

Question 1

A parking garage charges a RM3.00 minimum fee to park for up to three hours. The garage charges an additional RM1.00 per hour for each hour or part thereof in excess of three hours and minutes will round up accordingly.

The maximum charge for any given 24 hour period is RM20.00.
Assume that no car parks for longer than 24 hours at a time.

Write a program that calculates and displays the parking charges for customer who parked in the garage.

Input the number of hour(s) and minute(s) parked for customer. The program should calculate the charge for the customer and display total amount as "RM XX.XX".

Use a method called `calculateCharges(int hours, int minutes)` to determine the charge for each customer.

Example

Case 1 :

Input : 2 hours 45 minutes

Expected Result : RM 3.00

Case 2 :

Input : 4 hours 10 minutes

Expected Result : RM 5.00

Case 3 :

Input : 24 hours 0 minutes

Expected Result : RM 20.00

Question 2

If we list all the natural numbers below 10 that are multiples of 3 or 5, we get 3, 5, 6 and 9. The sum of these multiples is 23.

Create a function to calculate sum of all the multiples of 3 or 5 below 1000.

Use a method called `calculateSum(int loopCount)`

Question 3

Write a function that combines multiple lists by alternatingly taking elements.

Assume that all the string list "string[]" will always have a same length.

Use a method called `combineList(List<string[]> items)`

Example

```
Case 1 :  
Input: string[] strList1 = { "A", "B", "C" };  
       string[] strList2 = { "1", "2", "3" };  
       List<string[]> ListCombine = new List<string[]>();  
       ListCombine.Add(strList1);  
       ListCombine.Add(strList2);
```

Expected Result : `[a,1,b,2,c,3]`.