**JAVA ARRAYS[ ] MCQ QUESTIONS 1**

**1. Which of the following declares an array of integers in Java?**

A) int[] array;

B) array[] int;

C) int array[];

D) both a and c

**2. What is the default value of an integer array element in Java?**

A) 0

B) 1

C) -1

D) null

**3.** **In Java, arrays are objects:**

A) True

B) False

C) Maybe

D) Both a and b

**4. Which of the following is the correct way to declare and initialize an array in Java?**

A) int[] array = new int[5];

B) int array = new int[5];

C) int array[5];

D) None of the above.

**5. What is the maximum index value of an array with 10 elements?**

A) 9

B) 10

C) 11

D) 10.0

**6. Which of the following methods returns the length of an array in Java?**

A) length()

B) size()

C) length

D) size

**7. Which keyword is used to access the elements of an array in Java?**

A) access

B) get

C) retrieve

D) None of the above.

**8. Arrays in Java can store:**

A) Only primitive data types

B) Only objects

C) Both primitive data types and objects

D) None of the above.

**9. What does the following code do?**

*int[] numbers = {1, 2, 3, 4, 5};*

A) Declares an array of integers and initializes it with values 1, 2, 3, 4, . and 5.

B) Declares an array of integers and initializes it with 5 elements.

C) Declares a list of integers and initializes it with values 1, 2, 3, 4, and . 5.

D) None of the above.

**10. What is the correct way to access the third element of an array named arr[] in Java?**

A) arr[3]

B) arr[2]

C) arr(3)

D) arr.third()

**11. What does the following code snippet do?**

*int[] numbers = {1, 2, 3, 4, 5};*

*System.out.println(numbers[5]);*

A) Prints 5

B) Prints 0

C) Throws an ArrayIndexOutOfBoundsException

D) Throws a NullPointerException

**12. Which method is used to sort an array in Java?**

A) sortArray()

B) Arrays.sort()

C) array.sort()

D) None of the above.

**13. What is the output of the following code?**

*int[] arr = {3, 1, 2};*

*Arrays.sort(arr); //sorts the array*

*System.out.println(arr[0]);*

A) 1

B) 2

C) 3

D) Compilation Error

**14. Which of the following statements is true about array length in Java?**

A) Array length cannot be changed once initialized.

B) Array length can be changed after initialization.

C) Array length is automatically adjusted based on the number of elements added.

D) None of the above.

**15. How do you initialize an array in Java with a predefined set of values?**

A) By using the `init` keyword.

B) By using the `set` keyword.

C) By using the curly braces `{}` with comma-separated values.

D) None of the above.

**16. Which of the following statements is correct about the following code?**

*int[] arr = new int[3];*

A) It initializes an array of size 3 with default values.

B) It declares an array of size 3 without initialization.

C) It initializes an array of size 0 with default values.

D) None of the above.

**17. What does the `length` property of an array in Java return?**

A) The number of elements in the array.

B) The size of the array.

C) The capacity of the array.

D) None of the above.

**18. Which of the following is used to retrieve the last element of an array in Java?**

A) arr[length - 1]

B) arr[length]

C) arr[last]

D) None of the above.

**19. What is the time complexity of accessing an element in an array in Java?**

A) O(1)

B) O(log n)

C) O(n)

D) O(n^2)

**20. What happens if you try to access an index that is out of bounds in Java?**

A) It returns 0.

B) It returns null.

C) It throws an ArrayIndexOutOfBoundsException.

D) It throws a NullPointerException.