

CS2103/T Mock Exam (Model Answers)

! **You are strongly encouraged to attempt this exam via Exemplify** at least once before looking at these model answers. The password for the exam is **Hello123**.

Note that this is a *mock exam* containing a small number of questions, for you to get used to the exam software. A **separate full-sized practice exam** will be given at least one week before the exam.

This file is provided to you for convenience, because Exemplify exam performance report (that you can access via <https://examsoft.com>) does not show images or give answers for short-answer questions.

○ [m1] requirements: NFR 

- ? Consider the following requirements for a Learning Management System such as Canvas:
- Which one is **most** likely to be a *functional requirement* (as opposed to a *non-functional requirement*)? _____
- Propose a potential non-functional requirement that is related to the answer you chose: _____

A1:

- ☐ The software should be able to support concurrent access by up to 1000 students at a time.
- ☐ The software must be usable using all popular Web browsers.
- ☒ The software must allow students to upload files.
- ☐ The software must keep all uploaded files secure from unauthorized access.
- ☐ The software must be open-source.

A2: Uploading a file smaller than 100MB should take no more than 60 seconds.

☐ [m2] UML: CD to OD

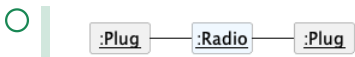
? Consider this class diagram:



Which object diagram does **not** match the given class diagram? _____

Why doesn't it match?: _____

A1:



A2: One Plug object cannot have more than one Radio objects

☐ [m3] code quality: coding standard compliance

? **[Select all that apply]** Which lines in the following code have coding standard violations (as per the coding standard used in the module)?

You may ignore any violations related to code comments or spacing around operators.

```
1 public void read_lines() {  
2     int FILE_SIZE = 0;  
3     for (int i = 0; i < 10; i++) {  
4         read("reading " + FILE_SIZE); // read  
5     }  
6 }
```

☒ 1

☒ 2

☐ 3

☐ 4

☐ 5

☐ 6

i Examiner note: 1: method name is not in camelCase; 2: should be camelCase not SCREAMING_SNAKE case; 3: magic number is a code quality problem but not a coding standard violation; 4: redundant comment is a code quality problem but not a coding standard violation