public class StringProcessor {

// Method to reverse the string

public static String reverseString(String str) {

StringBuilder reversed = new StringBuilder(str);

return reversed.reverse().toString();

}

// Method to count occurrences of a substring in a given text

public static int countOccurrences(String text, String sub) {

int count = 0;

int index = 0;

while ((index = text.indexOf(sub, index)) != -1) {

count++;

index += sub.length();

}

return count;

}

// Method to split the string by spaces and capitalize each word

public static String splitAndCapitalize(String str) {

String[] words = str.split(" ");

StringBuilder result = new StringBuilder();

for (String word : words) {

if (!word.isEmpty()) {

result.append(word.substring(0, 1).toUpperCase()) // Capitalize first letter

.append(word.substring(1).toLowerCase()) // Make the rest lowercase

.append(" ");

}

}

return result.toString().trim(); // Remove trailing space

}

public static void main(String[] args) {

String str = "hello world, welcome to string handling!";

// Test reverseString method

String reversed = reverseString(str);

System.out.println("Reversed String: " + reversed);

// Test countOccurrences method

String sub = "string";

int occurrences = countOccurrences(str, sub);

System.out.println("Occurrences of '" + sub + "': " + occurrences);

// Test splitAndCapitalize method

String capitalized = splitAndCapitalize(str);

System.out.println("Capitalized String: " + capitalized);

}

}