## GREENLAWNS SCHOOL, WORLI

### TERMINAL EXAM — 2020

## **Computer Application**

**STD**: IX **MARKS**: 60 **Date**:-21-9-2020 **TIME**: 2 Hours

# (Theory) (Two Hours)

Answers to this Paper must be written on the paper provided separately.

You will **not** be allowed to write during the first 15 minutes.

This time is to be spent in reading the question paper.

The time given at the head of this Paper is the time allowed for writing the answers.

This Paper is divided into two Sections.

Attempt **all** questions from **Section** A and **any four** questions from **Section B.** The intended marks for questions or parts of questions are given in brackets

## **SECTION A (24 Marks)**

#### Attempt all questions

Question 1.  1. Give the syntax of if else if.	[1]
2. What does the default do?	[1]
3. Explain encapsulation.	[1]
4. Name any two types of Java programs.	[1]
5. Name any two tokens of java.	[1]
6. Define object.	[1]
Question 2.	
1. Give the syntax of switch case.	[1]
2. Differentiate between = and = =.	[1]
3. State the difference between if-else if ladder and switchcase.	[1]
4. Define abstraction	[1]
5. Name the relational operators?	[1]
6. Difference between compiler and interpreter.	[1]
Question 3.	
1. What is the size of long in bytes?	[1]
2. Mention two characteristic of java?	[1]
3. What do you mean by keyword?	[1]
4. Difference between float and double data type.	[1]
5. What is the function of a else statement?	[1]
6. What is an Identifier?	[1]

```
1. What will be the output of the following?
a) int a=63, b=36;
                                                                                     [2]
System.out.println("a = "+a);
System.out.println("b = "+b);
System.out.println("a+b = "+a+b);
b) System.out.print("Green");
                                                                                     [2]
  System.out.println("lawns");
  System.out.print("School");
  System.out.print("Worli");
c) Rewrite the following code using the switch case statement:
                                                                                     [2]
char code="B";
  if (code = = 'A')
          System.out.println("Apple");
  else if (code = = 'B')
          System.out.println("Bat");
  else if (code=='C')
          System.out.println("Cat");
  else
  {
          System.out.println("Invalid character");
  }
```

## SECTION B (36 Marks)

## Attempt any four questions from this Section.

The answers in this Section should consist of the Programs in either

Blue J environment or any program environment with Java as the base.

Each program should be written using Variable descriptions/Mnemonic

Codes such that the logic of the program is clearly depicted

Flow-Charts and Algorithms are not required.

#### Question 5.

Write a program to computerize the billing operation of a telephone company

The bill has to be generated based on the following conditions:

#### **Number of calls Amount per call**

First 50 calls free

Next 100 calls 50 P per call

Next 200 calls 80 P per call

Rest of the calls Rs 1.20 per call

A rent of Rs 120 is charge from every customer. A tax of 15% is charged on the sum of charges and rent. The total amount is tax added to the sum of charges and rent.

Print the bill for a customer.

[9]

## Question 6.

Write a Java program to calculate the commission of a salesman as per the given criteria:

Sales (Rs.)	Commission	
More than 100000	25 %	
From 80000 to 100000	22.5%	
From 60000 to 80000	20 %	
From 40000 to 60000	15 %	
Less than 40000	12.5 %	[9]

#### Question 7.

A computer dealer sells computer at the following rates:

Rs. 35000 per computer for less then 20 computers.

Rs. 31000 per computer for 20 to 39 computers.

Rs. 29000 per computer for 40 or more computers.

Write a program to take the number of computers as input and display the bill. A customer gets a further 10% discount of his dealing with the dealer for more than 5 years. [9]

#### Question 8.

Write a menu driven program to convert a given temperature from Fahrenheit to Celcius and vice versa. For an incorrect choice, an appropriate error message should be displayed.

(HINT : 
$$C = (5/9)*(F-32)$$
 and  $F = 1.8*(C+32)$ ) [9]

#### Question 9.

Write a program to accept the class of a student (1 to 12). Print the section to which using switch case. the student belongs according to the following criteria [9]

Class	Section
1-5	Primary Section
6-8	Middle Section
9-10	ICSE Section
11-12	ISC Section

#### Question 10.

Prepare an interactive program in Java (with supporting documentation) to input the basic salary of a employee. Each one of them gets 25% of the basic as HRA (House Rent Allowance), 15% of the basic as Conveyance Allowance and 10% of basic as

Entertainment Allowance.

The total salary is calculated by adding

Gross = Basic+HRA+Conveyance+Entertainment Allowance.

Display the gross salary.