

Online Exams

Sri Lanka Institute of Information Technology

The system has three classes, Student, WeekendStudent and WeekdayStudent. WeekendStudent class and WeekdayStudent are child classes of the Student class. Select the correct UML notation for Student class.

Select one:

a. **Student**
id : int
+ setId (id : int) : void
+ getId() : int

b. **Student**
id : int
+ setId (id : int) : void
+ getId() : int

c. **Student**
int : id
+ setId (int : id) : void
+ getId() : int

d. **Student**
int : id
+ setId (int : id) : void
+ getId() : int

Next page

Online Exams

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Q2
1 answered
Marked out of
1.00
Flag question
C++ Inheritance relationship is

Select one:

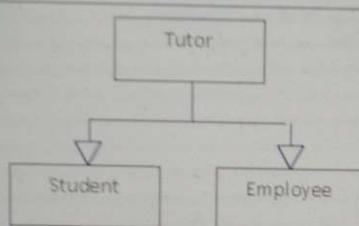
- a. Association
- b. Is-A
- c. Has-A
- d. None

Question 44

Not yet answered

Marked out of
1.00

 Flag question



What is correct about the above diagram ?

Select one:

- a. Tutor is the super class of Student and Employee.
- b. Student and Employee classes are derived from Tutor.
- c. Student and Employee classes have common properties.
- d. Tutor is a Student as well as an Employee.

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A library management system has a Member class to handle members of the library and a Book class to handle books. Which is the most correct relationship for Member class and Book class in library management system.

Select one:

- a. Association
- b. Inheritance
- c. Dependency
- d. Composition



5
covered
of
question

Aggregation is

Select one:

- a. Expressing a part of a relationship and is stronger form of an association relationship.
- b. Expressing a part of a relationship and is weaker form of an association relationship.
- c. Expressing a "is-a relationship" and is stronger form of an association relationship.
- d. Expressing a "is-a relationship" and is weaker form of an association relationship.

Next page

Question 37

Not yet answered
Marked out of
1.00

Flag question

Consider following statements.

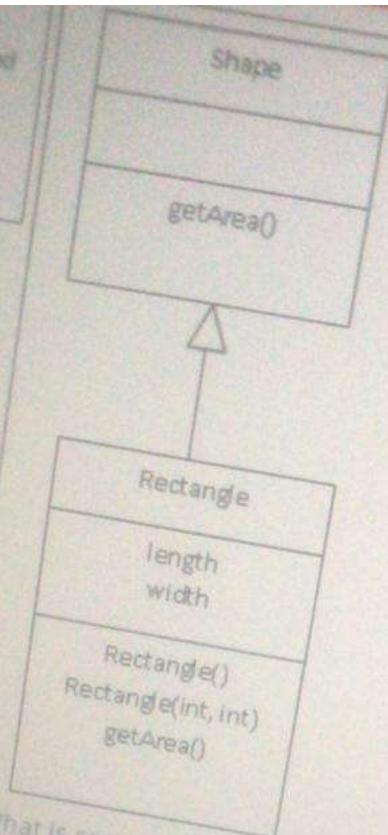
- A) Virtual functions support dynamic polymorphism
- B) Virtual functions must be non-static member function of the class
- C) Constructor Functions cannot be virtual

Select one:

- a. Only A is incorrect.
- b. A and B are correct.
- c. A, B and C are correct.
- d. B and C are incorrect.

Next page

Not yet answered
Marked out of
1.00
Flag question



What is correct about "Shape" class ?

Select one:

- a. It's an Abstract class
- b. It's a Derived class
- c. It's a Concrete class
- d. It's an Association class

Moodle

← → × C | ① | □

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Question 63
Not yet answered
Marked out of 1.00
 Flag question

What is the correct C++ statement to define the "Lecturer" class according to the relationship shown below?

Person Lecturer

Select one:

a. class Lecturer extends Person {
 b. class Lecturer : public Person {
 c. class Lecturer : Person {
 d. class Person : public Lecturer {

Next

Online Exams

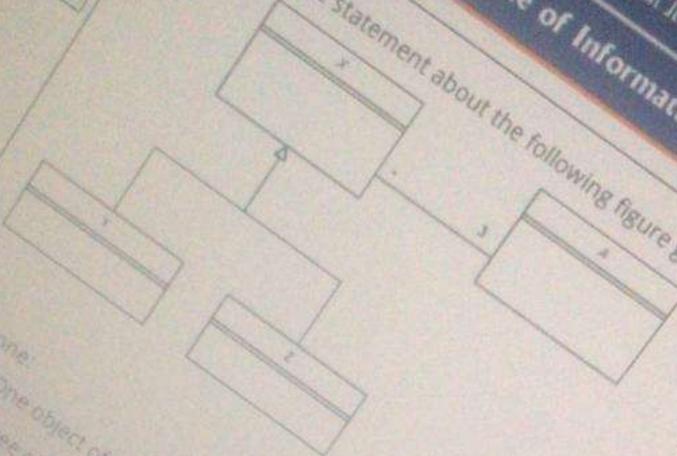
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Question 47

Not yet answered
Marked out of
1.00

Flag question

Select the false statement about the following figure given below.



Select one:

- a. One object of Z must be associated with exactly with 3 objects of A.
- b. Three objects of A are associated with multiple objects of X.
- c. There are no direct instances of X.
- d. One objects of A must be associated with multiple objects of Z.

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What is the main reason to have relationships between classes?

Select one:

- a. To use the functionality of one class into other
- b. To enhance the communication between classes
- c. To increase code re-usability
- d. all of the mentioned

Question 36
5 questions answered
1 question left
Time spent: 00:00:00

Google Classroom



When does a destructor called?

Select one:

- a. After the end of object life
- b. Anytime in between object's lifespan
- c. At end of whole program
- d. Just before the end of object life
- e. At end of class scope



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What will be the output of the following PHP code?

```
<?php  
function track() {  
    $count = 0;  
    $count++;  
    echo $count;  
}  
track(1);  
track();  
track(3);  
?>
```

Select one:

- a. 103
- b. 13
- c. 111
- d. 13
- e. 000

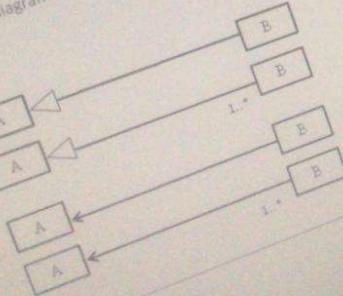
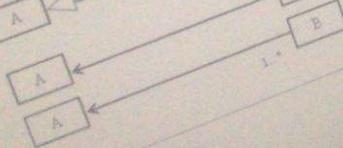
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Select the correct diagram to show the relationship of class A and class B, where all properties of class A are inherited to class B.

Question 33
Not yet answered
Marked out of 1.00
Flag question

Select one:

- a. 
- b. 
- c. 

1.00

Flag question

```
private:  
    int id;  
    int age;  
public:  
    void setDetails(int a, int i);  
    int getAge();  
    int getID();  
};
```

Select one:

<p>Patient</p> <p>- id : int - age : int + setDetails (a : int, i : int) : void + getAge() : int + getID() : int</p>	<p>a.</p> <p>Patient</p> <p>- int id - int age + setDetails (int a, int i) : void + getAge() : int + getID() : int</p>	<p>b.</p> <p>Patient</p> <p>- id : int - age : int + void setDetails (a : int, i : int) + int getAge() + int getID()</p>
--	--	--

<p>Patient</p> <p>int id int age void setDetails (int a, int i) int getAge() int getID()</p>
--

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SLIIT

Question 39
Not yet answered
Marked out of
1.00
Flag question

which of the following cannot be overloaded in C++?

