

# Problem 2224: Minimum Number of Operations to Convert Time

## Problem Information

**Difficulty:** Easy

**Acceptance Rate:** 66.07%

**Paid Only:** No

**Tags:** String, Greedy

## Problem Description

You are given two strings `current` and `correct` representing two \*\*24-hour times\*\*.

24-hour times are formatted as `HH:MM`, where `HH` is between `00` and `23`, and `MM` is between `00` and `59`. The earliest 24-hour time is `00:00`, and the latest is `23:59`.

In one operation you can increase the time `current` by `1`, `5`, `15`, or `60` minutes. You can perform this operation \*\*any\*\* number of times.

Return \_the\*\*minimum number of operations\*\* needed to convert \_`current` \_to\_`correct`.

**Example 1:**

**Input:** current = "02:30", correct = "04:35" **Output:** 3 **Explanation:** We can convert current to correct in 3 operations as follows: - Add 60 minutes to current. current becomes "03:30". - Add 60 minutes to current. current becomes "04:30". - Add 5 minutes to current. current becomes "04:35". It can be proven that it is not possible to convert current to correct in fewer than 3 operations.

**Example 2:**

**Input:** current = "11:00", correct = "11:01" **Output:** 1 **Explanation:** We only have to add one minute to current, so the minimum number of operations needed is 1.

**Constraints:**

\* `current` and `correct` are in the format `"HH:MM"` \* `current <= correct`

## Code Snippets

### C++:

```
class Solution {  
public:  
    int convertTime(string current, string correct) {  
  
    }  
};
```

### Java:

```
class Solution {  
    public int convertTime(String current, String correct) {  
  
    }  
}
```

### Python3:

```
class Solution:  
    def convertTime(self, current: str, correct: str) -> int:
```