

## I. Basic Case Conversion (Lower to Upper and Vice-Versa)

### Test 1: Simple Lowercase to Uppercase:

Input: "αβγδεζηθικλμνξοπρστυφχψω"

Expected Output (Uppercase): "ΑΒΓΔΕΖΗΘΙΚΛΜΝΞΟΠΡΣΤΥΦΧΨΩ"

Purpose: Check the basic lowercase to uppercase conversion for all letters.

ChangeCase

Output: ΑΒΓΔΕΖΗΘΙΚΛΜΝΞΟΠΡΣΤΥΦΧΨΩ (language Greek activated)

### Test 2: Simple Uppercase to Lowercase:

Input: "ΑΒΓΔΕΖΗΘΙΚΛΜΝΞΟΠΡΣΤΥΦΧΨΩ"

Expected Output (Lowercase): "αβγδεζηθικλμνξοπρστυφχψω"

Purpose: Check the basic uppercase to lowercase conversion for all letters.

ChangeCase

Output: αβγδεζηθικλμνξοπρστυφχψω (language Greek activated)

### Test 3: Mixed Case:

Input: "ΑβΓΔΕΖΗθΙκΛμΝξΟπΡσΤυΦχΨω"

Expected Output (Uppercase): "ΑΒΓΔΕΖΗΘΙΚΛΜΝΞΟΠΡΣΤΥΦΧΨΩ"

Expected Output (Lowercase): "αβγδεζηθικλμνξοπρστυφχψω"

Purpose: Test mixed input to both all caps and all lowercase.

ChangeCase

Output(Uppercase): ΑΒΓΔΕΖΗΘΙΚΛΜΝΞΟΠΡΣΤΥΦΧΨΩ (language Greek activated)

Output(lowercase): αβγδεζηθικλμνξοπρστυφχψω (language Greek activated)

## II. Sigma Handling (Final vs. Non-Final)

Test 4: Non-Final Sigma to Uppercase (Simple Word):

Input: "συνάδελφος"

Expected Output (Uppercase): "ΣΥΝΑΔΕΛΦΟΣ"

Purpose: Check the 'σ' to 'Σ' conversion in a word with no final sigma.

ChangeCase

Output: ΣΥΝΑΔΕΛΦΟΣ (language Greek activated)

Test 5: Final Sigma to Uppercase in multi-word string:

Input: "Ένας καλός κόσμος είναι εδώ"

Expected Output (Uppercase): "ΕΝΑΣ ΚΑΛΟΣ ΚΟΣΜΟΣ ΕΙΝΑΙ ΕΔΩ"

Purpose: Test sigma conversion when it is at the end of a word inside a string of words.

ChangeCase

Output: ΕΝΑΣ ΚΑΛΟΣ ΚΟΣΜΟΣ ΕΙΝΑΙ ΕΔΩ (language Greek activated)

Test 6: Final Sigma to Lowercase:

Input: "ΣΑΣ"

Expected Output (Lowercase): "σας"

Purpose: Test that uppercase sigma converts back to lowercase final sigma if in the last letter of the word.

ChangeCase

Output: σας (language Greek activated)

Test 7: Multiple Sigmas in a Word (Mixed Cases):

Input: "Συσσωματώσεις"

Expected Output (Uppercase): "ΣΥΣΣΩΜΑΤΩΣΕΙΣ"

Expected Output (Lowercase): "συσσωματώσεις"

Purpose: Verify handling of multiple sigmas, in particular in lowercase.

ChangeCase

Output(Uppercase): ΣΥΣΣΩΜΑΤΩΣΕΙΣ (language Greek activated)

Output(lowercase): συσσωματώσεις (language Greek activated)

Test 8: Final Sigma Before a Punctuation:

Input: "Ο καιρός ήταν καλός."

Expected Output (Uppercase): "Ο ΚΑΙΡΟΣ ΗΤΑΝ ΚΑΛΟΣ."

Purpose: Check that a final sigma will properly change in uppercase even if it is followed by a punctuation

ChangeCase

Output: Ο ΚΑΙΡΟΣ ΗΤΑΝ ΚΑΛΟΣ. (language Greek activated)

Test 9: Final Sigma Before/After a Punctuation:

Input: "Ο ΚΑΙΡΟΣ ΗΤΑΝ ΚΑΛΟΣ."

Expected Output (Lowercase): "Ο καιρός ήταν καλός."