Select one:

- a. Increment operator
- b. Constructor
- c. Destructor
- d. New and delete operator

SLIIT

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on 27
t answered
d out of
g question

Select the **incorrect** statement for class A, class B and class C given below.

```
graph LR; A[A] --> B[B]; B --> C[C]
```

Select one:

- a. Specialization takes place from class B to class A.
- b. Generalization takes place from class C to class B.
- c. Specialization takes place from class A to class C.
- d. Generalization takes place from class B to class A.

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The way a relationship is built in Association is,

Question 37
Not yet answered
Marked out of
1.00
Flag question

Select one:

- a. Through constructor
- b. Through the objects of classes
- c. Through destructor
- d. Through class Names

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Which statement is TRUE about Composition relationship?

Select one:

- a. Objects of the two classes can know about each other, but they do not affect each other's lifetime.
- b. The objects can exist independently.
- c. Relationship where one class is an integral part of the other class.
- d. None of the above



ation 38

yet answered

ked out of

Flag question

Pure Virtual function can be written as

Select one:

- a. void virtual show()==0
- b. void virtual show()=0
- c. virtual void show()==0
- d. virtual void show()=0

Question 41
Not yet answered
Marked out of 1.00
Flag question

Consider the following two classes.

```
class Person
{
    private:
        Dog *dog;
    public:
        Person();
        ~Person();
};

class Dog
{
    public:
        Dog();
        ~Dog();
};
```

What is the UML diagram that shows the relationship between Person and Dog correctly?

Select one:

- a.
- b.
- c.
- d.

Consider the following multiplicity indicators and their meanings.

Indicator	Meaning
A. 0..1	Zero or one
B. n..m	Between n and m
C. 0..*	Zero or none
D. 1..2	One or two
E. 0..1, 4..7	Zero or one, or between 4 and 7 inclusive

Which of the above are correct?

Select one:

- a. A and C
- b. A, B and C
- c. A, B, C and D
- d. All of the above

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Select the correct statement about the relationship between super class and sub classes

Select one:

- a. A sub class can only be inherited from one super class
- b. The sub class must not have more attributes than the super class
- c. A super class must not be abstract.
- d. The sub class inherits the properties of the super class.

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What is the most correct statement regarding inheritance?

The question is asking about inheritance in object-oriented programming, specifically regarding the relationship between the Bank class and the ATM class.

Bank Class:

- +code
- +Address
- +manage()
- +maintain()

ATM Class:

- +location
- +managedBy
- +identifies()
- +transactions()

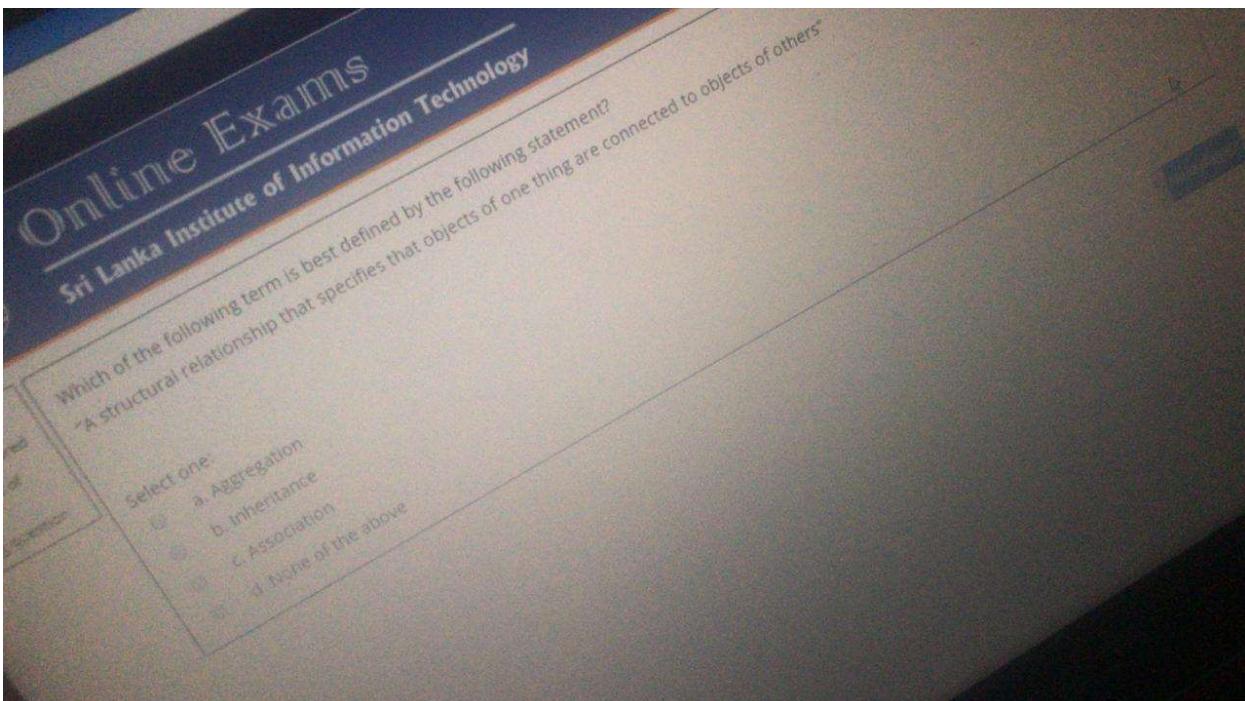
Inheritance Diagram:

```
graph TD; Bank --> ATM
```

The diagram shows a directed association from the Bank class to the ATM class, indicating that the ATM class inherits properties from the Bank class.

Select one:

- a. ATM inherits the properties of the Bank
- b. Bank is a generalization of ATM
- c. ATM is a part of Bank
- d. ATM depends on the Bank to do its transaction



The screenshot shows the next question in the sequence. The header is identical to the previous screen. The question asks: "What is the keyword that used before a function in a base class to be overridden in derived class in C++ ?". Below the question are four options: a. override, b. virtual, c. void, and d. none. A "Select one:" label is to the left of the options. At the bottom right, there is a blue button labeled "Next page" with a cursor arrow pointing towards it.

Which of the following is true about constructors.

- A) They cannot be virtual
- B) They cannot be private.
- C) They are automatically called by new operator.

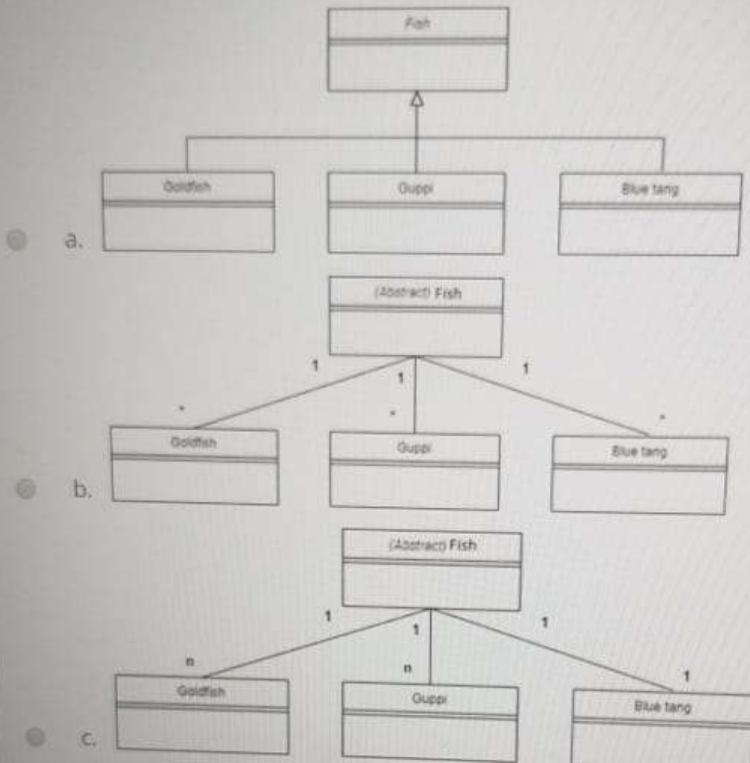
Select one:

- a. A, B and C
- b. A and C
- c. B and C
- d. A and B
- e. Only A

How do you model the following scenario using a class diagram.

