

Name \_\_\_\_\_ Student ID \_\_\_\_\_

**Problem 1 : Win Rate Calculation (2 Points)**

Write a program to calculate the winrate with this given formula.

$$winrate_i = \frac{wins_i}{(wins_i + losses_i)}$$

**Example 1**

1. Create your own input1.txt and type the below data  
(Or you can [click here](#) to download this data)

Chelsea,7,18  
Arsenal,20,8  
Liverpool,20,13  
Crystal Palace,9,19  
Norwich,27,4  
Manchester United,6,19

2. Presumably, these are the data of 6 football teams.  
7,18 refers to the team number 1 wins 7 times or games and loses 18 times.

3. Write a program that can calculate the result as shown below.

```
Enter a file name: input1.txt
Total team(s): 6
Chelsea: got win rate 0.28000
Arsenal: got win rate 0.71429
Liverpool: got win rate 0.60606
Crystal Palace: got win rate 0.32143
Norwich: got win rate 0.87097
Manchester United: got win rate 0.24000
=====
Norwich got maximum win rate 0.87097
Manchester United: got minimum win rate 0.24000
```

**Example 2**

1. Create your own input2.txt and type the below data  
(Or you can [click here](#) to download this data)

Leicester,7,18  
Sheff Utd,20,8  
West Ham,20,13  
Tottenham,9,19  
Wolve,27,4  
Burnley FC,6,19  
Man.city,22,10  
Aston Villa,19,9

2. Presumably, these are the data of 8 football teams.  
7,18 refers to the team number 1 wins 7 times or games and loses 18 times.

3. Write a program that can calculate the result as shown below.

```
Enter a file name: input2.txt
Total team(s): 8
Leicester: got win rate 0.28000
Sheff Utd: got win rate 0.71429
West Ham: got win rate 0.60606
Tottenham: got win rate 0.32143
Wolve: got win rate 0.87097
Burnley FC: got win rate 0.24000
Man.city: got win rate 0.68750
Aston Villa: got win rate 0.67857
=====
Wolve got maximum win rate 0.87097
Burnley FC got minimum win rate 0.24000
```

**Crte a menu (3 Points)**

Code Hint:

```
numbers = [1, 3, 4, 2]
# Sorting list of Integers in ascending (น้อยไปมาก)
numbers.sort()
=====
numbers = [1, 3, 4, 2]

# Sorting list of Integers in descending (มากไปน้อย)
numbers.sort(reverse = True)
```

What do you want to know ? (m)in , ma(x) , (o)rder max to min, o(r)der min to max, (q)uit : m

Manchester United: got minimum win rate 0.24000

What do you want to know ? (m)in , ma(x) , (o)rder max to min, o(r)der min to max, (q)uit : x

Norwich got maximum win rate 0.87097

What do you want to know ? (m)in , ma(x) , (o)rder max to min, o(r)der min to max, (q)uit : o

```
Total team(s): 6
Norwich: got win rate 0.87097
Arsenal: got win rate 0.71429
Liverpool: got win rate 0.60606
Crystal Palace: got win rate 0.32143
Chelsea: got win rate 0.28000
Manchester United: got win rate 0.24000
```

What do you want to know ? (m)in , ma(x) , (o)rder max to min, o(r)der min to max, (q)uit : q  
Bye