

The **String** Class

The String class represents character strings. All string literals in Java programs, such as "abc", are implemented as instances of this class. **Strings are immutable**; their values cannot be changed after they are created.

Constructor:

`String(String original)`

Initializes a newly created String object so that it represents the same sequence of characters as the argument; in other words, the newly created string is a copy of the argument string.

Selected Methods:

E.g., <code>String s = "Carnegie";</code>

`char charAt(int index)`

Returns the character at the specified index.

E.g., `s.charAt(1)` returns 'a'.

`int indexOf(char c)`

`int indexOf(String text)`

Returns the index of the first occurrence of the specified character or text in this string.

Returns -1 if there is no such occurrence.

E.g., `s.indexOf('e')` returns 4.

`int length()`

Returns the length of this string.

E.g., `s.length()` returns 8.

`String replace(char oldChar, char newChar)`

Returns a new string resulting from replacing all occurrences of `oldChar` in this string with `newChar`.

E.g., `s.replace('e', '$')` returns "Carn\$gi\$".

`String substring(int beginIndex)`

Returns a new substring of this string from `beginIndex` to the end of this string.

E.g., `s.substring(5)` returns "gie".

`String substring(int beginIndex, int endIndex)`

Returns a new substring of this string from `beginIndex` up to but not including `endIndex`.

E.g., `s.substring(0,5)` returns "Carne".

`String toLowerCase()`

Returns a new string that is a copy of this String converted to lower case.

E.g., `s.toLowerCase()` returns "carnegie".

`String toUpperCase()`

Returns a new string that is a copy of this String converted to upper case.

E.g., `s.toUpperCase()` returns "CARNEGIE".