"There are different fish species. E.g.-Goldfish, Guppy ,Blue tang"

Select one:



Unanswered
1 out of
1 question

If Rectangle is a class, Rectangle *r will

Select one:

- a. Create a static object of Rectangle class.
- b. Create a dynamic object of Rectangle class.
- c. Create a variable of Rectangle class.
- d. None of the above.

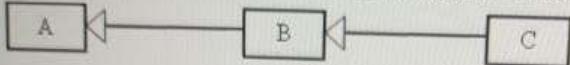




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Select the **incorrect** statement for class A, class B and class C given below.



Select one or more:

- a.
Class B inherits the properties of class C.
- b.
Class C inherits the properties of class B.
- c.
Class B inherits properties of class A.
- d. Class C inherits the properties of class A.
- e. Class A inherits the properties of Class C



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Question 1
Not yet answered
Marked out of 1.00
Flag question

Functions that can be inherited from base class

Select one:

- a. Constructor
- b. Destructor
- c. Static Functions
- d. a, b, and c
- e. None of the above

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Question 11
Not yet answered
Marked out of 1.00
Flag question

What is Inheritance?

Select one:

- a. Overloading of classes
- b. Classes with same names
- c. Derive new classes from existing classes
- d. Wrap data into one class

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There is a "Speech" class with a method called convert() that takes "Script" object as an input. The convert() function transform the script to mp3. Which of the following relationship exists between "Speech" and "Script" classes?

Select one:

- a. Composition
 - b. Dependency
 - c. Association
 - d. Aggregation
 - e. Inheritance

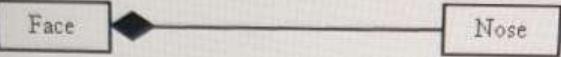
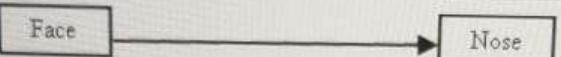
Next page

Online Exams

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Select the most correct diagram to show the relationship of **Face** class and **Nose** class.

Select one:

- a. 
- b. 
- c. 
- d. 
- e. None of the above

How many instances of an abstract class can be created?

Select one:

- a. 1
- b. 5
- c. 3
- d. 0
- e. Any number up to infinity



Question 1

Not yet answered

Marked out of
1.00

Flag question

Which of the following is true about constructors.

- A) They cannot be virtual
- B) They cannot be private.
- C) They are automatically called by new operator.

Select one:

- a. A, B and C
- b. A and C
- c. B and C
- d. A and B
- e. Only A

Online Exams

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How to statically allocated object called 'a' for class 'A' in C++ ?

Select one:

- a. A *a = new A();
- b. A a;
- c. A a = new A();
- d. public : A a;
- e. None of the above.

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Select the incorrect statement.



Select one:

- a.
The class "Z" depends on the class "X".
- b.
Changes to class "X" may affect the class "Z".
- c.
Changes to class "Z" may affect the class "X".
- d.
A "Z" object uses a "X" object somewhere as a parameter in one of its methods.
- e. Life span of "X" depend on "Y"





Which relationship says that objects are strongly dependent?

Select one or more:

- a. Aggregation only
- b. Association
- c. Composition and Dependancy
- d. Composition
- e. Composition and Aggregation

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Yamuna wants to write multiple functions in a class with same name, what C++ feature will Yamuna use?

Select one:

- a. Function Overriding
- b. Encapsulation
- c. Function overloading
- d. Virtual function
- e. None of the above



In a class, encapsulating an object of another class is called

Select one:

- a. Composition
- b. Inheritance
- c. Encapsulation
- d. Aggregation
- e. Dependency

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Question 12
Not yet answered
Marked out of 1.00
 Flag question

```
class Shape {
    getArea();
}

class Rectangle extends Shape {
    length;
    width;
    Rectangle();
    Rectangle(int, int);
    getArea();
}
```

What is correct about "Shape" class ?

Select one:

- a. It's an Abstract class
- b. It's a Derived class
- c. It's a Concrete class
- d. It's an Association class
- e. None of the Above

≡ Quiz navigation

MCO-40 MARKS

1	2	3	4	5	6	7	8
9	10	11	12	13	14	15	16
17	18	19	20	21	22	23	24
25	26	27	28	29	30	31	32
33	34	35	36	37	38	39	40

STRUCTURED -20 MARKS

41	42	43	44	45	46	47	48
49	50						

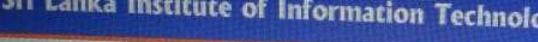
ESSAY- 40 MARKS

51	52						
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FEEDBACK

53

Finish attempt...
Time left 1:38:44

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Question 14
Not yet answered
Marked out of 1.00
 Flag question

What is true about overloading and overriding among the following?

Select one:

- a. Overloading happens within the same class.
- b. Overriding can occur without inheritance.
- c. The function signature should be changed in overriding.
- d. All of the above
- e. None of the Above

Which of the following statements are not true about destructor?

- A. It is invoked when object goes out of the scope
- B. Like constructor, it can also have parameters
- C. It can be virtual
- D. It can be declared in private section
- E. It bears same name as that of the class and precedes Lambda sign.

Select one:

- a. B, C and E
- b. B, C and D
- c. B, D and E
- d. C, D and E
- e. A, B and C



Online Exams

Sri Lanka Institute of Information Technology

Question 5
Not yet answered
Marked out of 1.00
Flag question

Aggregation is

Select one:

- a. Expressing a part of a relationship and is stronger form of an association relationship.
- b. Expressing a part of a relationship and is weaker form of an association relationship.
- c. Expressing a "is-a relationship" and is stronger form of an association relationship.
- d. Expressing a "is-a relationship" and is weaker form of an association relationship.
- e. Expressing a "is-a relationship" and is stronger form of an inheritance relationship.

Next page

MCQ- 40 MARKS

1	2	3	4	5	6	7
9	10	11	12	13	14	15
17	18	19	20	21	22	23
25	26	27	28	29	30	31
33	34	35	36	37	38	39

STRUCTURED- 20 MARKS

41	42	43	44	45	46	47	48
49	50						

ESSAY- 40 MARKS

51	52						
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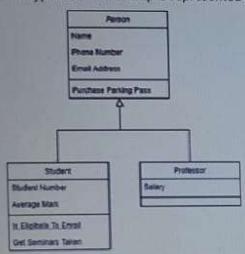
FEEDBACK

53

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Question 10
Not yet answered
Marked out of 1.00
Flag question

What type of a relationship is represented by Person class and Student Class?



