

Valid Parentheses (LeetCode Question #20)

Difficulty: Easy

Topics: Stack, String Manipulation

Problem Statement:

Given a string `s` containing just the characters '(', ')', '{', '}', '[' and ']', determine if the input string is valid.

An input string is valid if:

1. Open brackets must be closed by the same type of brackets.
2. Open brackets must be closed in the correct order.
3. Every close bracket has a corresponding open bracket of the same type.

Examples:

Example 1:

Input: s = "()"

Output: true

Example 2:

Input: s = "()[]{}"

Output: true

Example 3:

Input: s = "("

Output: false

Example 4:

Input: s = "([])"

Output: true

Constraints:

- `s` consists only of '(', ')', '{', '}', '[' and ']' characters.
- $1 \leq s.length \leq 10^4$

Hint:

Use a stack to help ensure brackets close in the correct order and type.