

10 Triathlon timing

4 points

Introduction

A triathlon is a multidisciplinary race that combines three different sports: swimming, cycling, and running. Although the three disciplines are practiced one after the other, the classificatory system tracks the time of each of them individually. At the end of the race, the three registered times are added up to determine the final time.

Given the three registered times for swimming, cycling and running, compute the final race time in the appropriate format (XXhYYmZZs). The triathlon will not last longer than 72 hours.

Input

The three registered times for swimming, cycling and running of triathlon are provided following the time format XXhYYmZZs.

Output

The final race time of triathlon in format XXhYYmZZs.

Example

Input

00h28m43s

01h02m31s

00h37m17s

Output

02h08m31s