Select one or more:

- a. Dependency
- b. Aggregation
- c. Generalization
- d. Realization
- e. Specialization

Next page

MCQ- 40 MARKS

1	2	3	4	5	6	7	8
9	10	11	12	13	14	15	16
17	18	19	20	21	22	23	24
25	26	27	28	29	30	31	32
33	34	35	36	37	38	39	40

STRUCTURED- 20 MARKS

41	42	43	44	45	46	47	48
49	50						

ESSAY- 40 MARKS

51	52						
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FEEDBACK

53

Finish attempt ...
Time left 1:45:12

Moodle x

→ X C | i | A

 Online Exams

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Question 5

yet answered

Marked out of 0

Flag question

Compile time polymorphism in C++ are

Select one or more:

- a. Operator overloading
- b. Function overloading
- c. Function overriding
- d. All of the above
- e. None of the above



Question 14
Not yet answered
Marked out of
1.00
[Flag question](#)

Which statement is FALSE about Dependency?

Select one:

- a. A Weaker type of relationship, where the class uses-an otherwise unrelated object
- b. In dependency, one sub class uses another class to perform a task.
- c. The dependent class typically is not a member of the class using it.
- d. None of the above
- e. All of the above

[Next page](#)

≡ Quiz navigation

MCQ- 40 MARKS

1	2	3	4	5	6	7	8
9	10	11	12	13	14	15	16
17	18	19	20	21	22	23	24
25	26	27	28	29	30	31	32
33	34	35	36	37	38	39	40

STRUCTURED- 20 MARKS

41	42	43	44	45	46	47	48
49 50							

ESSAY- 40 MARKS

51	52
53	

FEEDBACK

DELL



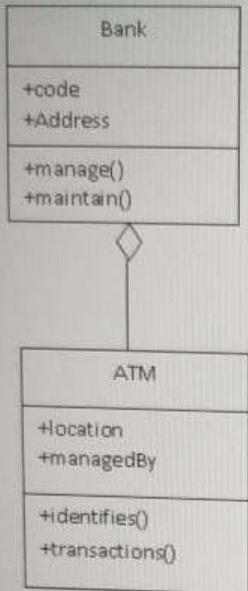
Functions that can be inherited from base class

Select one:

- a. Constructor
- b. Destructor
- c. Static Functions
- d. a, b, and c
- e. None of the above



What is the most correct statement regarding the following diagram ?



Select one:

- a. ATM inherits the properties of the Bank
- b. Bank is a generalization of ATM
- c. ATM is a part of Bank
- d. ATM depends on the Bank to do its transaction
- e. None of the above



John and Mike are working as programmers of an object-oriented project. John is responsible in creating the system using the real entities of the system. Mike is responsible in creating the classes required for the system. Name who must do the implementation first.

Answer:

Next

← → × C | ① | A

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Question 9
Not yet answered
Marked out of 1.00
Flag question

What is incorrect about "Aggregation" Relationship based on the below details?
A Department has one or more employees.

Select one:

- a. This implies that the Part can exist without the Whole.
- b. Objects have their own life cycles and there is no ownership.
- c. The Department and Employee objects have their own life cycles.
- d. If the Department object is deleted, the Employee objects will get deleted automatically.
- e. If the Employee objects is deleted, still the Department object can exist.

Next page

MCQ- 40 MARKS

1	2	3	4	5	6	7	8
9	10	11	12	13	14	15	16
17	18	19	20	21	22	23	24
25	26	27	28	29	30	31	32
33	34	35	36	37	38	39	40

STRUCTURED -20 MARKS

41	42	43	44	45	46	47	48
49	50						

ESSAY -10 MARKS

51	52
----	----

FEEDBACK

53

The screenshot shows a software interface for a programming assignment. At the top, there are standard window controls (minimize, maximize, close) and a toolbar with icons for file operations. The main area contains three code snippets labeled 'a.', 'b.', and 'c.'.

a.

```
#define SIZE 10
class Student {
private:
<attributes>
    Subject *sub(SIZE);
public:
<methods>
};

class Subject {
private:
<attributes>
    Students *stud(SIZE);
public:
<methods>
};
```

b.

```
#define SIZE 10
class Student {
private:
<attributes>
    Student *stud(SIZE);
public:
<methods>
};

class Subject {
private:
<attributes>
    Subject *sub(SIZE);
public:
<methods>
};
```

c.

```
#define SIZE 10
class Student {
private:
<attributes>
    Student *stud(SIZE);
public:
<methods>
};

class Subject {
private:
<attributes>
    Subject *sub(SIZE);
public:
<methods>
};
```

In the top right corner, there is a sidebar with the following sections:

- ESSAY-40 MARKS**: Contains three numbered boxes: 51, 52, and 53.
- FEEDBACK**: Contains a single numbered box: 53.
- Finish attempt ...**
- Time left 1:35:22**

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Which of the following terms is best defined by the following statement?

"A structural relationship that specifies that objects of one thing are connected to objects of others"

Select one:

- a. Aggregation
- b. Inheritance
- c. Association
- d.
- e. Both Composition and Aggregation
- f. None of the Above



on 15

15 answered

out of

question

Information Technology

What is the main reason to have relationships between classes?

Select one or more:

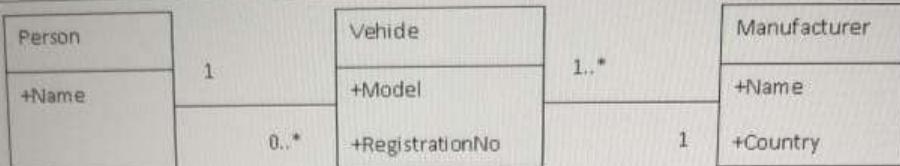
- a. To use the functionality of one class into other
- b. To be able to duplicate the classes.
- c. To increase code re-usability
- d. To enhance the communication between classes
- e. To have more attributes in classes



Next

Online Exams

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Select the correct statement regarding the diagram shown above.

Select one:

- a. A person must own at least one vehicle
- b. A vehicle can be manufactured by more than one manufacturer.
- c. A manufacturer can manufacture more than one vehicle
- d. A vehicle can be owned by more than one person.
- e. None of the Above



The screenshot shows a web-based online exam system. At the top, there is a blue header bar with the text "Online Exams" and "Sri Lanka Institute of Information Technology". To the left of the header, there is a logo featuring a shield with the letters "SLIIT". Below the header, a question is displayed:

42
Answered
out of
question

A computer manufacturer company needs to develop an online shopping system to enable purchasing of their computers for customers.

Write two nouns in this scenario, which can be rejected as classes.

Below the question is a text input field with a toolbar above it containing various text formatting icons (bold, italic, underline, etc.).

Online Exams

Sri Lanka Institute of Information Technology

Question 3
Not yet answered
Marked out of 1.00
Flag question

Select the correct statement about the relationship between super class and sub classes

Select one or more:

- a. A sub class can only be inherited from one super class
- b. The sub class must not have more attributes than the super class
- c. A super class must not be abstract.
- d. The sub class inherits the properties of the super class.
- e. A sub class can only inherit the protected properties of a super class.

