Line 22

    }
}
```

Please choose all the answers that apply:

- Line 10
- Line 16
- Line 17
- Line 18
- Line 20
- Line 21
- Line 22

Check the answer of this question online on QuizOver.com:

Question: [Proper instantiation of java generic collection](http://www.quizover.com/pdf/proper-instantiation-of-java-generic-collection)

Permalink: <http://www.quizover.com/pdf/proper-instantiation-of-java-generic-collection>

4.1.7. When were generics first introduced in Java?

Author: [JavaChamp Team](#)

When were generics first introduced in Java?

Please choose only one answer:

- in JDK 1.4
- in JDK 1.5
- in JDK 1.6

Check the answer of this question online on [QuizOver.com](#):

Question: [When were Generics first introduced in Java?](#)

Permalink: <http://www.quizover.com/pdf/when-were-generics-first-introduced-in-java>

4.1.8. What is the expected output of compiling and running the following ...

Author: Yasser Ibrahim

What is the expected output of compiling and running the following code?

```
import java.util.ArrayList;
import java.util.Collections;
import java.util.List;

public class Test{
    public static void main(String[] args) {

        List<Foo> myFooList = new ArrayList<Foo>();
        myFooList.add(new Foo("C"));
        myFooList.add(new Foo("A"));
        myFooList.add(new Foo("D"));

        Collections.sort(myFooList);
        System.out.print(myFooList.get(0).code);
    }
}

class Foo implements Comparable<Foo> {
    String code;

    Foo(String c) {
        code = c;
    }

    int compareTo(Foo f) {
        return this.code.compareTo(f.code);
    }
}
```

Please choose only one answer:

- A
- C
- D
- no output is printed
- compilation error
- exception thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [how to sort a generic collection?](http://www.quizover.com/pdf/how-to-sort-a-generic-collection)

Permalink: <http://www.quizover.com/pdf/how-to-sort-a-generic-collection>

4.1.9. What is the expected output of compiling and running the following ...

Author: Yasser Ibrahim

What is the expected output of compiling and running the following code?

```
import java.util.ArrayList;
import java.util.List;

public class Test{
    public static void main(String[] args) {

        List list = new ArrayList();

        list.add("Hello");
        Foo f = new Foo();
        list.add(f);

        f = list.get(1);
        System.out.print(list.get(0) + "-" + f);
    }
}

class Foo {
    public String toString() {
        return "Foo";
    }
}
```

Please choose only one answer:

- Hello-Foo
- compilation error
- exception at run time

Check the answer of this question online on QuizOver.com:

Question: [inserting into a non-generic collection in java](http://www.quizover.com/pdf/inserting-into-a-nongeneric-collection-in-java)

Permalink: <http://www.quizover.com/pdf/inserting-into-a-nongeneric-collection-in-java>

4.1.10. Considering that all needed imports are there, what, inserted indep...

Author: JavaChamp Team

Considering that all needed imports are there, what, inserted independently at line 1, will compile?

```
class A {}
class B extends A{}
class C extends B{}

public class Test {

    public List<? extends B> ring(){
        // line 1
    }
}
```

Please choose all the answers that apply:

- return new ArrayList();
- return new ArrayList<C>();
- return new ArrayList<A>();
- return new ArrayList<? extends B>();
- return new LinkedList();
- return new PriorityQueue();
- return new ArrayList();

Check the answer of this question online on QuizOver.com:

Question: [generic collection as return type in java](http://www.quizover.com/pdf/generic-collection-as-return-type-in-java)

Permalink: <http://www.quizover.com/pdf/generic-collection-as-return-type-in-java>

4.1.11. Will the following code compile?

Author: Yasser Ibrahim

Will the following code compile?

```
import java.util.*;

class B {
}

class C extends B {
}

public class Test {

    public static <E extends B> Queue<E> ring(List<E> list) {
        return null;
    }

    public static void main(String[] args) {
        List<C> list1 = new ArrayList<C>();
        ArrayList<C> list2 = new ArrayList<C>();

        Queue<C> q1;
        PriorityQueue<C> q2;

        q1 = ring(list1); // line1
        q1 = ring(list2); // line2
        q2 = ring(list1); // line3
        q2 = ring(list2); // line4
    }
}
```

Please choose all the answers that apply:

- Yes, the program is free of compilation errors
- No, there is a compilation error at // Line 1
- No, there is a compilation error at // Line 2
- No, there is a compilation error at // Line 3
- No, there is a compilation error at // Line 4

Check the answer of this question online on QuizOver.com:

Question: [generic methods in java](http://www.quizover.com/pdf/generic-methods-in-java)

Permalink: <http://www.quizover.com/pdf/generic-methods-in-java>

4.1.12. How can this program be modified to make use of appropriate generic...

Author: Yasser Ibrahim

How can this program be modified to make use of appropriate generic types? (one modification for each line)

```
import java.util.*;

public class Test {

    public static void main(String[] args) {
        List ids = new ArrayList(); // Line 1
        ids.add(123);
        ids.add(999);

        Map students = new HashMap(); // Line 2
        students.put("Jess",ids.get(0));
        students.put("Jimmy",ids.get(1));

        int x = ((Long)students.get("Jimmy")).intValue(); // Line 3
    }
}
```

Please choose all the answers that apply:

- replace line 1 with `List<Integer> ids = new ArrayList<Integer>();`
- replace line 1 with `List<Long> ids = new ArrayList<Long>();`
- replace line 2 with `Map<Integer,String> students = new HashMap<Integer,String>();`
- replace line 2 with `Map<String,Integer> students = new HashMap<String,Integer>();`
- replace line 3 with `int x = students.get("Jimmy");`

Check the answer of this question online on QuizOver.com:

Question: [how to declare a generic collection in java?](http://www.quizover.com/pdf/how-to-declare-a-generic-collection-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-declare-a-generic-collection-in-java>

4.1.13. Given the following incomplete program, based on the given put stat...

Author: JavaChamp Team

Given the following incomplete program, based on the given put statements in map, what is considered a correct declaration and instantiation for map ?

```
import java.util.*;

public class Test {

    public static void main(String[] args) {

        // insert code here

        map.put(new ArrayList<Integer>(), 1);
        map.put(new ArrayList<Integer>(), 12);
        map.put(new LinkedList<Integer>(), new Integer(1));
        map.put(new LinkedList<Integer>(), new Long(1));

    }
}
```

Please choose only one answer:

- 1) Map<List<Integer>,? extends Number> map = new HashMap<List<Integer>,Number>();
- 2) Map<List<Integer>,Number> map = new HashMap<List<Integer>,Integer>();
- 3) Map<List<Integer>, Number> map = new HashMap<List<Integer>, Number>();
- 4) Map<List<Integer>,Integer> map = new HashMap<List<Integer>,Integer>();
- 5) Map<ArrayList<Integer>,Integer> map = new HashMap<ArrayList<Integer>,Integer>();
- 6) Map<List<Integer>,Long> map = new HashMap<List<Integer>,Long>();

Check the answer of this question online on QuizOver.com:

Question: [how to declare a generic Map in java?](http://www.quizover.com/pdf/how-to-declare-a-generic-map-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-declare-a-generic-map-in-java>

4. Chapter: Formatting

1. Formatting Questions

4.1.1. Which of the following statements produces the output 3 + 8 ?

Author: Yasser Ibrahim

Which of the following statements produces the output 3 + 8 ?

