

1. Which of the following Java operators can be used with boolean variables? (Choose all that apply)

A. ==

B. +

C. --

D. !

E. %

F. <=

Answer: A,D

2. What data type (or types) will allow the following code snippet to compile? (Choose all that apply)

```
byte x = 5;
```

```
byte y = 10;
```

```
_____ z = x + y;
```

A. int

B. long

C. boolean

D. double

E. short

F. byte

Answer: A,B,D

3. What is the output of the following application?

```
1: public class CompareValues {
```

```
2: public static void main(String[] args) {
```

```
3: int x = 0;
```

```
4: while(x++ < 10) {}
```

```
5: String message = x > 10 ? "Greater than" : false;
```

```
6: System.out.println(message+" "+x);
```

```
7: }
```

```
8: }
```

A. Greater than,10

- B. false,10
- C. Greater than,11
- D. false,11
- E. The code will not compile because of line 4.
- F. The code will not compile because of line 5.

Answer: F

4. What change would allow the following code snippet to compile? (Choose all that apply)

3: long x = 10;

4: int y = 2 \* x;

- A. No change; it compiles as is.
- B. Cast x on line 4 to int.
- C. Change the data type of x on line 3 to short.
- D. Cast 2 \* x on line 4 to int.
- E. Change the data type of y on line 4 to short.
- F. Change the data type of y on line 4 to long.

Answer: B,C,D,E

5. What is the output of the following code snippet?

3: java.util.List<Integer> list = new java.util.ArrayList<Integer>();

4: list.add(10);

5: list.add(14);

6: for(int x : list) {

7: System.out.print(x + " , ");

8: break;

9: }

- A. 10, 14,
- B. 10, 14
- C. 10,
- D. The code will not compile because of line 7.
- E. The code will not compile because of line 8.

F. The code contains an infinite loop and does not terminate.

Answer: C