

Java String and Array class methods

Java provides a lot of methods from String and Array classes, and both inherit several methods from the Object class. We're going to discuss five methods from each class I repeatedly used. I start from the String class, the first one is ***public int length()*** method returns the length of the string. We can use this method when accessing the last character of a given string by subtracting one from the string length. The second one is ***public String toUpperCase()*** method converts string characters to uppercase and returns the value. We can use this method when we store the first name in DB, some business use case says we have to store it as upper case letters. The third one is ***public boolean equalsIgnoreCase(String str2)*** method that compares two string values, it isn't case sensitive, and returns true if both have the same value; false otherwise. We can use this method when comparing if person one and person two have the same last name. The fourth one is ***public String concat(String str2)*** method concatenates two string values and returns a new concatenated string value. We can use this method when assigning first name and last name as a single value. The fifth one is ***public String replace(char oldCharacter, char newCharacter)*** method replaces a string single character of every occurrence with a new character and returns a new string value. All the above method's access modifier is public which means they are accessible from anywhere.

Methods from Array class, the first one is ***public static int getLength(Object array)*** takes an array as a parameter and returns the length of the array. We can use this method when accessing the last element of a given array by subtracting one from the array length. The next methods are ***public static int getInt(Object array, int index)*** and ***public static char getChar(Object array, int index)*** both take an array and array index as a parameter and return the integer and character value of the element at the specified index respectively. We can use those methods when accessing the integer and character value of the array element respectively. The methods are ***public static void setInt(Object array, int index, int value)*** and ***public static void setChar(Object array, int index, char value)*** both take an array, array index, and value as a parameter and set the new integer and character value respectively at the specified index of the array. We can use those methods to change the array element value at a specific location with a given value. If the above methods have static access modifiers, which means they are class-level methods and accessible without instantiation of an array object. Those methods may throw `ArrayIndexOutOfBoundsException`, `IllegalArgumentException`, or `NullPointerException`. Favorite thing to learn this week is ***java.lang.reflect.Array*** class.

Reference:

<https://docs.oracle.com/en/java/javase/17/docs/api/java.base/java/lang/String.html>

https://www.w3schools.com/java/java_ref_string.asp

https://www.tutorialspoint.com/java/java_strings.htm

<https://www.geeksforgeeks.org/reflection-array-class-in-java/>

<https://docs.oracle.com/en/java/javase/17/docs/api/java.base/java/lang/reflect/Array.html>