```
public class Tester {  
  
    public static void main(String[] args) {  
        int x = 8;  
        int y = 3;  
  
        System.out.printf("%d + %d \n", y, x); // stmt1  
        System.out.printf("%f + %f \n", (float) y, (float) x); // stmt2  
        System.out.printf("%d + %d \n", x, y); // stmt3  
        System.out.format("%2$d + %1$d", x, y); // stmt4  
    }  
}
```

Please choose all the answers that apply:

- Statement 1
- Statement 2
- Statement 3
- Statement 4

Check the answer of this question online on QuizOver.com:

Question: [writing java printf or format statement](http://www.quizover.com/pdf/writing-java-printf-or-format-statement)

Permalink: <http://www.quizover.com/pdf/writing-java-printf-or-format-statement>

4.1.2. Which of the following is instantiated using a factory method ?

Author: Yasser Ibrahim

Which of the following is instantiated using a factory method ?

Please choose all the answers that apply:

- Date
- Calendar
- Locale
- DateFormat
- NumberFormat

Check the answer of this question online on QuizOver.com:

Question: [java classes instantiated using factory method](http://www.quizover.com/pdf/java-classes-instantiated-using-factory-method)

Permalink: <http://www.quizover.com/pdf/java-classes-instantiated-using-factory-method>

4. Chapter: I/O

1. I/O Questions

4.1.1. Which of the following statements is a correct instantiation of Pr...

Author: Yasser Ibrahim

Which of the following statements is a correct instantiation of PrintWriter?

Please choose all the answers that apply:

- `PrintWriter writer = new PrintWriter("file.dat");`
- `PrintWriter writer = new PrintWriter(new BufferedWriter("file.dat"));`
- `PrintWriter writer = new PrintWriter(new FileWriter("file.dat"));`
- `PrintWriter writer = new PrintWriter(new File("file.dat"));`

Check the answer of this question online on QuizOver.com:

Question: [How to instantiate java PrintWriter?](http://www.quizover.com/pdf/how-to-instantiate-java-printwriter)

Permalink: <http://www.quizover.com/pdf/how-to-instantiate-java-printwriter>

4.1.2. At what line in the following program the file "data.txt" will be c...

Author: Yasser Ibrahim

At what line in the following program the file "data.txt" will be created in the file system?

```
import java.io.BufferedWriter;
import java.io.File;
import java.io.FileWriter;
import java.io.IOException;

public class Tester {

    public static void main(String[] args) {
        try {
            File file = new File("data.txt");// line 5
            file.createNewFile(); // line 6
            FileWriter fr = new FileWriter(file); // line 7
            BufferedWriter br = new BufferedWriter(fr); // line 8
            br.append("javachamp");
            br.flush();
            br.close(); // line 11
        } catch (IOException e) {
            e.printStackTrace();
        }
    }
}
```

Please choose only one answer:

- Line 5
- Line 6
- Line 7
- Line 8
- Line 11

Check the answer of this question online on QuizOver.com:

Question: [How to create file in java?](#)

Permalink: <http://www.quizover.com/pdf/how-to-create-file-in-java>

4.1.3. Given the following code segment enclosed within a try/catch block,...

Author: Yasser Ibrahim

Given the following code segment enclosed within a try/catch block, what valid Exception type can be caught causing no compilation error?

```
try {
    File file = new File("file.dat");
    file.createNewFile();
} catch (
    // INSERT EXCEPTION TYPE
    e) {
    e.printStackTrace();
}
```

Please choose all the answers that apply:

- Exception
- RuntimeException
- Throwable
- FileNotFoundException
- IOException

Check the answer of this question online on QuizOver.com:

Question: [What java exceptions thrown by File?](http://www.quizover.com/pdf/what-java-exceptions-thrown-by-file)

Permalink: <http://www.quizover.com/pdf/what-java-exceptions-thrown-by-file>

4.1.4. Which of the following is a correct instantiation for a BufferedWri...

Author: JavaChamp Team

Which of the following is a correct instantiation for a BufferedWriter?

Please choose all the answers that apply:

- `BufferedWriter bw = new BufferedWriter(new File("data.txt"));`
- `BufferedWriter bw = new BufferedWriter(new FileWriter("data.txt"));`
- `BufferedWriter bw = new BufferedWriter(new PrintWriter("data.txt"));`
- `BufferedWriter bw = new BufferedWriter("data.txt");`

Check the answer of this question online on QuizOver.com:

Question: [How to instantiate java BufferedWriter?](http://www.quizover.com/pdf/how-to-instantiate-java-bufferedwriter)

Permalink: <http://www.quizover.com/pdf/how-to-instantiate-java-bufferedwriter>

4. Chapter: Threads

1. Threads Questions

4.1.1. What is considered an impossible output of running the following pr...

Author: JavaChamp Team

What is considered an impossible output of running the following program?

```
public class Tester extends Thread {  
    int code = 9;  
    public void run() {  
        this.code = 7;  
    }  
    public static void main(String[] args) {  
        Tester thread = new Tester();  
        thread.start();  
        for (int i = 0; i < 5; i++) {  
            System.out.print(thread.code);  
        }  
    }  
}
```

Please choose only one answer:

- 99777
- 97777
- 77777
- 79999
- 99999

Check the answer of this question online on QuizOver.com:

Question: [How java thread start running?](#)

Permalink: <http://www.quizover.com/pdf/how-java-thread-start-running>

4.1.2. What is the result of compiling and running the following program?

Author: JavaChamp Team

What is the result of compiling and running the following program?

```
public class Tester {  
  
    public void validate() {  
        int i = 0;  
        while (++i < 3) {  
            try {  
                wait();  
            } catch (InterruptedException e) {  
                e.printStackTrace();  
            }  
            System.out.print(i);  
        }  
    }  
  
    public static void main(String[] args) {  
        new Tester().validate();  
    }  
}
```

Please choose only one answer:

- Compilation error because of calling wait() outside a synchronized block
- Compilation error because InterruptedException is not handled
- At runtime, it throws an InterruptedException when trying to wait
- 12

Check the answer of this question online on QuizOver.com:

Question: [When java InterruptedException is thrown?](http://www.quizover.com/pdf/when-java-illegalmonitorstateexception-is-thrown)

Permalink: <http://www.quizover.com/pdf/when-java-illegalmonitorstateexception-is-thrown>

4.1.3. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester extends Thread {  
    public void run() {  
        System.out.print("run");  
    }  
  
    public static void main(String[] args) {  
        Tester thread = new Tester();  
        new Thread(thread).start();  
        new Thread(thread).start();  
    }  
}
```

Please choose only one answer:

- Compilation error, can't invoke start() twice
- runrun
- IllegalStateException will be thrown because of the second invoke to start()
- run

Check the answer of this question online on QuizOver.com:

Question: [Can java thread invoke start more than once?](http://www.quizover.com/pdf/can-java-thread-invoke-start-more-than-once)

Permalink: <http://www.quizover.com/pdf/can-java-thread-invoke-start-more-than-once>

4.1.4. What could be a part of the output of compiling and running the fol...

Author: JavaChamp Team

What could be a part of the output of compiling and running the following code?

```
public class Tester extends Thread {  
  
    public void run() {  
        System.out.println("run");  
    }  
  
    public static void main(String[] args) {  
        Thread thread = new Tester();  
        thread.run();  
        thread.start();  
        thread.start();  
    }  
}
```

Please choose all the answers that apply:

- Compilation error
- Prints "run" twice, not necessarily consecutively
- InterruptedException will be thrown
- IllegalStateException will be thrown
- Prints "run" three times

Check the answer of this question online on QuizOver.com:

Question: [When java IllegalStateException is thrown?](http://www.quizover.com/pdf/when-java-illegalthreadstateexception-is-thrown)

Permalink: <http://www.quizover.com/pdf/when-java-illegalthreadstateexception-is-thrown>

4.1.5. Which of the following methods defined in Thread class are static?

Author: JavaChamp Team

Which of the following methods defined in Thread class are static?

