# Lemonade

## Coding Challenge Instructions | Lemonade Engineering

This coding task is meant to give us a better sense of your problem solving and coding skills. Please make sure to write down whatever assumptions you take when you write the code.

### **Challenge Description**

You are required to write a web API with 2 endpoints:

- 1. A 'word counter' endpoint
  - Receives a text input and counts the number of appearances for each word in the input.
  - The endpoint should not return data (but you may return success status, etc).
  - The endpoint should be able to accept the input in 3 ways:
    - A simple string sent in the request.
    - A file path for a file in the server's filesystem (the contents will be used as input).
    - A URL (the data returned from the URL will be used as input).
  - The input may be very large (up to tens of gigabytes).
  - The results (the number of appearances of each word) should be persisted, to be used by the 'word statistics' service.
- 2. A 'word statistics' endpoint
  - Receives a word and returns the number of times the word appeared so far (in all previous inputs).

## Examples

Word counter endpoint

**Input**: "Hi! My name is (what?), my name is (who?), my name is Slim Shady" **Output**: (empty)

Word statistics endpoint

Input: "my" Output: 3 | Input: "what" Output: 1 | Input: "hello" Output: 0

#### Notes

- You are welcome to use your favorite programming language
- Feel free to add any extra functionality you wish.
- You are welcome to approach me for any questions you might have.

#### Good luck!