**Algorithm Checking if A Word is a Palindrome**

**Step 1**: Define a method checkPalindrome that takes a string word as input and returns a boolean indicating whether the word is a palindrome.

**Step 2:** Convert the input string word into a character array.

**Step 3:** Initialize two pointers, left and right, pointing to the first and last characters of the array respectively.

**Step 4:** Iterate through the array from both ends (i.e., left and right), comparing characters at each position.

**Step 5:** If the characters at the left and right pointers are not equal, return false, indicating that the word is not a palindrome.

**Step 6:** Move the left pointer to the right and the right pointer to the left.

**Step 7:** Repeat steps 4-6 until the pointers meet or cross each other.

**Step 8:** If all characters have been compared and found to be equal, return true, indicating that the word is a palindrome.