Purpose: Check that a final sigma will properly change in uppercase even if it is followed by a punctuation

Updated Tests (with Corrections)

ChangeCase

Output: ο καιρος ηταν καλος. (language Greek activated)

III. Accents Handling (Correct - No Changes)

Test 10: Lowercase Accented Vowels to Uppercase (All Accents):

Input: "άέήϊούώ"

Expected Output (Uppercase): "ΑΕΗΙΟΥΩ"

Purpose: Verify accents are removed on uppercase conversion of fully-lowercase text.

ChangeCase

Output: ΑΕΗΙΟΥΩ (language Greek activated)

Test 11: Uppercase to Lowercase with Accents:

Input: "ΑΕΗΙΟΥΩ"

Expected Output (Lowercase): "αεηιουω"

Purpose: Verify accents are NOT added back when converting to lowercase.

ChangeCase

Output: αεηιουω (language Greek activated)

Test 12: Title Case with Accented First Letter:

Input: "Άλφα"

Expected Output (Title Case - First Letter Uppercase): "Άλφα"

Purpose: Check that title case does not strip out the accent.

ChangeCase

Output: Άλφα (language Greek activated)

Test 13: Title case when accented letter is not first:

Input: "πολύ"

Expected Output (Title case): "Πολύ"

Purpose: Check that title case does not add accents in subsequent letters.

ChangeCase

Output: Πολύ (language Greek activated)

Test 14: Title case when uppercase letter is not the first:

Input: "Άλφα"

Expected Output (Title Case): "Άλφα"

Purpose: Check that title case preserves accent if it exists in uppercase and the first letter of the word.

ChangeCase

Output: Άλφα (language Greek activated)

Test 15: Accented word in sentence:

Input: "Αυτό είναι το σωστό"

Expected Output (Title case): "Αυτό Είναι Το Σωστό"

Purpose: Test that title case properly handles accented first letters when multiple words are present.

ChangeCase

Output: Αυτό Είναι Το Σωστό (language Greek activated)

Test 16: Title case with no accents:

Input: "αλφα"

Expected Output (Title Case): "Άλφα"

Purpose: Test that title case does add an accent if it's the standard form of that uppercase letter.

ChangeCase

Output: Αλφα (language Greek activated)

#### IV. Dieresis Handling (Revised Again!)

##### Test 17: Lowercase Dieresis:

Input: "ü"

Expected Output (Uppercase): "ÿ"

Purpose: Verify dieresis is preserved on uppercase conversion.

ChangeCase

Output: ÿ (language Greek activated)

##### Test 18: Accented Dieresis:

Input: "ÿ"

Expected Output (Uppercase): "ÿ"

Purpose: Verify dieresis is preserved and accents are removed on uppercase conversion.

ChangeCase

Output: ÿ (language Greek activated)

##### Test 19: Uppercase to Lowercase Accented Dieresis:

Input: "ÿ"

Expected Output (Lowercase with accents and dieresis): "ÿ"

Purpose: Verify proper conversion and re-introduction of dieresis and accents after going through uppercase

ChangeCase

Output: ÿÿ (language Greek activated)

## V. Combined Cases, Accents, and Dieresis (Revised)

Test 20: Complex Mixed Input:

Input: "άβγδεζηθικλμνξόπρστυφχψώϊϋϗ"

Expected Output (Uppercase): "ΑΒΓΔΕΖΗΘΙΚΛΜΝΞΟΠΡΣΤΥΦΧΨΩΪϚϗ"

Expected Output (Lowercase): "αβγδέζηθικλμνξόπρστυφχψωϊϣϘ"

Purpose: Test all rules in a single, complex input.

ChangeCase

Output(Uppercase): ΑΒΓΔΕΖΗΘΙΚΛΜΝΞΟΠΡΣΤΥΦΧΨΩΪϚϗ (language Greek activated)

Output(lowercase): αβγδέζηθικλμνξόπρστυφχψωϊϣϘ (language Greek activated)

Test 21: A sentence with all edge cases included:

Input: "Ο καλλιτέχνης έδωσε το έργο με στυλ ίου."

Expected Output (Uppercase): "Ο ΚΑΛΛΙΤΕΧΝΗΣ ΕΔΩΣΕ ΤΟ ΕΡΓΟ ΜΕ ΣΤΥΛ ΪΟΥ."

Expected Output (Title Case): "Ο Καλλιτέχνης Έδωσε Το Έργο Με Στυλ Ϊου."

Purpose: A real-world sentence that covers most of the cases we are testing.



ChangeCase

Output(Uppercase): Ο ΚΑΛΛΙΤΕΧΝΗΣ ΕΔΩΣΕ ΤΟ ΕΡΓΟ ΜΕ ΣΤΥΛ ΪΟΥ.  
(language Greek activated)

Output(lowercase): ο καλλιτέχνης έδωσε το έργο με στυλ ιού. (language  
Greek activated)