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Quiz navigation

MCQ- 40 MARKS

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STRUCTURED - 20 MARKS

41	42	43	44	45	46	47	48
49	50						

ESSAY- 40 MARKS

51	52						
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FEEDBACK

53

Moodle

Online Exams

Sri Lanka Institute of Information Technology

Question 2
Not yet answered
Marked out of 1.00
Flag question

Data members and the member functions of a class are by default;

Select one:

- a. private
- b. public
- c. protected
- d. All of the above
- e. None of the above

Next page

Quiz navigation

MCQ- 40 MARKS

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STRUCTURED - 20 MARKS

41	42	43	44	45	46	47	48
49	50						

ESSAY- 40 MARKS

51	52						
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FEEDBACK

53

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Inheritance allows;

Select one or more:

- a. class re-usability
- b. Extendibility
- c. creating a hierarchy of classes
- d. class recyclability
- e. All of above

Next page

MCQ- 40 MARKS

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STRUCTURED - 20 MARKS

41	42	43	44	45	46	47	48
49	50						

ESSAY- 40 MARKS

51	52						
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FEEDBACK

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Moodle

Online Exams

Sri Lanka Institute of Information Technology

Question 4

Not yet answered

Marked out of 1.00

Flag question

Which operator is used to allocate an object dynamically in C++ ?

Select one:

- a. Scope resolution Operator
- b. Increment operator
- c. new operator
- d. assignment operator
- e. conditional operator

Next page

MCQ- 40 MARKS

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STRUCTURED - 20 MARKS

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49	50						

ESSAY- 40 MARKS

51	52						
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FEEDBACK

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Online Exams

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It2001074

44 answered out of 44 question

Write three function prototypes to define function overloading using C++ programming language to calculate the summation of two integer values, calculate the summation of three integer values and calculate the summation of two float values.

MCQ -

1	8
15	1
22	23
29	30
36	37

Online Exams

Sri Lanka Institute of Information Technology

What is the correct way of creating an object of a class called Car ?

Select one or more:

- a. Car car1;
- b. Car *car1 = new Car();
- c. Car : obj;
- d. class Car : public obj;
- e. private car = new obj();

A photograph of a computer screen displaying a question from the Sri Lanka Institute of Information Technology. The background of the screen features a decorative pattern of orange and yellow floral or geometric motifs on a dark background.

Sri Lanka Institute of Information Technology

John and Mike are working as programmers of an object-oriented project. John is responsible in creating the system using the real entities of the system. Mike is responsible in creating the classes required for the system. Name who must do the implementation first.

Answer:

[Next page](#)

A close-up photograph of a black keyboard. The keys are labeled with white letters and symbols, with a red outline around each key. The visible keys include the numbers 1 through 0, the letters Q, W, E, R, T, Y, U, I, O, P, A, S, D, F, G, H, J, K, L, Z, X, C, V, B, N, M, and various punctuation and function keys.

Online Examis
Sri Lanka Institute of Information Technology

Question 14
Not yet answered
Marked out of 1.00
Flag question

Which statement is FALSE about Dependency?

Select one:

- a. A Weaker type of relationship, where the class uses-an otherwise unrelated object.
- b. In dependency, one sub class uses another class to perform a task.
- c. The dependent class typically is not a member of the class using it.
- d. None of the above
- e. All of the above

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Quiz navigation

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STRUCTURED - 20 MARKS

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49	50						

ESSAY- 40 MARKS

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FEEDBACK

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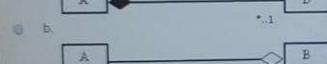
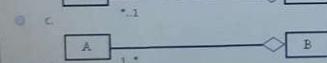
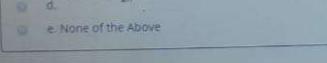
Moodle

Online Exams
Sri Lanka Institute of Information Technology

Question 16
Not yet answered
Marked out of 1.00
Flag question

Select the correct diagram to show the relationship of class A and class B, where one or many objects of class B is a part of an object of class A, and objects of class B **cannot** exist without an object of class A.

Select one:

- a. 
- b. 
- c. 
- d. 
- e. None of the Above

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Quiz navigation

MCQ- 40 MARKS

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STRUCTURED - 20 MARKS

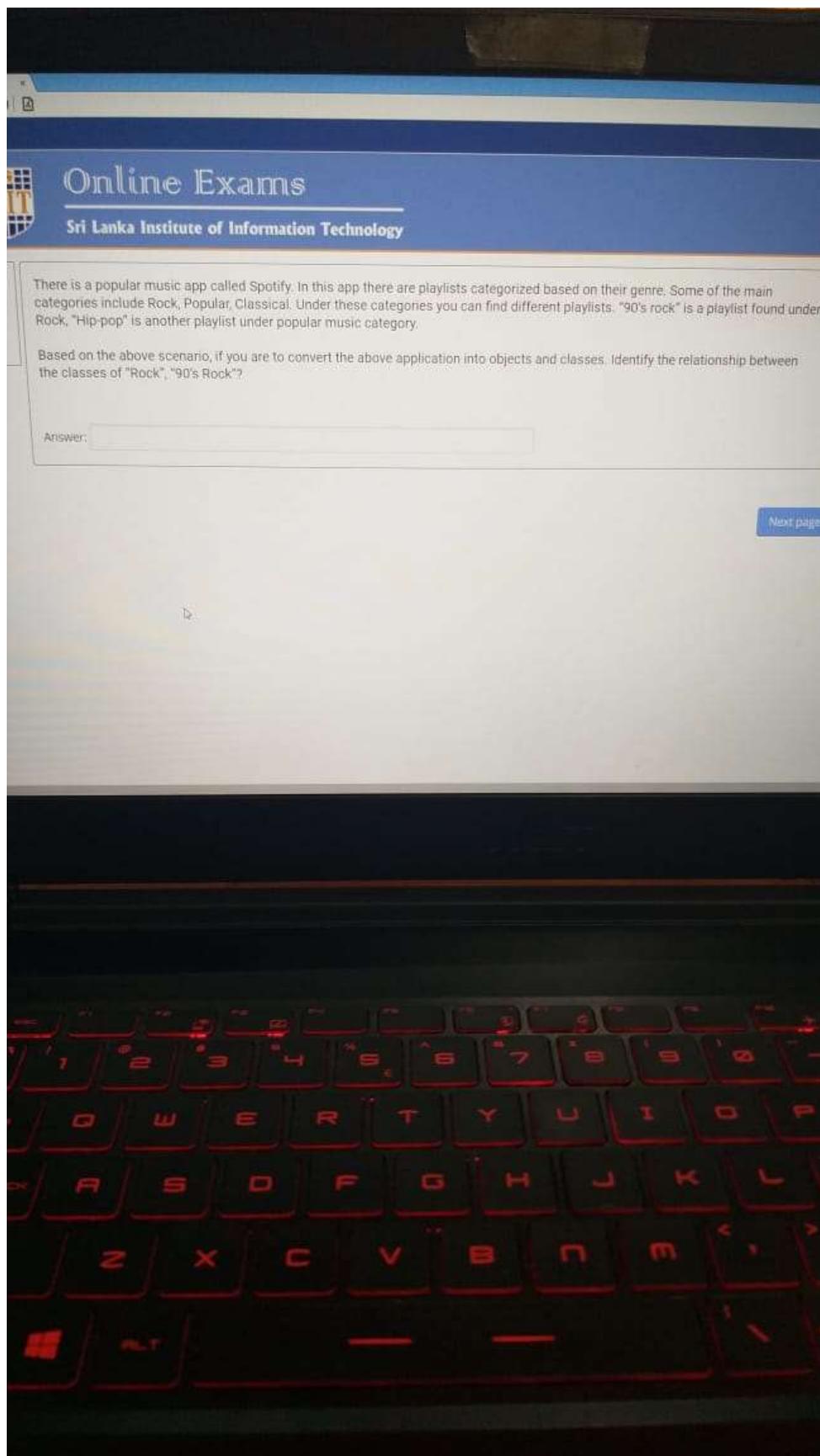
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49	50						

ESSAY- 40 MARKS

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FEEDBACK

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Online Exams

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There is a popular music app called Spotify. In this app there are playlists categorized based on their genre. Some of the main categories include Rock, Popular, Classical. Under these categories you can find different playlists. "90's rock" is a playlist found under Rock, "Hip-pop" is another playlist under popular music category.

