

## Java Exam 1 Review

Total Questions: 22

Most Correct Answers: #4

Least Correct Answers: #18

1. Java files are compiled into which file type?

- 2/15 ☐ A .java
- 0/15 ☐ B .txt
- 0/15 ☐ C .cls

12/15 ☒ D .class

2. Every Java class must have a main method.

- 0/15 ☐ A True
- 14/15 ☒ B False

3. Which of the following are true of Java?

14/15 ☒ A Statements end in a semicolon.

11/15 ☐ B Code blocks are defined by a pair of curly braces {}.

12/15 ☒ C The assignment operator is one equals sign =.

0/15 ☐ D The equals operator uses *three* equals signs ===

4. Variables must be declared with a type and a name as shown below:

```
int weight;
```

- 15/15 ☒ A True
- 0/15 ☐ B False

5. Which of the following are true?

0/15 ☐ A System.out.print and System.out.println do the same thing

0/15 ☐ B System.out.print inserts a new line.

13/15 ☒ C System.out.println inserts a new line.

14/15 ☒ D System.out.print keeps printing to the same line.

0/15 ☐ E None of these statements are true.

6. According to Chapter 2, things that an object "knows" about are called:

4/15 ☐ A Methods

0/15 ☐ B Class Definitions

3/15 ☐ C Objects

8/15 ☒ D Instance variables

0/15 ☐ E Knowables

7. According to Chapter 2, things that an object can do are called:

14/15 ☒ A Methods

0/15 ☐ B Class definition

0/15 ☐ C Objects

0/15 ☐ D Instance variables

0/15 ☐ E Doables

8. Assume the code snippet below is within a valid class and main method. Choose the answer that best describes the proper output.

```
int x = 6;
if ( x <= 5 ) {
    System.out.println("x is " + x);
} else {
    System.out.println("x is big");
}
```

- 2/15 ☐ A 6 is big
- 13/15 ☒ B x is big
- 0/15 ☐ C x is 6
- 0/15 ☐ D 6 is 6
- 0/15 ☐ E None of the above

9. Assume the code snippet below is within a valid class and main method. Choose the answer that best describes the proper output.

```
int x = 0;
while ( x <= 5 ) {
    if (x > 3) {
        System.out.print (x);
    }
    x = x + 1;
}
```

- 2/15 ☐ A 4
- 0/15 ☐ B 01234
- 8/15 ☒ C 45
- 2/15 ☐ D 012
- 3/15 ☐ E None of the above

10. The proper way to compare two String values, myString1 and myString2, is:

- 0/15 ☐ A myString1 === myString2
- 3/15 ☐ B myString1 == myString2
- 12/15 ☒ C myString1.equals(myString2)
- 0/15 ☐ D myString1.is(myString2)
- 0/15 ☐ E None of the above

11. A program written in Java is run on a standardized hypothetical computer called an transformer.

2/15 ☐ A True

13/15 ☒ B False

12. In this code snippet, what part is the object reference?

```
SuperHero speedy = new SuperHero();
```

1/15 ☐ A SuperHero

10/15 ☒ B speedy

3/15 ☐ C SuperHero()

1/15 ☐ D new SuperHero()

0/15 ☐ E None of the above

13. What are the two main types of variables in Java?

1/15 ☐ A doubles and primitives

1/15 ☐ B int and String

0/15 ☐ C doubles and floats

2/15 ☐ D primitives and complex variables

11/15 ☒ E primitives and object references

14. A class lives in the garbage collection heap.

3/15 ☐ A True

12/15 ☒ B False

15. Which of the following is the assignment operator in Java?

0/15 ☐ A :

0/15 ☐ B =>

1/15 ☐ C ==

14/15 ☒ D =

0/15 ☐ E None of the above

16. Given the following instance variable, which is the correct method to access the variable?

```
private int age;
```

0/15 ☐ A public String getAge() {

```
}
```

0/15 ☐ B private String getAge() {  
return age;  
}

11/15 ☒ C public int getAge() {  
return age;  
}

1/15 ☐ D public getAge() {  
return age;  
}

2/15 ☐ E private int getAge() {  
return age;  
}

17. Which of the following snippets is the proper way to call a method named **bark** that accepts 2 parameters, a **String** and an **int**? Assume that you have an object reference named **doggie**.

4/15 ☐ A doggie.bark(String barkSound, int numberOfBarks);

0/15 ☐ B doggie.bark(String "woof", int 5);

0/15 ☐ C doggie.bark(15, "woof");

2/15 ☐ D doggie.bark(String, int);

9/15 ☒ E doggie.bark("woof", 4);

18. Which of the following are true?

3/15 ☐ A Instance variables are declared in methods

2/15 ☒ B Instance variables get a default value

6/15 ☐ C Local variables get a default value

10/15 ☒ D Local variables must be initialized before use

19. Which of the following is the proper way to determine the size of a dogs array that has been define like this:  
`Dog[] dogs = new Dog[7];`

0/15 ☐ A dogs.setSize.length()

4/15 ☐ B dogs.size

0/15 ☐ C dogs.getCount()

11/15 ☒ D dogs.length

20. Which of the following is the proper way to create an array of 3 Book objects?

- 14/15 ☒ A `Book[] books = new Book[3];`  
`books[0] = new Book();`  
`books[1] = new Book();`  
`books[2] = new Book();`
- 0/15 ☐ B `Book[] books = new Book(3);`  
`books(0) = new Book();`  
`books(1) = new Book();`  
`books(2) = new Book();`
- 0/15 ☐ C `Book[] books = new Book[3];`  
`books[1]= new Book();`  
`books[2] = new Book();`  
`books[3] = new Book();`
- 0/15 ☐ D `BookArray books = new BookArray{new Book, new Book, new Book};`

21. Which of the following are true about encapsulation?

- 0/15 ☐ A Getters and setters are marked private.
- 15/15 ☒ B Encapsulation is also known as data hiding.
- 9/15 ☒ C Getters and setters provide access to instance variables.
- 1/15 ☐ D Only occurs in procedural programming languages.
- 10/15 ☒ E Instance variables are marked private.

22. Which of the following will produce a result of 3.5?

`int x = 14;`

`int y = 4;`

- 9/15 ☒ A `double z = (double) x / y;`
- 3/15 ☐ B `double z = x / y;`
- 3/15 ☒ C `double z = x / (double) y;`
- 2/15 ☐ D `int z = (double) x / y;`
- 0/15 ☐ E None of the above