Please choose all the answers that apply:

- sleep()
- start()
- yield()
- join()
- run()

Check the answer of this question online on QuizOver.com:

Question: [which thread methods are static?](http://www.quizover.com/pdf/which-thread-methods-are-static)

Permalink: <http://www.quizover.com/pdf/which-thread-methods-are-static>

4.1.6. Which methods are defined in calss Object?

Author: Yasser Ibrahim

Which methods are defined in calss Object?

Please choose all the answers that apply:

- wait()
- sleep()
- toString()
- finalize()
- notify()

Check the answer of this question online on QuizOver.com:

Question: [which methods are defined in calss object?](#)

Permalink: <http://www.quizover.com/pdf/which-methods-are-defined-in-calss-object>

4.1.7. When a class implements interface Runnable, it must provide impleme...

Author: Yasser Ibrahim

When a class implements interface Runnable, it must provide implementation for method start():

Please choose only one answer:

- False
- True

Check the answer of this question online on QuizOver.com:

Question: [when to override thread method run\(\)](#)?

Permalink: <http://www.quizover.com/pdf/when-to-override-thread-method-run>

4.1.8. A thread that invokes the wait() method of an object, must owns th...

Author: JavaChamp Team

A thread that invokes the wait() method of an object, must owns the lock of the object.

Please choose only one answer:

- True
- False

Check the answer of this question online on QuizOver.com:

Question: [when a thread can call wait\(\)](#)?

Permalink: <http://www.quizover.com/pdf/when-a-thread-can-call-wait>

4.1.9. How can a thread own the lock of an object?

Author: Yasser Ibrahim

How can a thread own the lock of an object?

Please choose all the answers that apply:

- When the thread executes a synchronized instance method of that object
- When the thread executes a synchronized statement block in the object
- When the thread calls wait() on this object

Check the answer of this question online on QuizOver.com:

Question: [how can a thread own the lock of an object?](http://www.quizover.com/pdf/how-can-a-thread-own-the-lock-of-an-object)

Permalink: <http://www.quizover.com/pdf/how-can-a-thread-own-the-lock-of-an-object>

4.1.10. Which of the following Thread instantiations are correct?

Author: Yasser Ibrahim

Which of the following Thread instantiations are correct?

```
public static void main(String[] args) {  
    new Thread(); // line 1  
    new Thread("myThread"); // line 2  
    new Thread(new Long(14)); // line 3  
    new Thread(new Runnable(){public void run(){} }); // line 4  
    Thread.getInstance(); // line 5  
}
```

Please choose all the answers that apply:

- line 1
- line 2
- line 3
- line 4
- line 5

Check the answer of this question online on QuizOver.com:

Question: [how to instantiate a thread object?](http://www.quizover.com/pdf/how-to-instantiate-a-thread-object)

Permalink: <http://www.quizover.com/pdf/how-to-instantiate-a-thread-object>

4.1.11. Thread objects are created by:

Author: Yasser Ibrahim

Thread objects are created by:

Please choose all the answers that apply:

- direct instantiation from java.lang.Thread class
- instantiation from a class which implements the java.lang.Thread class
- instantiation a Runnable object (from a class which implements the Runnable interface)
- instantiation a Runnable object (from a class which implements the Runnable interface) and passing this Runnable object to a Thread constructor.

Check the answer of this question online on QuizOver.com:

Question: [How to create a Thread object?](#)

Permalink: <http://www.quizover.com/pdf/how-to-create-a-thread-object>

4.1.12. When creating a thread by implementing Runnable interface :

Author: [JavaChamp Team](#)

When creating a thread by implementing Runnable interface :

Please choose only one answer:

- you must implement the method run()
- you can override run(), but in case you don't you'll be restricted to the provided run() method, which contains no code and does nothing

Check the answer of this question online on QuizOver.com:

Question: [Create a thread by implementing Runnable](#)

Permalink: <http://www.quizover.com/pdf/create-a-thread-by-implementing-runnable>

4.1.13. How many times the statement "we are painting" would be printed in ...

Author: Yasser Ibrahim

How many times the statement "we are painting" would be printed in this program?

```
public class Test{  
    public static void main(String[] args) {  
        Painter painter1 = new Painter();  
        painter1.start();  
  
        Painter painter2 = new Painter();  
        painter2.start();  
    }  
}  
  
class Painter implements Runnable {  
    public void run() {  
        System.out.println("we are painting");  
    }  
}
```

Please choose only one answer:

- two times
- zero times
- the program will not compile

Check the answer of this question online on QuizOver.com:

Question: [instantiate a thread by implementing Runnable interface](http://www.quizover.com/pdf/instantiate-a-thread-by-implementing-runnable-interface)

Permalink: <http://www.quizover.com/pdf/instantiate-a-thread-by-implementing-runnable-interface>

4.1.14. What is the possible output of compiling and running the following ...

Author: JavaChamp Team

What is the possible output of compiling and running the following code?

```
public class Test {  
  
    public static void main(String[] args) {  
        Thread request1 = new Thread(new InternetRequest (), "request#1 ");  
        Thread request2 = new Thread(new InternetRequest (), "request#2 ");  
  
        request1.start();  
        request2.start();  
  
    }  
}  
  
class InternetRequest implements Runnable {  
  
    public void run() {  
        System.out.print(Thread.currentThread().getName());  
  
    }  
}
```

Please choose all the answers that apply:

- request#2 request#1
- request#1 request#2
- an InterruptedException is thrown
- request#1 request#1

Check the answer of this question online on QuizOver.com:

Question: [starting many threads together in java](http://www.quizover.com/pdf/starting-many-threads-together-in-java)

Permalink: <http://www.quizover.com/pdf/starting-many-threads-together-in-java>

4.1.15. What is the output of compiling and running the following code?

Author: JavaChamp Team

What is the output of compiling and running the following code?

```
class Writer extends Thread {  
    public void run() {  
        System.out.println("Writer run");  
    }  
  
    public static void main(String[] args) {  
        Runnable c = new Writer();  
        Thread t = new Thread(c);  
        t.run();  
    }  
}
```

Please choose only one answer:

- Compilation error
- compiles fine, but no output produced
- compiles fine and prints "Writer run"
- compiles fine but throws an exception

Check the answer of this question online on QuizOver.com:

Question: [instantiate a thread by implementing Runnable in java](http://www.quizover.com/pdf/instantiate-a-thread-by-implementing-runnable-in-java)

Permalink: <http://www.quizover.com/pdf/instantiate-a-thread-by-implementing-runnable-in-java>

4.1.16. What is the output of compiling and running the following code?

Author: [JavaChamp Team](#)