Based on the above scenario, if you are to convert the above application into objects and classes. Identify the relationship between the classes of "Rock", "90's Rock"?

Answer:

[Next page](#)

Moodle

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Question 41

Not yet answered

Marked out of 1.00

Flag question

There is a popular music app called Spotify. In this app there are playlists that contains a collection of songs categorized based on their genre. Some of the main categories include Rock, Popular, Classical. Under these categories you can find different playlists. "90's rock" is a playlist found under Rock, "Hip-pop" is another playlist under popular music category.

Based on the above scenario. If you are to convert the above application into objects and classes. Identify the relationship between the classes of "Playlist", "Song"?

Answer:

Next page

MCQ- 40 MARKS

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STRUCTURED - 20 MARKS

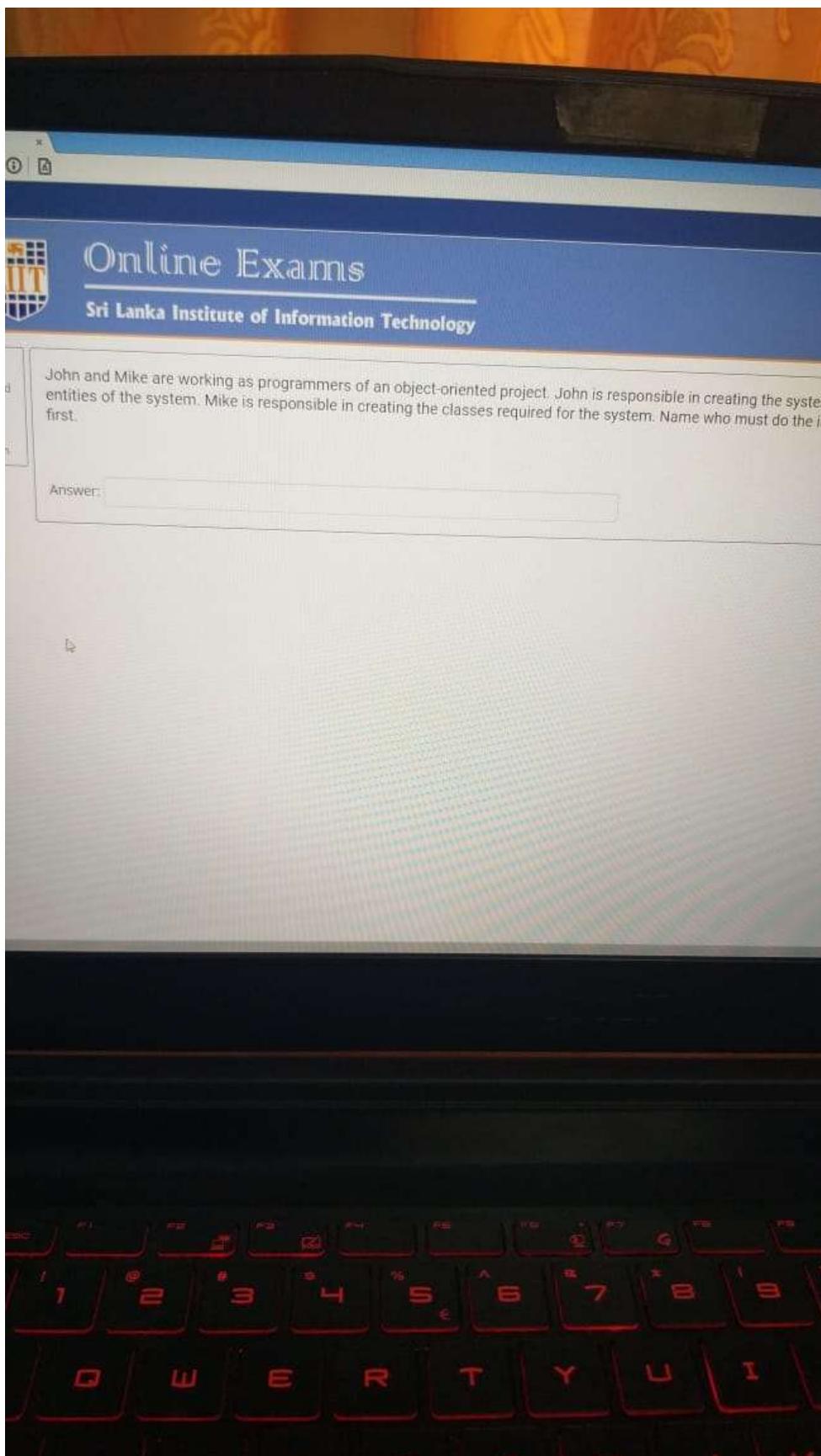
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ESSAY- 40 MARKS

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FEEDBACK

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Online Exams

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Which of following does not have a body?

Select one:

- a. An Interface
- b. Class
- c. Abstract method
- d. Virtual Function
- e. Contractor

Question 52

Not yet answered

Marked out of
1.00

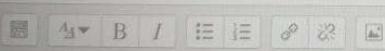
Flag question

Read the following description and write the coding of **5 classes** you have identified using a class diagram. You need not upload or / draw the class diagram here. You have to only write the coding of the classes showing the relationships clearly. You need not write all methods of the classes or the attributes. You may need to include the necessary methods and the attributes only to show the correct relationships between the classes. (Do not use the TAB key while you type in the answer box as it may go to next Question) - (20 marks)

The time scheduling system should let the architects register their daily appointments details with their clients. the information to be stored include the name of the client, with whom the appointment/ meeting is arranged, venue, the time, duration and the description of the appointment. When a meeting involves many architects the system should automatically find a common slot in the daily appointment files (diaries) of each concerned architect, and arrange the meeting. (i.e. make relevant entries in the diaries of all the concerned architects) at the time of registration. While the concerned architects should be informed of the details about the scheduled meetings through emails the schedule file should also be updated on every scheduled meeting.

Every day, in the morning the time scheduling system should send a reminding email to all architects about their appointments for the corresponding day. Besides registering their appointments or meetings, the architects might mark periods of which they plan to be on leave in the diary. Also, architects might mention in their diaries any other engagements they have.

Time scheduling system should be able to provide several types of statistics (several documents) for the top level managers, such as which architects spent how much time on a meeting, for which project how many meetings were organized and for what duration and how many man hours were devoted for such meetings.

**Q13**

Answered

3 out of

g question

Which of the following term is best defined for the following statement?

"A process in which one object acquires all the properties and behaviors of its parent object automatically"

Select one:

- a. Association
- b. Dependency
- c. Aggregation
- d. Generalization
- e. Composition

Next page

Moodle

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Question 20
Not yet answered
Marked out of 1.00
 Flag question

False statement about function overloading is

Select one:

- a. Defining multiple function with same name in a class is called function overloading
- b. Overloaded function must differ in their order and types of arguments
- c. Overloaded functions should be preceded with virtual keyword
- d. Answer a and b.
- e. Answer a and c.

