

**Please read the question carefully and choose the correct option!**

1. The following are keywords found in Java, except..  
  - a. Goto
  - b. Break
  - c. If
  - d. String
  
2. A method that can be executed automatically when an object of a class is created is known as..  
  - a. Constructor
  - b. Initializer
  - c. Garbage Collector
  - d. Inheritance
  
3. The term to protect data from attempts to modify, destroy and duplicate data by unauthorized parties is..  
  - a. Inheritance
  - b. Polymorphisme
  - c. Constructor
  - d. Encapsulation
  
4. The java syntax for compiling program files is  
  - a. Java
  - b. Javac
  - c. Javaclass
  - d. Javax
  
5. Class B inherits from Class A, what cannot be said:  
  - a. B is a sub-class of A
  - b. A is a super-class of B
  - c. B has access to private members of A
  - d. B has access to protected members of A
  
6. The following are primitive data types:  
  - a. Boolean
  - b. Character
  - c. Byte
  - d. Double

Menurut saya ini semua bukan tipe data primitif, karena seharusnya tipe data primitifnya itu boolean, char, byte, double
  
7. The keyword used to make the value fixed and immutable is...  
  - a. Protected
  - b. Private
  - c. Public
  - d. Final

8. The method used to convert all letters in a string to uppercase / capital is

- a. UpperCase()
- b. toUpperCase()
- c. toUpperCase()
- d. isUpperCase()

9. Select the valid statement.

- a. `char[] ch = new char(5)`
- b. `char[] ch = new char[5]`
- c. `char[] ch = new char()`
- d. `char[] ch = new char[]`

10. `compareTo()` returns

- a. true
- b. false
- c. an int value
- d. none

11. What is the return value if `a=7` and `b=3`?

```
static int function(int a, int b) { int c = a++ - b; int d =  
    a + ++b; return (d % c);  
}
```

- a. 0
- b. 1
- c. 2
- d. 3

12. What is the result value at the end of execution?

```
int inp[] = new int[] {5, 4, 6, 7, 3, 6}; int result  
= 0; try { for (int i = 1; i <= inp.length; i++) {  
    result += inp[i]; }  
    } catch (Exception exception) { }
```

- a. 25
- b. 26
- c. Runtime error
- d. Compile error

13. There is something wrong with the code. How to fix it?

```
public class Test6 { public String var = "
    world"; public static void main(String
    args[]) {
        System.out.println("Hello" + var);
    }
}
```

- a. System.out.println("Hello" + Test6.var);
- b. System.out.println("Hello" + this.var);
- c. public static String var = " world";
- d. public final String var = " world";

14. What is the output of the function if n=6?

```
static int myFunc(int n) {
    if (n == 0) { return
    0;
    } else if (n == 1) {
        return 1;
    } else if (n > 1) {
        return myFunc(n-1) + myFunc(n-2);
    } else { return -1;
    }
}
```

- a. 5
- b. 6
- c. 8
- d. -1

15. What is the value of d? String a = "KLMN";  
String b = " AB CDEFGHIJ ";  
String c = b.trim().substring(3, 7);  
String d = c.concat(a);

- a. CDEKLMN
- b. DEFGHIJKLMN
- c. CDEFKLMN
- d. DEFGKLMN

Please create a query to answer questions number 16 – 19 based on the table below:

nik	nama	alamat	kota	provinsi	pulau	total_pembelian_2017	total_pembelian_2018	point	tgl_regis
3276001	Ahmad	Jl. Telaga No 3	Bandar Lampung	Lampung	Sumatra	984.000,00	430.000,00	7070	14-Nov-17
3276002	Saiful Ahmad	Jl. Cendrawasih	Batam	Kepulauan Riau	Batam	265.000,00	684.000,00	4745	12-Apr-17
3276003	Lina	Jl. Mawar	Makassar	Sulawesi Selatan	Sulawesi	902.000,00	883.000,00	8925	22-Sep-17
3276004	Erni	Jl. Cut Nyak Dien	Pontianak	Kalimantan Barat	Kalimantan	384.000,00	377.000,00	3805	30-Oct-16
3276005	Anto	Jl. Kamboja	Jakarta Barat	DKI Jakarta	Jawa	561.000,00	293.000,00	4270	20-Apr-17
3276007	Maya	Jl. Anoa	Batam	Kepulauan Riau	Batam	679.000,00	746.000,00	7125	9-Aug-16
3276008	Hadi	Jl. Hiu	Jakarta Barat	DKI Jakarta	Jawa	239.000,00	987.000,00	6130	8-Apr-16

16. Sort customer data based on the highest point to the lowest point
17. Show all data with customer names containing the word Ahmad
18. Show for the NIK and Name of the Customer who made the 3rd most total purchases in the last 2 years
19. Show total customer purchases outside Java throughout 2017
20. Show all data with NIK, NAMA, ALAMAT, and TOTAL\_MARGIN. The rule for TOTAL\_MARGIN is if the difference between total\_pembelian\_2017 and total\_pembelian\_2018 is a surplus, then display 'Profit' otherwise, display 'Defisit'
21. Show all data with NIK, NAMA, and ALAMAT LENGKAP. The rule for ALAMAT LENGKAP is as follows: 'alamat, Kota, Provinsi - Pulau'. Also, sort by newest TGL\_REGIS

(ibarat datanya ada di table konsumen)

16. `SELECT * FROM konsumen ORDER BY point DESC`
17. `SELECT * FROM konsumen WHERE nama LIKE '%ahmad%'`
18. `SELECT nama, nik FROM konsumen  
GROUP BY nik, nama  
ORDER BY SUM(total_pembelian_2017 + total_pembelian_2018) DESC  
LIMIT 1 OFFSET 2`
19. `SELECT SUM(total_pembelian_2017) FROM konsumen WHERE pulau NOT LIKE 'Jawa'`
20. `SELECT nik, nama, alamat,  
CASE  
WHEN total_pembelian_2017 - total_pembelian_2018 >= 0 THEN 'Laba'  
ELSE 'Defisit'  
END AS TOTAL_MARGIN  
FROM konsumen`
21. `SELECT nik, nama, CONCAT(alamat, ', ', kota, ', ', provinsi, ' - ', pulau)  
AS ALAMAT LENGKAP  
FROM konsumen  
ORDER BY tgl_regis DESC`