

# 臺北醫學大學 104 學年度碩士班暨碩士在職專班招生入學考試

計算機概論試題

本試題第 1 頁；共 2 頁

(如有缺頁或毀損，應立即請監試人員補發)

- |      |  |
|------|--|
| 注意事項 | 一、本試題共二大題，共計 100 分。<br>二、請將最適當的答案依題號作答於答案用卷上。<br>三、試題答錯者不倒扣。 |
|------|--|

## 一、問答題 (共 80 分)

- 物件導向程式的特性包含抽象(abstraction)、繼承(inherit)、多型(polymorphism)等，試分別說明其意義。(15%)
- 試簡要描述網路標準的 OSI 模型(Open System Interconnection Reference Model)。(15%)
- Suppose that a TOY memory location holds the value 00AD. What is the corresponding value in decimal? (5%)
- How many values do the following for loop print? Recall that a Java int is a 32-bit two's complement integer. Which is the correct answer? (5%)

```
for (int i = 1; i >= 0; i = i + i) {  
    StdOut.println(i);  
}
```

0   1   30   31   32    $2^{30} - 1$     $2^{31} - 1$     $2^{32} - 1$    infinite loop

- Give the type and value of each of the following Java expressions. If it leads to a compile-time or runtime-error, specify that for the type (and leave the value column blank). (14%)

| Java expression                | Type | Value |
|--------------------------------|------|-------|
| $1 + 2.0 * 3 + 4.0$            |      |       |
| $(-1/-1)/0$                    |      |       |
| $(-1.0 / -1.0) / 0.0$          |      |       |
| <code>Math.sqrt(-2.0)</code>   |      |       |
| $1 + "+" + 2.0 + "3"$          |      |       |
| <code>(double) (10 / 4)</code> |      |       |
| $(1.0 <= 2.0 <= 3.0)$          |      |       |

- Please answer the questions:

| P_ID | LastName | FirstName | Address     | City      |
|------|----------|-----------|-------------|-----------|
| 1    | Lee      | Lucy      | Wushing 10  | Taipei    |
| 2    | Chen     | Michael   | Keelung 24  | Taipei    |
| 3    | Wang     | Jason     | Datung 20   | Kaohsuang |
| 4    | Chang    | Henry     | Chungsan 18 | Kaohsuang |
| 5    | Wu       | Jay       | -           | -         |

- Please write down the result after the following: (5%)

```
UPDATE Persons  
SET Address='Nissestien 67', City='Taipei'  
WHERE LastName='Wu' AND FirstName='Jay'
```

- What will be the result if we remove the code after WHERE? (5%)

```
UPDATE Persons  
SET Address='Nissestien 67', City='Taipei'
```

7. Consider the program shown below. What will be the return of the following? (6%)

```
#include <stdio.h>
int main() {
int a = 10, b = 5, c = 1, d = 7;
if (!a > 10 && b < 6) {
if (c < 4 || d > 8)
printf("A");
else
printf("B");
}
else
printf("C");
return 0;
}
```

8. What is data mining? How would you apply statistical methods in general and rule discovery? What sensitive rule or data may occur in process? (10%)

## 二、選擇題 (每題 5 分，共 20 分)

1. 雲端運算(Cloud Computing)技術未來可應用到許多服務需求上，請問下列何者不是正確的描述？

- Ⓐ 雲端運算是一種概念，代表的是利用網路使電腦能夠彼此合作或使服務更無遠弗屆
- Ⓑ 雲端運算不包括軟體即服務(software as a service)
- Ⓒ 雲端運算類似分散式運算(Distributed Computing)
- Ⓓ Google 的行事曆分享是一種雲端運算的應用

2. 下列何者不是作業系統提供的基本功能？

- Ⓐ Main Memory Management
- Ⓑ Compiler
- Ⓒ File Management
- Ⓓ Process Management

3. 一部專門用來過濾網路間通訊的電腦稱為？

- Ⓐ 中繼站
- Ⓑ 路由器
- Ⓒ 過濾器
- Ⓓ 防火牆

4. 在全球資訊網中，瀏覽器與網站間傳送訊息所使用的通訊協定是？

- Ⓐ HTML
- Ⓑ URL
- Ⓒ HTTP
- Ⓓ ASP