What is the output of compiling and running the following code?

```
public class Test extends Thread {
    static int count = 0;

    public static void main(String argv[]) {
        Test t = new Test ();
        t.increment(count);
        t.start();
        Thread.sleep(1000);
        System.out.println(count);
    }

    public void increment(int count) {
        ++count;
    }

    public void run() {
        count = count + 5;
    }
}
```

Please choose only one answer:

- 5
- 6
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [handling a checked exception](#)

Permalink: <http://www.quizover.com/pdf/handling-a-checked-exception>

4.1.17. What is the could be the output of compiling and running the follow...

Author: Yasser Ibrahim

What is the could be the output of compiling and running the following code?

```
public class Test extends Thread {
    static int count = 0;

    public static void main(String argv[]) throws InterruptedException {
        Test t = new Test ();
        t.increment(count);
        t.start();
        Thread.sleep(1000);
        System.out.println(count);
    }

    public void increment(int count) {
        ++count;
    }

    public void run() {
        count = count + 5;
    }
}
```

Please choose all the answers that apply:

- 5
- 6
- Compilation error
- An InterruptedException may be thrown

Check the answer of this question online on QuizOver.com:

Question: [running a thread in java](#)

Permalink: <http://www.quizover.com/pdf/running-a-thread-in-java>

4.1.18. What is the possible output of running this program once as it is a...

Author: Yasser Ibrahim

What is the possible output of running this program once as it is and once by marking swim() synchronized?

```
class Swimmer implements Runnable{
    String name ;
    Swimmer(String name){
        this.name = name;
    }
    public void run() {
        Test.swim(name);
    }
}

public class Test {

    public static void swim(String name) {
        System.out.print(name);
        System.out.print(name);
    }

    public static void main(String[] args) {
        new Thread(new Swimmer("Tom")).start();
        new Thread(new Swimmer("Hanks")).start();
    }
}
```

Please choose all the answers that apply:

- as it is, a possible output is TomHanksTomHanks
- as it is, a possible output is TomHanksHanksTom
- by synchronizing swim(), a possible output is TomHanksHanksTom
- by synchronizing swim(), a possible output is HanksHanksTomTom
- by synchronizing swim(), a possible output is TomHanksTomHanks

Check the answer of this question online on QuizOver.com:

Question: [synchronized static method and threads in java](http://www.quizover.com/pdf/synchronized-static-method-and-threads-in-java)

Permalink: <http://www.quizover.com/pdf/synchronized-static-method-and-threads-in-java>

4.1.19. What are the possible outputs of running this program once as it is...

Author: Yasser Ibrahim

What are the possible outputs of running this program once as it is, and second with marking swim() synchronized?

```
class Swimmer implements Runnable{
    String name ;
    Swimmer(String name){
        this.name = name;
    }
    public void run() {
        new Test().swim(name);
    }
}

public class Test {

    public void swim(String name) {
        System.out.print(name);
        System.out.print(name);
    }

    public static void main(String[] args) {
        new Thread(new Swimmer("Tom")).start();
        new Thread(new Swimmer("Hanks")).start();
    }
}
```

Please choose all the answers that apply:

- as it is, the output is always consecutive two Tom then two Hanks or consecutive two Hanks then two Tom
- as it is, the output is undetermined. It is in any order of two Tom and two Hanks
- by synchronizing swim(), the output is always consecutive two Tom then two Hanks or consecutive two Hanks then two Tom
- by synchronizing swim(), the output is undetermined. It is in any order of two Tom and two Hanks

Check the answer of this question online on QuizOver.com:

Question: [synchronized method and threads in java](http://www.quizover.com/pdf/synchronized-method-and-threads-in-java)

Permalink: <http://www.quizover.com/pdf/synchronized-method-and-threads-in-java>

4.1.20. What are the possible outputs of running this program once as it is...

Author: JavaChamp Team

What are the possible outputs of running this program once as it is, and second with marking swimIn() synchronized?

```
class Swimmer implements Runnable {
    String name;
    Pool pool;

    Swimmer(String name, Pool pool) {
        this.name = name;
        this.pool = pool;
    }

    public void run() {
        pool.swimIn(name);
    }
}

public class Pool {

    public void swimIn(String name) {
        System.out.print(name);
        System.out.print(name);
    }

    public static void main(String[] args) {
        Pool pool = new Pool();
        new Thread(new Swimmer("Tom", pool)).start();
        new Thread(new Swimmer("Hanks", pool)).start();
    }
}
```

Please choose all the answers that apply:

- as it is, the output is always two consecutive "Tom" followed by two consecutive "Hanks" or viceversa
- as it is, the output could be TomHanksTomHanks
- by synchronizing swimIn(), the output is always two consecutive "Tom" followed by two consecutive "Hanks" or viceversa
- by synchronizing swimIn(), the output could be TomHanksTomHanks
- by synchronizing swimIn(), the output could be TomHanksHanksTom

Check the answer of this question online on QuizOver.com:

Question: [synchronized method in java](http://www.quizover.com/pdf/synchronized-method-in-java)

Permalink: <http://www.quizover.com/pdf/synchronized-method-in-java>

4.1.21. What is the possible result of compiling and running the following ...

Author: Yasser Ibrahim

What is the possible result of compiling and running the following code?

```
class Swimmer implements Runnable {
    String name;
    Pool pool;

    Swimmer(String name, Pool pool) {
        this.name = name;
        this.pool = pool;
    }

    public void run() {
        pool.swimIn(name);
    }
}

public class Pool {

    public void swimIn(String name) {
        synchronized {
            System.out.print(name);
            System.out.print(name);
        }
    }

    public static void main(String[] args) {
        Pool pool = new Pool();
        new Thread(new Swimmer("Tom", pool)).start();
        new Thread(new Swimmer("Hanks", pool)).start();
    }
}
```

Please choose only one answer:

- TomTomHanksHanks
- HanksHanksTomTom
- HanksTomHanksTom
- undetermined order
- compilation error

Check the answer of this question online on QuizOver.com:

Question: [how to synchronize a method in java](http://www.quizover.com/pdf/how-to-synchronize-a-method-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-synchronize-a-method-in-java>

4.1.22. What is the possible result of compiling and running the following ...

Author: JavaChamp Team

What is the possible result of compiling and running the following code?

```
public class Test implements Runnable {
    Integer id;

    public static void main(String[] args) {
        new Thread(new Test()).start();
        new Thread(new Test()).start();
    }

    public void run() {
        press(id);
    }

    synchronized void press(Integer id) {
        System.out.print(id.intValue());
        System.out.print(++id.intValue());
    }
}
```

Please choose only one answer:

- 0101
- 0011
- -10-10
- -1-100
- compilation error
- an exception is thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [thread and synchronized method in java](#)

Permalink: <http://www.quizover.com/pdf/thread-and-synchronized-method-in-java>

4.1.23. What is the possible result of compiling and running the following ...

Author: Yasser Ibrahim

What is the possible result of compiling and running the following code?

```
public class Test implements Runnable {
    Integer id = 0;

    public static void main(String[] args) {
        new Thread(new Test()).start();
        new Thread(new Test()).start();
    }

    public void run() {
        press(id);
    }

    synchronized void press(Integer id) {
        System.out.print(id.intValue());
        System.out.print(++id.intValue());
    }
}
```

Please choose only one answer:

