

SI100B Python Programming Quiz 1

- **English-only Rule:** In this quiz, you may only answer the questions in English. Answers in other languages (e.g. Chinese) will result in **0 points for the corresponding question**;
- Before you start, **please fill your CHINESE name and your ShanghaiTech email** in the box at the top of every page;
- Please **fill your answers in the table at the end of each section**. Answers written in other places will not be graded.

True or False

Please decide whether the statements in the following questions are correct. If correct, fill in **T** in the following table. If wrong, fill in **F**.

1. Python is more human-friendly than assembly language;
2. C/C++ programs are usually more efficient than Python programs for same tasks when executing;
3. The Python programming language is started in 1989 by John von Neumann as a hobby project;
4. Your Python program will be stored in the main memory (内存) so that it will not be lost after reboot in most modern computer.

Fill your answers to questions in this section in the table below.

Question 1	Question 2	Question 3	Question 4

Multiple Choices

Attention:

Each of the follow questions has **only one correct answer**.

Question 5

Which of the following expression is invalid in the Python programming language?

- A. `x = 123/2.0`
- B. `y = (123,)`
- C. `z = 123 + j`
- D. `x = int ('123')`

Question 6

Wang Dachui wrote the following program to compare two integers. The program is expected to terminate when either `x` or `y` is not an integer. There are some errors in the Dachui's code. Please count how many errors occur in total (one kind of error may occur many times, please count them all).

```
x = input()
y = input()
if (x > y)
print(x)
elif (x == y)
print('Equal', x)
else
print(y)
```

- A. 3
- B. 5
- C. 8
- D. 11

Question 7

Evaluate the output of the following code

```
thisstr="coding makes fun"
thislist=thisstr.split()
thislist[-2]='#'
print(thislist)
```

- A. ['c', 'o', 'd', 'i', 'n', 'g', ' ', 'm', 'a', 'k', 'e', 's', ' ', '#', 'u', 'n']
- B. ['c', 'o', 'd', 'i', 'n', 'g', ' ', 'm', 'a', 'k', 'e', 's', ' ', 'f', '#', 'n']
- C. ['coding', 'makes', 'f#n']
- D. ['fun', 'makes', 'cod#ng']
- E. ['#', 'makes', 'fun']
- F. ['coding', '#', 'fun']

Attention:

The following questions **may have one or more correct answers**. Only when all the correct answers are selected, you get the points.

Question 8

Which of the followings is/are keywords in Python 3?

- A. `exit`
- B. `if`
- C. `int`
- D. `not`
- E. `print`
- F. `return`

Question 9

Wang Dachui is a Python beginner. He wrote the following 4 programs but some of them are incorrect in the sense of syntax. Please find all the **incorrect** programs for Dachui.

A.

```
i = int(input())
if i > 0:
    print("i is postive!")
elif i < 0:
    print("i is negative!")
```

B.

```
my_list = [1, 2, 3, 4]
i = int(input())
if i not in my_list:
    print("i is not in the list!")
```

C.

```
my_list = [1, 2, 3, 4]
i = int(input())
if not i in my_list:
    print("i is not in the list!")
```

D.

```
i = int(input())
if i > 0:
    print("i is postive!")
else if i < 0:
    print("i is negative!")
```

Fill your answers to questions in this section in the table below.

Question 5	Question 6	Question 7	Question 8	Question 9

Blank Fillings

Question 10

Wang Dachui does his groceries every Friday and he always uses python to help himself with the grocery list.

```
fruit = ["Apple", "Banana", "Guava"]
vegetable = ["Broccoli", "Cucumber", "Tomato"]
meat = ["Beef", "Lamb", "Pork"]

groceryList1 = [fruit, vegetable, meat]
groceryList2 = fruit + vegetable + meat
```

Later on Dachui decided to do some changes to his list:

```
meat.append("Ham")
fruit.pop()
vegetable.pop(1)
meat.remove("Pork")
fruit.reverse()
```

How does `groceryList1` and `groceryList2` look after the changes? Fill in the following table for what `print(groceryList1)` and `print(groceryList2)` will output to your terminal.

<code>print(groceryList1)</code>	<code>print(groceryList2)</code>

End of the Quiz