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≡ Quiz navigation

MCQ-40 MARKS

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STRUCTURED - 20 MARKS

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ESSAY-40 MARKS

51	52
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FEEDBACK

53

Observe the given code segment of Rectangle class implementation.

```
#include <iostream>
using namespace std;

class Rectangle
{
private:
    float width;
    float length;
public:
    Rectangle(float l, float w)
    {
        width = w;
        length = l;
    }

    float calcArea()
    {
        return width * length;
    }
    ~Rectangle()
    {
        cout << "A dynamic object is deleted.." << endl;
    }
};
```

Within the main program, following statement is included.

```
Rectangle *r = new Rectangle(10, 2);
```

Write a code segment that can be used to execute **destructor**.

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Question 18
Not yet answered
Marked out of 1.00
 Flag question

In Inheritance, what functions can be inherited from base class in C++ program

Select one:

- a. Constructor
- b. Destructor
- c. Static function
- d. All of the above
- e. None of the Above

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MCQ-40 MARKS

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STRUCTURED-20 MARKS

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ESSAY-40 MARKS

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FEEDBACK

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Moodle

public:
 <methods>
};

c.

d. #define SIZE 10
class Student {
private:
 <attributes>
public:
 <methods>
};
class Subject {
private:
 <attributes>
 Student *stud[SIZE];
public:
 <methods>
};

e. #define SIZE 10
class Student {
private:
 Subject *s;
public:
 <methods>
};
class Subject {
private:
 <attributes>
 Student s;
public:
 <methods>
};



11
Answered
out of
Question

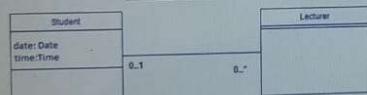
How do you model the following scenario using a class diagram?

A lecturer teaches multiple classes and a class can be taught by many lecturers. A timetable is used to document the time and date of each lecture held.

Select one:



a.



b.

- c. Both a and b are correct.
- d. Both a and b are incorrect.
- e. Only b is correct.

Quiz navigation

MCQ- 40 MARKS

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STRUCTURED- 20 MARKS

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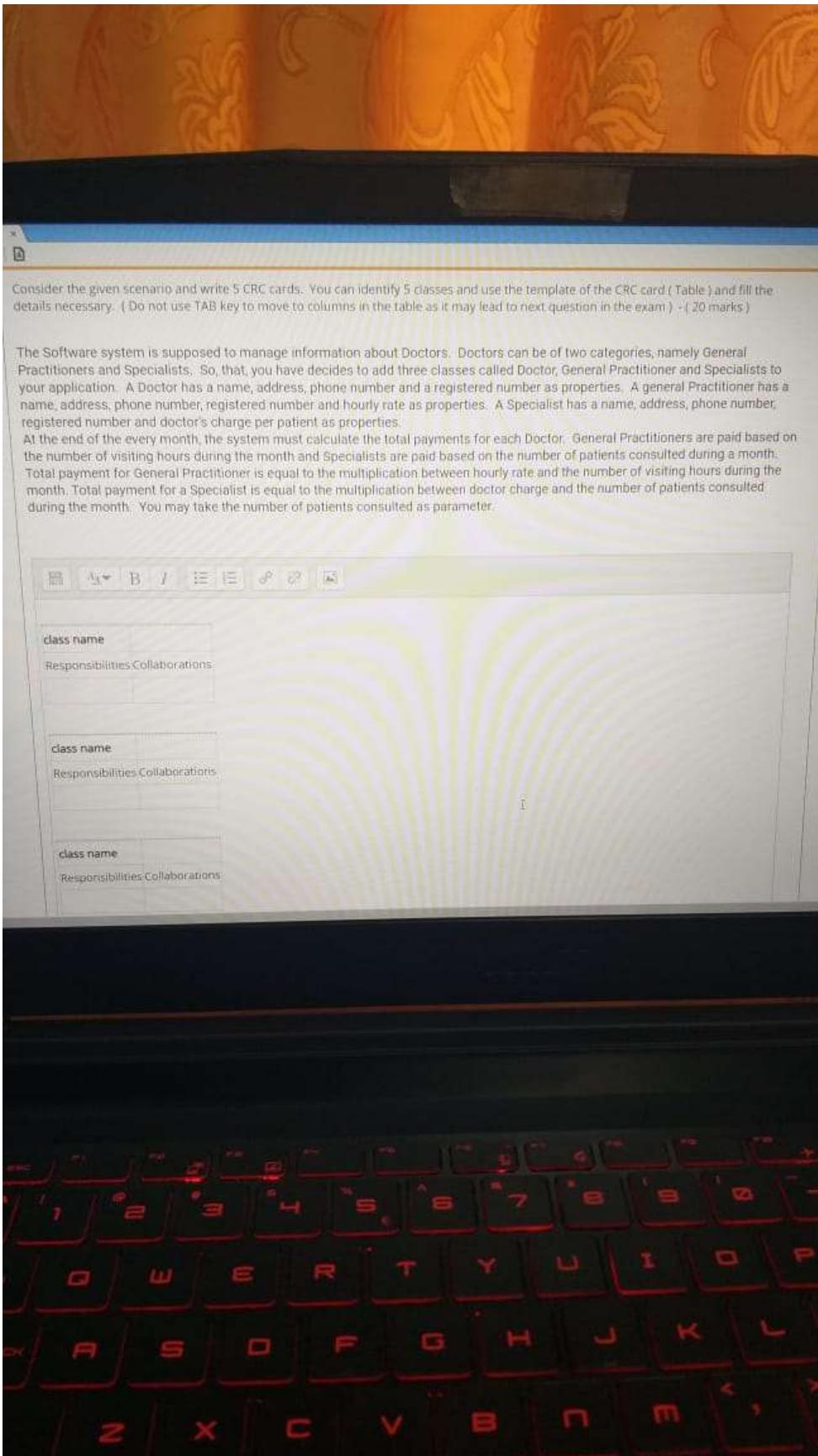
ESSAY- 40 MARKS

51	52
53	

FEEDBACK

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Question 7
Not yet answered
Marked out of 1.00
 Flag question

Following keyword is used before a function in a base class to be overridden in derived class in C++.

Select one:

a. override
 b. virtual
 c. void
 d. none
 e. protected

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MCQ- 40 MARKS

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STRUCTURED - 20 MARKS

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ESSAY- 40 MARKS

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FEEDBACK

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Online Exams

Sri Lanka Institute of Information Technology

A computer manufacturer company needs to develop an online shopping system to enable purchasing of their computers for customers. Write **two Rules** for Rejecting nouns in this scenario.

Computer manufacuturw company - out of scope

Next page

MCQ- 40 MARKS

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STRUCTURED - 20 MARKS

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ESSAY- 40 MARKS

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FEEDBACK

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Moodle

Online Exams

Sri Lanka Institute of Information Technology

Question 43
Not yet answered
Marked out of 0.00
Flag question

"Jessica, Lilia, Kyson and Kaden are Employees". Name all potential objects in this phrase.

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Quiz navigation

MCQ- 40 MARKS

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STRUCTURED- 20 MARKS

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ESSAY- 40 MARKS

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I

Read the following description and write the coding of **5 classes** you have identified using a class diagram. You need not upload or / draw the class diagram here. You have to only write the coding of the classes showing the relationships clearly. You need not write all methods of the classes or the attributes. You may need to include the necessary methods and the attributes only to show the correct relationships between the classes. (Do not use the TAB key while you type in the answer box as it may go to next Question) - (20 marks)

Once an employee joins the company HR manager introduced him/her to all other employees in the department he/she is allocated to work. Then the employee is given papers to fill out his/her information. the HR manager hands over the filled forms to data entry operator for the registration of the newly joined employee.

