

《软件系统分析与设计》期末考试试题 (样卷)

(考试形式：开卷 考试时间：2 小时)



《中山大学授予学士学位工作细则》第六条

考试作弊不授予学士学位

方向：_____ 姓名：_____ 学号：_____

出卷：_____ 审核：_____

注意：答案一定要写在答卷中，写在本试题卷中不给分。本试卷要和答卷一起交回。

一、单选题 (60 marks, 3 marks each)

1. How many statements are true?

(1) The UML is the de facto *standard diagramming notation* for drawing or presenting software model. 不确定 P8

(2) In Design Class Diagram(DCD), a association line between classes may has an association name. F P182 关联线表示的属性，不需要关联名称

(3) UML property-string denote characteristic of UML Attributes of UML Class. 不确定 P188 特性是表示元素特征的已命名的值

A 0, B 1, C 2, D 3

2. How many statements are true?

(1) The precondition of buy drink for a vending machine(售货机) is "OK" displayed. F 找不到证据

(2) *Software engineering* is the application of a systematic, disciplined, quantifiable approach to develop software. T 定义

(3) In DCD, use a navigability arrow(导航箭头) to indicate that a Register object has an attribute of one Sale object. T p182 导航箭头由源对象指向目标对象，表示register的一个属性是sale对象

A 0, B 1, C 2, D 3

3. How many statements are true?

(1) Finding conceptual classes with noun phrase identification is a useful technique. T 通过识别名词短语寻找概念类

(2) XP "story card" practice is acceptable for catching requirements in UP. T test 0里面有解释

(3) In GoF Composite pattern, the whole object and its part objects have the same interface. T P328 定义组合和原子对象的类，使它们实现相同的接口

A 0, B 1, C 2, D 3

4. How many statements are true?

(1) Arrow line indicates the relation of a user use use cases in UML Use Case Diagram. F 用例图里面不需要箭头

(2) Informally, a use case is a specific sequence of actions and interactions between actors and the system. F 场景是参与者和系统之间的一系列特定的活动和交互
用例是一组相关的成功和失败场景集合

(3) "condition: actions ..." structure can be used to describe a Use case Main Success Scenario. **F** 主成功场景是无条件的成功场景 P50

A 0, B 1, C 2, D 3

5. How many statements are true?

(1) The requirements and object-oriented analysis focused on learning to **do the thing right**. **F** do the right thing P143

(2) In software design, Aggregation over Composition **F** 组合优于聚合 P191

(3) Spend significant time doing class diagrams than UML interactive diagrams. **F** 应该把时间花费在交互图上，而不仅是类图上 P159

A 0, B 1, C 2, D 3

6. How many statements are true?

(1) It is more than "a few" weeks long for most projects in Inception. **F** P39

(2) A "/" symbol before the attribute name is wrong in domain model. **F** 见test 0

(3) In Agile modeling, a suitable iteration length is two to six weeks time_box. **T**

A 0, B 1, C 2, D 3

7. How many statements are true?

(1) To implement a singleton class, we prefer eager initialization. **F** 实现单实例，一般用lazy initialization P322

(2) During **OOA**, there is an emphasis on finding and describing the objects or conception in the problem domain. **T** 在OOA中，强调的是在问题领域内发现和描述对象（或概念） P5

(3) "Find Product Help" with underline in a use case text means emphasis. **F** 见test 0

A 0, B 1, C 2, D 3

8. How many statements are true?

(1) Use Case name must start with a verb. **T** 用例名称以动词开始 P50

(2) In Agile Principles, our **highest priority** is early and continuously delivers valuable software to customer. **T** 见test 0

(3) A domain model can show UI elements and database in a business project. **F** 软件制品如窗口或数据库，不适用于领域模型 P101

A 0, B 1, C 2, D 3

9. How many statements are true?

(1) In elaboration, we do not need deliver a runnable product to user for testing. **F** 大多数需求分析是在细化阶段进行的，并且伴以具有产品品质的早期编程和测试 P37

(2) "+doSomething(b:B)" of class A means that the class A dependent on the class B. **T** 但我找不到出处

(3) In the UP, requirements are categorized according to the FURPS+ model. **T** 在统一过程中，需要按照"FURPS+"模型进行分类 P42

A 0, B 1, C 2, D 3

10. How many statements are true?

(1) In Design Class Diagram(DCD), attributes are usually assumed **private** if no visibility is given. **T** 如果没有给出可见性，则通常假设属性为私有。 P182

(2) SSD should involving other external systems. In general, the external system place at the **left** of the ":system". **F** 应该是放在右边 P129和P297对比来看

(3) The sequence of software development in UP should be: 1) define the requirements; 2) design the architecture; 3) implement. **F** P39

A 0, B 1, C 2, D 3

二、分析设计题 (40 marks, 10 marks each)

Read the following material carefully, and then do the tasks.(请用中文作答)

材料大致如 lab2

Task1: Describe the steps to find use cases.

Task2: Drawing a Use Case Diagram according to the material.