



Writing Unit Tests Lab (CodeGrade)

 [. \(https://github.com/learn-co-curriculum/js-tdd-writing-unit-tests-lab\)](https://github.com/learn-co-curriculum/js-tdd-writing-unit-tests-lab)  [. \(https://github.com/learn-co-curriculum/js-tdd-writing-unit-tests-lab/issues/new\)](https://github.com/learn-co-curriculum/js-tdd-writing-unit-tests-lab/issues/new)

Learning Goals

- Follow a test-driven development process for writing code
- Write a unit test using Jest


Introduction

Time for some practice! In this lab, you'll write your own unit test and get it to pass by following a test-driven development workflow.

As before, we'll use Jest as our test framework. We'll be writing the tests in the `src/__tests__/utils.test.js` file and the application code in the `src/utils.js` file.

Fork and clone this lesson, then run `npm install` to install the dependencies.

Instructions

Our word game needs another feature. We'll give users double the amount of points if their word is a [palindrome](https://en.wikipedia.org/wiki/Palindrome)  [\(https://en.wikipedia.org/wiki/Palindrome\)](https://en.wikipedia.org/wiki/Palindrome): a word that reads the same forwards and backwards, like "mom" or "racecar".


You should implement a function `isPalindrome` by following test-driven development that accepts a string as an argument and returns `true` if the string is a palindrome, and `false` if it isn't.


Try testing some known use-cases first: `isPalindrome("racecar")` should return `true` and `isPalindrome("car")` should return `false`.


Follow the same workflow we did in the previous lesson:

1. Understand the feature we're building
2. Translate the feature into a test specification
3. Write and implement code that passes the test
4. Clean up and refactor
5. Repeat!

Then, consider adding tests for some of these edge cases:

- Should return true for words that are a combination of uppercase and lowercase letters
- Should return false for an empty string
- **Bonus** Should throw an error if input has any non-alphabetic characters (hint: look into the [.toThrow Jest matcher](#)  (<https://jestjs.io/docs/expect#tothrowerror>)). You can check if a word has only alphabetic characters with this regular expression code:

```
 /^[A-Za-z]+$/.test(word)
```
- **Bonus** Should throw an error if input that isn't a string (hint: look into the [.toThrow Jest matcher](#)  (<https://jestjs.io/docs/expect#tothrowerror>)).

Since you'll be *writing* the tests, this lesson doesn't have any tests for you to run to check your implementation. You can see both the completed tests and the working solution in the [solution branch](#)  (<https://github.com/learn-co-curriculum/react-hooks-tdd-writing-unit-tests-lab/tree/solution/src>) of this repository.

Resources

- [Jest](#)  (<https://jestjs.io/>)

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