- 1010
- 0101
- 0123
- compilation error
- an exception is thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [synchronized non static method in java](http://www.quizover.com/pdf/synchronized-non-static-method-in-java)

Permalink: <http://www.quizover.com/pdf/synchronized-non-static-method-in-java>

4.1.24. What is ture?

Author: JavaChamp Team

What is ture?

```
public class Test implements Runnable {  
  
    public static void main(String[] args) throws InterruptedException {  
        Test test = new Test();  
        Thread t= new Thread(test);  
        t.start();  
        t.join();  
        System.out.print("main");  
    }  
  
    public void run() {  
        System.out.print("run");  
    }  
}
```

Please choose only one answer:

- the output could be "mainrun"
- the output could be "runmain"
- the output could be "run" then an exception is thrown at run time
- compilation error

Check the answer of this question online on QuizOver.com:

Question: [thread join java](#)

Permalink: <http://www.quizover.com/pdf/thread-join-java>

4.1.25. What is true?

Author: JavaChamp Team

What is true?

```
public class Test implements Runnable {  
  
    public static void main(String[] args) {  
        Test test = new Test();  
        Thread thread = new Thread(test);  
        thread.start();  
        thread.join();  
        System.out.print("main");  
    }  
  
    public void run() {  
        System.out.print("run");  
    }  
}
```

Please choose only one answer:

- the program could prints runmain
- the program could prints mainrun
- the compilation fails
- an exception is thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [join thread in java](#)

Permalink: <http://www.quizover.com/pdf/join-thread-in-java>

4.1.26. What are the possible results of compiling and running the followin...

Author: Yasser Ibrahim

What are the possible results of compiling and running the following code?

```
public class Test implements Runnable {  
    int id;  
  
    Test(int id) {  
        this.id = id;  
    }  
  
    public static void main(String[] args) throws InterruptedException {  
        Thread thread1 = new Thread(new Test(1));  
        Thread thread2 = new Thread(new Test(2));  
        thread1.run();  
        thread2.start();  
        System.out.print("main");  
    }  
  
    public void run() {  
        System.out.print(id);  
    }  
}
```

Please choose all the answers that apply:

- 12main
- 21main
- 2main1
- 1main2
- compilation error, cannot invoke run() directly on thread1
- compilation error, cannot invoke start() directly on thread2

Check the answer of this question online on QuizOver.com:

Question: [run vs start in threads in java](http://www.quizover.com/pdf/run-vs-start-in-threads-in-java)

Permalink: <http://www.quizover.com/pdf/run-vs-start-in-threads-in-java>

4.1.27. What does sleep(long millis) in Thread class do?

Author: JavaChamp Team

What does sleep(long millis) in Thread class do?

Please choose only one answer:

- causes the thread, which sleep is invoked on, to sleep (temporarily cease execution) for the specified number of milliseconds
- causes the currently executing thread to sleep (temporarily cease execution) for the specified number of milliseconds
- causes the main() thread to sleep for the specified number of milliseconds
- causes the currently executing thread to wait(temporarily cease execution) for the specified number of milliseconds then brings it back to run.

Check the answer of this question online on QuizOver.com:

Question: [sleep in thread in java](#)

Permalink: <http://www.quizover.com/pdf/sleep-in-thread-in-java>

4.1.28. What are the possible results of compiling and running the followin...

Author: JavaChamp Team

What are the possible results of compiling and running the following code?

```
public class Test extends Thread {
    int id;
    Test(int id) {
        this.id = id;
        start();
    }
    public static void main(String[] args) {

        Thread t = new Thread(new Test(2));
        t.start();
        System.out.print("main");
    }
    public void run() {
        System.out.print(id);
    }
}
```

Please choose all the answers that apply:

- main22
- 0main2
- main02
- 2main2
- compilation error for calling start twice

Check the answer of this question online on QuizOver.com:

Question: [thread in java](#)

Permalink: <http://www.quizover.com/pdf/thread-in-java>

4.1.29. What are the possible results of compiling and running the followin...

Author: JavaChamp Team

What are the possible results of compiling and running the following code?

```
public class Test {
    public static void main(String[] args) throws InterruptedException {
        Runnable t1 = new Runnable() {
            public void run() {
                try {
                    System.out.print("t1before");
                    Thread.sleep(100);
                    System.out.print("t1after");
                } catch (InterruptedException e) {
                }
            }
        };

        final Thread t2 = new Thread() {
            public void run() {
                try {
                    System.out.print("t2before");
                    wait();
                    System.out.print("t2after");
                } catch (InterruptedException e) {
                }
            }
        };

        t2.start();
        new Thread(t1).start();
    }
}
```

Please choose all the answers that apply:

- t1before may be part of th output
- t1after may be part of th output
- t2before may be part of th output
- t2after may be part of th output
- an IllegalMonitorStateException will be thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [using wait and sleep in threads in java](http://www.quizover.com/pdf/using-wait-and-sleep-in-threads-in-java)

Permalink: <http://www.quizover.com/pdf/using-wait-and-sleep-in-threads-in-java>

4.1.30. What is the possible results of compiling and running the following...

Author: JavaChamp Team

What is the possible results of compiling and running the following code?

```
public class Test {  
    static Runnable t1 = new Runnable() {  
        public void run() {  
            try {  
                System.out.print("t1before");  
                Thread.sleep(100);  
                System.out.print("t1after");  
            } catch (InterruptedException e) {  
            }  
        }  
    };  
  
    static Thread t2 = new Thread() {  
        public void run() {  
            try {  
                System.out.print("t2before");  
                synchronized (this) {  
                    wait();  
                }  
                System.out.print("t2after");  
            } catch (InterruptedException e) {  
            }  
        }  
    };  
  
    public static void main(String[] args) throws InterruptedException {  
        new Thread(t1).start();  
        t2.start();  
    }  
}
```

Please choose all the answers that apply:

- t1before may be part of the output
- t1after may be part of the output
- t2before may be part of the output
- t2after may be part of the output
- compilation fails
- IllegalMonitorStateException is thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [using sleep and wait in thread in java](http://www.quizover.com/pdf/using-sleep-and-wait-in-thread-in-java)

Permalink: <http://www.quizover.com/pdf/using-sleep-and-wait-in-thread-in-java>

4.1.31. The idea of this program is to allow two workers to build a wall (w...

Author: Yasser Ibrahim

The idea of this program is to allow two workers to build a wall (which consists of bricks and cement) , given the following code, what necessarily modifications are needed to build a wall by alternating between bricks and cement (brickcementbrickcement...) and to avoid as possible, one worker monopolizing the work alone ? (choose all what apply)

```
class Worker extends Thread {
    Contract contract;

    Worker(Contract contract) {
        this.contract = contract;
    }

    public void run() {
        contract.work();
    }
}

public class Contract {

    StringBuilder wall = new StringBuilder("brick");
    boolean isCementLastAdded = false;

    public void putBrick() {
        if (isCementLastAdded ;; !isWallDone()) {
            wall.append("brick");
            isCementLastAdded = false;
        }
    }

    public void putCementLayer() {
        if (!isCementLastAdded ;; !isWallDone()) {
            wall.append("cement");
            isCementLastAdded = true;
        }
    }

    public boolean isWallDone() {
        return wall.length() >= 100;
    }

    public void work() {
        while (!isWallDone()) {
            putCementLayer();
            putBrick();
        }
    }

    public static void main(String[] args) {
        Contract contract = new Contract();
        new Worker(contract).start();
        new Worker(contract).start();
    }
}
```

```
}
```

