

Independent University, Bangladesh
CSE213, Autumn 2021, Section-2, Quiz-2

Duration: 40 minutes. Total marks: 10

- 1) Write the title of your project first, and then draw a class diagram on a paper by hand to fulfill the following within the context of your project:

Your class-diagram **MUST** have the following:

- a. There must be at least 1 abstract class
 - i. With some meaningful abstract methods
 - ii. In addition, the abstract class must have at least one non-abstract method
- b. There must be at least 2 non-abstract “user” sub classes
 - i. With at least 1 additional field
 - ii. With at least 1 additional method
 - iii. Also, show ALL overridden method
- c. There must be at least 2 “Non-user” classes (abstract and/or non-abstract)
- d. There must be aggregation where
 - i. at least one of the classes (abstract/non-abstract) must have an object-handle of another class as its field (this another pre-existing class may be your own class or a library class)
- e. There must be composition where
 - i. at least one of the classes (abstract/non-abstract) must have an object-handle of another class as its field (this another pre-existing class may be your own class or a library class)
- f. There must be at least 1 association in your diagram

NOTE: class/interface and their fields and methods MUST have meaningful and logically acceptable names. To get marks, they MUST make sense in terms of “is-a” / “has-a” relationship. Also, the association should show meaningful usage and multiplicity