



**EASTERN UNIVERSITY, SRILANKA
DEPARTMENT OF MATHEMATICS
SECOND EXAMINATION IN SCIENCE – 2008 / 2009
FIRST SEMESTER (Feb./ Mar., 2010)**

**OC 251 – PRACTICAL WORK ON OC 206
(Proper & Repeat)**

Answer all questions

Time: Two hours

Write a program in Java to display an image in an applet. (30marks)

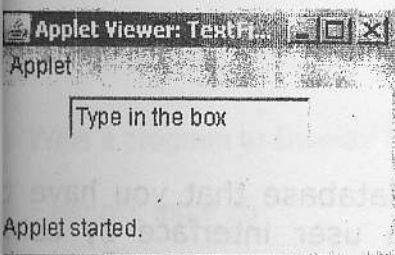
Write a program in Java to accept any three numbers directly from the command line, add the numbers and then display the sum. (30marks)

Write a program in Java to find the square of the following matrix:

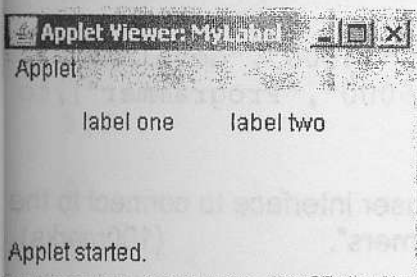
$$\begin{pmatrix} 1 & 3 & 5 \\ 2 & 4 & 6 \\ 6 & 7 & 8 \end{pmatrix}$$

(40marks)

Write a program in Java to get the following output. (25marks)



Write a program in Java to get the following output. (25marks)



C) Write a program in Java to get the following output.

(50marks)

Vinod	5000	Java
Deepak	14000	developer
Sushil	20000	writer
Chandan	15000	Programmer

3.

- a) Make a class program to illustrate object oriented concept. Define a Mammal class with some function. Define a dog, Morley (it is another dog) class extending Mammal. Then make a class Speak class containing main() function. By creating Morley and dog objects in Speak class and accessing functions of the Morley, dog class function create an output as follows.

Output:

First we'll get the dog to speak:

Arf! Arf!

Now it's Morley's turn to speak:

Can I ask you a few questions about your 1987 tax statement?

Time for both to sleep: ZZZZ ZZZZZZ ZZZZ ZZZZ ZZZZZZ ZZZZ

(40marks)

- b) Write a program in Java to explain inheritance in Object Oriented concept. (20marks)
- c) Using Java Programming language write programs to create menus and pop-up menus. (40marks)

4.

Suppose you have a set of records in an Access database that you have view through a front-end tool. You can design a user interface by using programming languages Java.

Using Microsoft Access software create a table "Customers" with the following columns: Emp_name, Emp_salary, Department.

Add records {"Vinod", "5000", "Java"}, {"Deepak", "14000", "developer"}, {"Sushil", "20000", "writer"}, {"Chandan", "15000", "Programmer"}, to this table.

Write an application program in Java to design the above user interface to connect to the table "Customers" and view all records from the table "Customers". (100marks)