Please choose all the answers that apply:

- synchronize putBrick()
- synchronize putCementLayer()
- synchronize work()
- add Thread.sleep() after putBrick() in work() method
- synchronize isWallDone()

Check the answer of this question online on QuizOver.com:

Question: [synchronizing and mutlithreading in java](#)

Permalink: <http://www.quizover.com/pdf/synchronizing-and-mutlithreading-in-java>

4.1.32. What is the output of running the following program?

Author: Narendra

What is the output of running the following program?

```
class Tester extends Thread {
    int total;

    public static void main(String[] args) throws Exception {
        Tester t = new Tester();
        t.start();
        System.out.println("hi how are you:");
        synchronized (t) {
            System.out.println("waiting for t to complete");
            t.wait();
            System.out.println("total" + t.total);
        }
    }

    synchronized public void run() {
        for (int i = 0; i < 3; i++) {
            total = total + i;
        }
    }
}
```

Please choose only one answer:

- main thread will wait indefinitely.
- total 0 is part of the output.
- total 3 is part of the output .
- it depends upon which thread has got the cpu first .

Check the answer of this question online on QuizOver.com:

Question: [java thread wait notify usage](http://www.quizover.com/pdf/java-thread-wait-notify-usage)

Permalink: <http://www.quizover.com/pdf/java-thread-wait-notify-usage>

4.1.33. Synchronization issue

Author: Nikhil Kumar

Synchronization issue

```
class SyncDemo{
    public static void main(String... args){
        class A implements Runnable{
            public synchronized void run(){
                display();
            }
            synchronized void display(){
                for(int i=0;i<5;i++){
                    System.out.print("Hello");
                    try{
                        Thread.sleep(2000);
                    } catch (InterruptedException e){}
                    System.out.println(Thread.currentThread().getName());
                }
            }
        }
        A ob1=new A();
        A ob2=new A();
        Thread ob3=new Thread(ob1,"Saurabh");
        Thread ob4=new Thread(ob2,"Nikhil");
        ob3.start();
        ob4.start();
    }
}
```

Please choose only one answer:

- Compilation Fails
- Hello Saurabh Hello Nikhil Printed in Synchronized way
- Output is Unpredictable .

Check the answer of this question online on QuizOver.com:

Question: [how threads synchronization works in java nikhil kumar](http://www.quizover.com/pdf/how-threads-synchronization-works-in-java-nikhil-kumar)

Permalink: <http://www.quizover.com/pdf/how-threads-synchronization-works-in-java-nikhil-kumar>

4.1.34. Which three will compile and run without exception ?

Author: BELHAUSS Imad

Which three will compile and run without exception ?

Please choose all the answers that apply:

- `private synchronized object o;`
- `void go(){
 synchronized(){
 // code here
 }
}`
- `public synchronized void go(){
 //code here
}`
- `private synchronized (this) void go(){
 //code here
}`
- `void go(){
 synchronized(object.class){
 //code here
 }
}`
- `void go(){
 synchronized (o){
 //code here
 }
}`

Check the answer of this question online on QuizOver.com:

Question: [java synchronized method](http://www.quizover.com/pdf/java-synchronized-method)

Permalink: <http://www.quizover.com/pdf/java-synchronized-method>

4. Chapter: Enums

1. Enums Questions

4.1.1. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
enum Status {  
    Published(1), Rejected(2); // Line 2  
    int index; // Line 3  
    Status(int i) { index = i; }  
        int getIndex(){return index;} // Line 5  
}  
  
public class Tester {  
    public static void main(String [] args) {  
        System.out.println(Status.Published.index + Status.Rejected.index); // Line 10  
    }  
}
```

Please choose only one answer:

- Compilation error at line 2. Must be terminated by a colon ','
- Compilation error at line 3. index must be marked static
- Compilation error at line 5. must be marked public
- Compilation error at line 10, can't access index directly, must use getIndex() instead
- 3

Check the answer of this question online on QuizOver.com:

Question: [how to declare java enum?](http://www.quizover.com/pdf/how-to-declare-java-enum)

Permalink: <http://www.quizover.com/pdf/how-to-declare-java-enum>

4.1.2. enum can be declared and defined inside :

Author: Yasser Ibrahim

enum can be declared and defined inside :

Please choose all the answers that apply:

- Another enum
- A class
- An interface
- A method

Check the answer of this question online on QuizOver.com:

Question: [Where java enum can be defined?](http://www.quizover.com/pdf/where-java-enum-can-be-defined)

Permalink: <http://www.quizover.com/pdf/where-java-enum-can-be-defined>

4.1.3. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Test{  
  
    enum BookStatus {  
        PUBLISHED, DRAFT  
    }  
  
    public static void main(String[] args) {  
        BookStatus s1 = BookStatus.PUBLISHED;  
        BookStatus s2 = BookStatus.PUBLISHED;  
        System.out.print(s1 == BookStatus.PUBLISHED);  
        System.out.print(s1.equals(s2));  
    }  
}
```

Please choose only one answer:

- false>true
- true>true
- false>false
- compilation error, s1 and s2 are incorrectly instantiated

Check the answer of this question online on QuizOver.com:

Question: [comparing enums in java](http://www.quizover.com/pdf/comparing-enums-in-java)

Permalink: <http://www.quizover.com/pdf/comparing-enums-in-java>

4.1.4. Find correct import statement ?

Author: Naveen Yadav

Find correct import statement ?

```
package pkg;
public enum Signal{GET , SET, GO}

=====

class Import_Enum2
{
public static void main(String... arg)
{
for(Signal ele : Signal.values())
{
System.out.println(ele);
}
}
}
```

Please choose only one answer:

- import pkg.*;
- import pkg.Signal;
- import static pkg.Signal;
- static import pkg.Signal;

Check the answer of this question online on QuizOver.com:

Question: [java import statements](#)

Permalink: <http://www.quizover.com/pdf/java-import-statements>

4.1.5. Which of following import statement will allow to compile code corr...

Author: Naveen Yadav

Which of following import statement will allow to compile code correctly

```
package pkg;
public enum Signal{GET , SET, GO}

class Import_Enum2
{
public static void main(String... arg)
{
    System.out.println(SET);
}
}
```

Please choose all the answers that apply:

- import static pkg.Signal.*;
- import static pkg.Signal.SET;
- import pkg.Signal;
- import static pkg.Signal;
- static import pkg.Signal.SET;

Check the answer of this question online on QuizOver.com:

Question: [java static imports](#)

Permalink: <http://www.quizover.com/pdf/java-static-imports>

4.1.6. Which code, inserted at line 14, allows the Sprite class to compile?

Author: BELHAUSS Imad

Which code, inserted at line 14, allows the Sprite class to compile?

```
class Nav{  
    public enum Direction { NORTH, SOUTH, EAST, WEST }  
}  
public class Sprite{  
    // insert code here  
}
```

Please choose only one answer:

- Direction d = NORTH;
- Nav.Direction d = NORTH;
- Direction d = Direction.NORTH;
- Nav.Direction d = Nav.Direction.NORTH;

Check the answer of this question online on QuizOver.com:

Question: [java enum constructor](http://www.quizover.com/pdf/java-enum-constructor)