When an employee joins, the HR manager assigns a grade to each employee. Accountant is responsible to calculate employee's net salary. Calculation of Net salary varies according to the grades assigned.

When an employee leaves the organization, the HR manager can delete the employee record immediately or the record can be retained for one year as a pending record. Employees are eligible for promotions according to their performances. So the corresponding grades and details of an employee can be changed, when an employee is promoted to a higher grade. Updating the employee details is the responsibility of HR manager.

Employees can request for leave through the system. To request a leave the system, employee must login. The senior HR manager approves the requested leave of the employees in the organization. The senior HR manager has the ability to generate attendance reports, salary summary report and monthly reports. Employees are given 21 days of leave, as 07 days casual and 14 days annual. When an employee requests a leave, the system checks for the leave type and it automatically forwards the request to the Senior HR Manager. Then the Senior HR Manager approves the requested leave. Furthermore Employees can view their salary details online if they have a login.

Next page

Flag question

Moodle

Online Exams

Sri Lanka Institute of Information Technology

Question 1
Not yet answered
Marked out of 1.00
Flag question

In OOP, hiding the complexity is known as

Select one:

- a. Abstraction
- b. Encapsulation
- c. Information Hiding
- d. Inheritance
- e. Polymorphism

Next page

Quiz navigation

MCD-40 MARKS

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STRUCTURED - 20 MARKS

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ESSAY-40 MARKS

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FEEDBACK

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Information Technology

Not yet answered
Marked out of 1.00
Flag question

Select the incorrect statement/statements about a class and its relationships.

I. Only the attributes of the parent class will be inherited to the child class.
II. A class can be the parent class for several child classes.
III. Destructor of a class can be overloaded.

Select one:

- a. (I) and (II)
- b. (I) and (III)
- c. (II) and (III)
- d. All of the above
- e. None of the above

Next page

Quiz navigation

MCD-40 MARKS

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STRUCTURED - 20 MARKS

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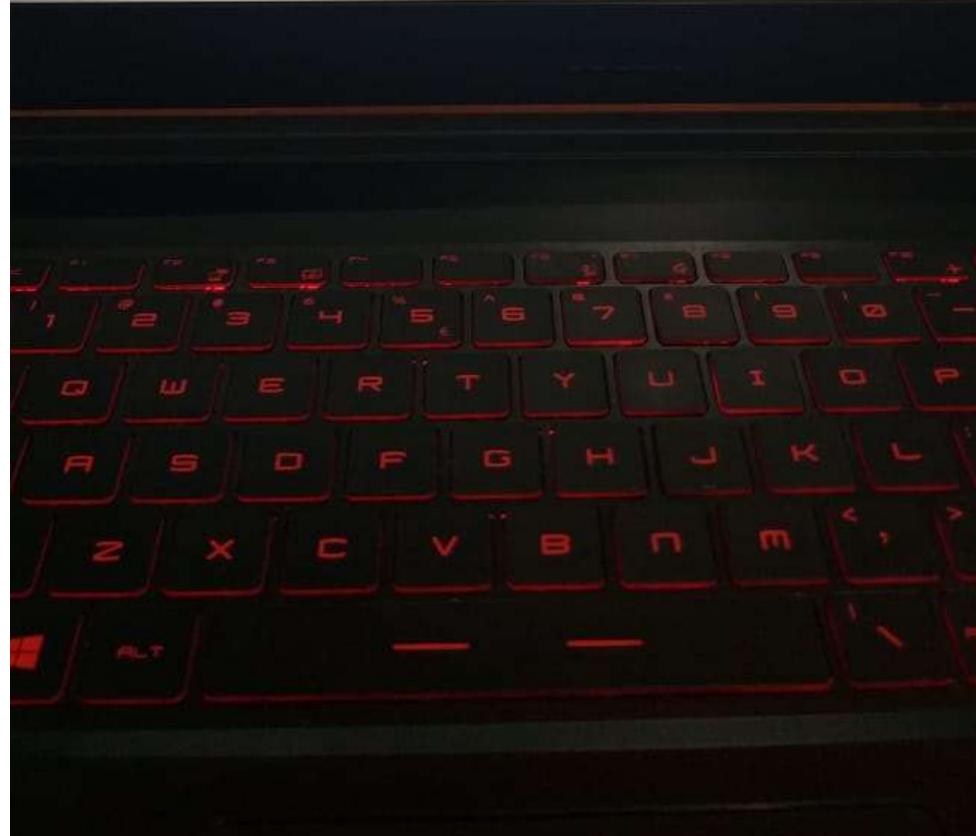
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"The list of responsibilities on the CRC card is exactly same as the list of methods in the class." Is this statement true or false? Briefly explain your answer.

1

[Next page](#)



Online Exams

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Question 6
yet answered
1 out of 1
Flag question

The way a relationship is built in Association is,

Select one:

- a. Through constructor
- b. Through the objects of classes
- c. Through destructor
- d. Through class Names
- e. Though a method of the class.

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MCQ- 40 MARKS

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STRUCTURED - 20 MARKS

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ESSAY - 40 MARKS

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FEEDBACK

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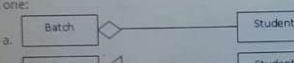
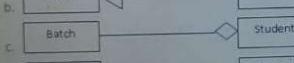
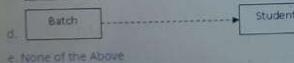
Sri Lanka Institute of Information Technology

Question 19
yet answered
0 out of 1
Flag question

What is the correct UML diagram that represents the relationship shown in the coding below ?

```
class Batch
{
    private:
        int year;
        string name;
        int count;
    public:
        Student *students[MAX];
        Batch(int pYear, string pname);
        void display();
};
```

Select one:

- a. 
- b. 
- c. 
- d. 
- e. None of the Above

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MCQ- 40 MARKS

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STRUCTURED - 20 MARKS

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ESSAY - 40 MARKS

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FEEDBACK

53

Finish attempt ...
Time left 1:23:49



Inheritance relationship is

Select one or more:

- a.
Part of A
- b.
Is-A
- c.
Has-A
- d. Kind of A
- e. Not part of A

Which kind of relationship type exist in the following code segment?

```
class Fraction
{
private:
    int m_numerator;
    int m_denominator;

public:
    Fraction(int numerator=0, int denominator=1)
        m_numerator[ numerator ], m_denominator[ denominator ];
    {
        // We put reduce() in the constructor to ensure any fractions we make get reduced!
        // Since all of the overloaded operators create new Fractions, we can guarantee this will get called here
        reduce();
    }
};
```

Select one:

- a.
Aggregation
- b.
Both Association and Composition
- c.
Composition
- d.
Inheritance
- e. Dependency



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it20120184 Mundawewa M X C/N #20120184

Question 17
Not yet answered
Marked out of 1.00
 Flag question

In given multiple inheritance, class C inherits class B, and Class B inherits class A. In which sequence are their destructors called, if an object of class C was declared?

Select one:

a.
~C() then ~B() then ~A()

b.
~B() then ~C() then ~A()

c.
~A() then ~B() then ~C()

d.
~C() then ~A() then ~B()

e.
~B() then ~A() then ~C()

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MCQ - 40 MARKS

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STRUCTURED - 20 MARKS

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ESSAY - 40 MARKS

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FEEDBACK

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Online Exams

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Which statement is TRUE about Composition relationship?

Select one:

- a. Objects of the two classes can know about each other, but they do not affect each other's lifetime.
- b. The objects can exist independently.
- c. Relationship where one class is an integral part of the other class.
- d. All of the above
- e. None of the above