Permalink: <http://www.quizover.com/pdf/java-enum-constructor>

4.1.7. What is the result of running the following code? .

Author: Alinaloana Florea

What is the result of running the following code? .

```
public class Coffee
{
    CoffeeSize size; // line 1

    public static void main(String... arg) // line 2
    {
        enum CoffeeSize{ SMALL, NORMAL, BIG ; } // line 3

        Coffee drink = new Coffee();
        drink.size = CoffeeSize.BIG; // line 4

        System.out.println(drink.size); // line 5
    }
}
```

Please choose all the answers that apply:

- big
- compile-time error on line 1
- compile-time error on line 2
- compile-time error on line 3
- run-time error on line 4

Check the answer of this question online on QuizOver.com:

Question: [Alinaloana Florea enum and methods](#)

Permalink: <http://www.quizover.com/pdf/question-alinaioana-florea-enum-and-methods>

4.1.8. Will the following code compile? .

Author: Alinaloana Florea

Will the following code compile? .

```
static final enum AnimalSound
{
    WOOF, meow, BURBLE    // line 1
} // line 2

strictfp enum Animal
{
    DOG(AnimalSound.woof, 4), // line 3
    CAT(MEOW, 4), // line 4
    FISH(AnimalSound.BURLE) // line 5
    {
        public int getNrOfLegs()
        {
            return 1;
        }
    }; // line 6

    private AnimalSound sound;
    private int nrOfLegs;

    Animal(AnimalSound sound, int nrOfLegs)
    {
        this(sound);
        this.nrOfLegs = nrOfLegs;
    }

    Animal(AnimalSound sound)
    {
        this.sound = sound;
    }

    public AnimalSound getSound()
    {
        return sound;
    }

    public int getNrOfLegs()
    {
        return nrOfLegs;
    }
}; // line 7
```

Please choose all the answers that apply:

- No, there will be a compile-time error on line 2 because of the missing semicolon(;) and on line 6 because of the present semicolon
- There will be a compile-time error on line 3 and 5
- There will be a compile-time error on line 4
- There will be a run-time error on other lines
- AnimalSound, like any top class, can be marked with only the "public", "default" or "strictfp" modifiers

- An enum, e.g. Animal, can NOT be marked "strictfp"

Check the answer of this question online on QuizOver.com:

Question: [enum constant specific class body](http://www.quizover.com/pdf/enum-constant-specific-class-body)

Permalink: <http://www.quizover.com/pdf/enum-constant-specific-class-body>

4.1.9. What will the following code output? .

Author: Alinaloana Florea

What will the following code output? .

```
protected enum Animal { DOG, CAT, FISH } // line 1

public class TestEnumAnimal {
    Animal[] animals = Animal.values(); // line 2
    static Animal woofy = new Animal(); // line 3
    public static void main(String... arg) {
        System.out.println(woofy);
        for (Animal animal : animals) { // line 4
            System.out.println(animal);
        }
    }
}
```

Please choose all the answers that apply:

- DOG
DOG
cat
Fish
- Compilation error on line 1
- Compilation error on line 2
- Compilation error on line 3
- Compilation error on line 4

Check the answer of this question online on QuizOver.com:

Question: [Alinaloana Florea instantiating an enum, and using its values\(\) and access modifiers](#)

Permalink: <http://www.quizover.com/pdf/question-alinaioana-florea-instantiating-an-enum-and-using-its-values->

4.1.10. What's the output of the following code?

Author: Alinaloana Florea

What's the output of the following code?

```
enum Sounds
{
    HAM_HAM, CHIP_CHIP
}

interface PlaySounds
{
    void play();
}

enum AnimalSound extends Sounds implements PlaySounds
{
    WOOF("dog"), meow("CaT"),
    BURBLE("fish")
    {
        int nrOfLegs = 1;    // line 1
    };

    public static int nrOfLegs = 4;
    private String animal;

    public getAnimal()
    {
        return animal;
    }

    AnimalSound(String animal)
    {
        this.animal = animal;
    }

    void play(){}
}

public class Test
{
    public static void main(String[] args)
    {
        for(AnimalSound sound: AnimalSound.values())
        {
            System.out.println("A " + sound.animal + " makes " + sound + " and has " + AnimalSound.nrOfLegs + "
legs.");
        }
    }
}
```

Please choose all the answers that apply:

- The enum's constants are printed in the order in which they were declared:

A dog makes WOOF and has 4 legs.

A CaT makes meow and has 4 legs.

A fish makes BURBLE and has 4 legs.

- Compilation error: an enum can not extend any class, so remove "extends Sounds" from its declaration
- Compilation error: getAnimal() from AnimalSound is missing a String return type
- Compilation error: play() is NOT correctly implemented in AnimalSound as it has a more restrictive access level of "default", should be made "public"
- Compilation error: in main() you can NOT access sound.animal because "animal" is private in AnimalSound

Check the answer of this question online on QuizOver.com:

Question: [enum extends implements encapsulation](http://www.quizover.com/pdf/enum-extends-implements-encapsulation)

Permalink: <http://www.quizover.com/pdf/enum-extends-implements-encapsulation>

4. Chapter: Data Types

1. Data Types Questions

4.1.1. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
  
    static void test(float x) {  
        System.out.print("float");  
    }  
  
    static void test(double x) {  
        System.out.print("double");  
    }  
  
    public static void main(String[] args) {  
        test(99.9);  
    }  
}
```

Please choose only one answer:

- float
- double
- Compilation error
- Exception is thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [Primitive Data types in java](http://www.quizover.com/pdf/primitive-data-types-in-java)

Permalink: <http://www.quizover.com/pdf/primitive-data-types-in-java>

4.1.2. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
public class Tester {  
  
    static void test(float x) {  
        System.out.print("float");  
    }  
  
    static void test(double x) {  
        System.out.print("double");  
    }  
  
    public static void main(String[] args) {  
        test((float) 99.9);  
    }  
}
```

Please choose only one answer:

- float
- double
- Compilation error
- Exception is thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [float data type in java](http://www.quizover.com/pdf/float-data-type-in-java)

Permalink: <http://www.quizover.com/pdf/float-data-type-in-java>

4.1.3. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
public class Tester {  
  
    static void test(float x) {  
        System.out.print("float");  
    }  
  
    public static void main(String[] args) {  
        test(99.9);  
    }  
}
```

Please choose only one answer:

- float
- Compilation fails
- An Exception is thrown at run time

Check the answer of this question online on QuizOver.com:

Question: [Data types in java](#)

Permalink: <http://www.quizover.com/pdf/data-types-in-java>

4.1.4. which of the followings are correct when tried to compile and execu...

Author: Pankaj Gupta

which of the followings are correct when tried to compile and execute the below code ?

```
class s
{
public static void main(String agr[])
{
    short s1=4;    //LINE 1
    short s2 = s1+=s1; //LINE 2
    short s3= s1+s2; //LINE 3
    byte b1=(byte)s1 +(byte)s2; //LINE 4
    byte b2=(byte)((byte)s1 +(byte)(byte)s2); //LINE 5
}}
```

Please choose all the answers that apply:

- compile time error at LINE 1
- compile time error at LINE 2
- compile time error at LINE 3
- compile time error at LINE 4
- compile time error at LINE 5
- compiles successfully.

Check the answer of this question online on QuizOver.com:

Question: [java primitives byte short int long type casting](#)

Permalink: <http://www.quizover.com/pdf/java-primitives-byte-short-int-long-type-casting>

4.1.5. if byte b=50;

b=b*2;

Author: Shashikant Jaiswal

if byte b=50;

b=b*2;

Please choose only one answer:

- error ! can't assign an int to a byte
- b=100
- b=50

Check the answer of this question online on QuizOver.com:

Question: [java automatic type conversion](http://www.quizover.com/pdf/java-automatic-type-conversion)

Permalink: <http://www.quizover.com/pdf/java-automatic-type-conversion>

4.1.6. What is the correct output?

Author: MrDick

What is the correct output?

```
class Test {  
  
    public static void main(String[] args) {  
        float f = 1; // line 1  
        System.out.println(++f); // line 2  
    }  
}
```

Please choose only one answer:

- compilation error in line 1
- compilation error in line 2
- Runtime exception
- 1
- 2.0
- 1.0

Check the answer of this question online on QuizOver.com:

Question: [java int float widening](#)

Permalink: <http://www.quizover.com/pdf/java-int-float-widening>

4. Chapter: Static and init blocks

1. Static and init blocks Questions

4.1.1. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
class Bird {  
    static {  
        System.out.print("static1 ");  
    }  
  
    {  
        System.out.print("init3 ");  
    }  
  
    public Bird() {  
        System.out.print("Bird ");  
    }  
  
    static {  
        System.out.print("static2 ");  
    }  
}  
  
public class Falcon extends Bird {  
    Falcon(){  
        System.out.print("Falcon ");  
    }  
    public static void main(String[] args) {  
        System.out.print("main ");  
        new Falcon();  
    }  
}
```

Please choose only one answer:

- main static1 static2 init3 Bird Falcon
- main static1 static2 Falcon init3 Bird
- main static1 static2 Falcon Bird init3
- static1 static2 main init3 Bird Falcon
- static1 static2 main Bird init3 Falcon

Check the answer of this question online on QuizOver.com:

Question: [In what order static and init blocks get called in java?](http://www.quizover.com/pdf/in-what-order-static-and-init-blocks-get-called-in-java)

Permalink: <http://www.quizover.com/pdf/in-what-order-static-and-init-blocks-get-called-in-java>

4. Chapter: Serialization

1. Serialization Questions

4.1.1. What is the result of compiling and running the following code?

Author: JavaChamp Team

What is the result of compiling and running the following code?

```
import java.io.FileInputStream;
import java.io.FileOutputStream;
import java.io.ObjectInputStream;
import java.io.ObjectOutputStream;
import java.io.Serializable;

class Base {
    int code = 99;

    Base() {
        code = 77;
    }
}

public class Derived extends Base implements Serializable {

    public static void main(String[] args) {
        Derived derived1 = new Derived();
        derived1.code = 88;

        try {
            FileOutputStream fos = new FileOutputStream("data.txt");
            ObjectOutputStream os = new ObjectOutputStream(fos);
            os.writeObject(derived1);
            os.close();
            FileInputStream fis = new FileInputStream("data.txt");
            ObjectInputStream is = new ObjectInputStream(fis);
            Derived derived2 = (Derived) is.readObject();
            System.out.print(derived2.code);
            is.close();
        } catch (Exception x) {
        }
    }
}
```

Please choose only one answer:

- 0
- 77
- 88
- 99
- Compilation error

Check the answer of this question online on QuizOver.com:

Question: [How to combine inheritance and serialization in java?](http://www.quizover.com/pdf/how-to-combine-inheritance-and-serialization-in-java)

Permalink: <http://www.quizover.com/pdf/how-to-combine-inheritance-and-serialization-in-java>

4.1.2. Given the following two classes (Address and Account), what may hap...

Author: Yasser Ibrahim

Given the following two classes (Address and Account), what may happen if you attempt to serialize an instance of Account?

```
class Address{}  
class Account implements Serializable {Address address;}
```

Please choose only one answer:

- Compilation error
- Exception is thrown at run time
- Serialization will succeed correctly with no problems

Check the answer of this question online on QuizOver.com:

Question: [How to serialize java class?](http://www.quizover.com/pdf/how-to-serialize-java-class)

Permalink: <http://www.quizover.com/pdf/how-to-serialize-java-class>

4.1.3. Which of the following data members of a class cannot be serialized?

Author: JavaChamp Team

Which of the following data members of a class cannot be serialized?

Please choose all the answers that apply:

- private data members
- transient data members
- static data members
- final data members

Check the answer of this question online on QuizOver.com:

Question: [What variables cannot be serialized in java?](http://www.quizover.com/pdf/what-variables-cannot-be-serialized-in-java)

Permalink: <http://www.quizover.com/pdf/what-variables-cannot-be-serialized-in-java>

4.1.4. What is the result of compiling and running the following code?

Author: Yasser Ibrahim

What is the result of compiling and running the following code?

```
import java.io.FileInputStream;
import java.io.FileOutputStream;
import java.io.ObjectInputStream;
import java.io.ObjectOutputStream;
import java.io.Serializable;

public class Tester implements Serializable{

    transient int x = 5;

    public static void main(String[] args) {
        Tester tester1 = new Tester();
        try {
            ObjectOutputStream os = new ObjectOutputStream(
                new FileOutputStream("data.txt"));
            os.writeObject(tester1);
            os.close();
            System.out.print(++tester1.x + " ");
            ObjectInputStream is = new ObjectInputStream(new FileInputStream(
                "data.txt"));
            Tester tester2 = (Tester) is.readObject();
            is.close();
            System.out.println(tester2.x);
        } catch (Exception x) {
            System.out.println("Exception thrown");
        }
    }
}
```

Please choose only one answer:

- 5 5
- 6 5
- 6 0
- An exception is thrown

Check the answer of this question online on QuizOver.com:

Question: [What cannot be serialized in java?](http://www.quizover.com/pdf/what-cannot-be-serialized-in-java)

Permalink: <http://www.quizover.com/pdf/what-cannot-be-serialized-in-java>

4.1.5. Which of the following is the correct output:

Author: Juan Pablo

Which of the following is the correct output:

```
import java.io.*;

class Class {
    {System.out.print("a1-");}

    public Class() {
        System.out.print("a-");
    }

    static {System.out.print("s1-");}
}

class SubClass extends Class implements Serializable {

    {System.out.print("b1-");}

    public SubClass() {
        System.out.print("b-");
    }

    static {System.out.print("s2-");}
}

public class TestSerializable {

    public static void main(String[] args) {

        SubClass subClass = new SubClass();

        ObjectOutputStream oos = null;
        ObjectInputStream ois = null;
        try{
            oos = new ObjectOutputStream(new FileOutputStream("myFile"));
            oos.writeObject(subClass);
            ois = new ObjectInputStream( new FileInputStream ("myFile"));
            subClass = (SubClass) ois.readObject();
        }catch(Exception e){
            System.out.print("Todo mal!");
        }
    }
}
```

Please choose only one answer:

- s1-s2-a1-a-b1-b-a1-a-b1-b
- s1-s2-a1-a-b1-b-a1-a-
- s1-s2-a1-a-b1-b-
- Todo mal!
- ClassCastException is thrown

Check the answer of this question online on QuizOver.com:

Question: [serialization objects \(constructors and initialization blocks\)](#)

Permalink: <http://www.quizover.com/pdf/serialization-objects-constructors-and-initialization-blocks>