Assignment 3: Conditional Statement

1.A function f is defined as follows

$F(x) = ax^3 – bx^2 + cx – d$ if $x > k$

$= 0$ if $x = k$

$= - ax^3 + bx^2 – cx + d$ if $x < k$

Write a program to accept a, b, c, d, k and x. and display the value of f(x).

2. Write a program to read marks from the keyboard and display equivalent grade.

(Use if-else if ladder)

Marks	Grade
100 – 80	Distinction
60 – 79	First Class
35 – 59	Second Class
0 – 35	Fail

3. Write programs for the following:

- Take two numbers of float and divide the first number by second and show the result as integer number.
- Take the first number as -VE integer and second as +VE float, divide the first by second and display output as integer number.
- Take the first number as +VE float and second number as -VE integer, divide the first number by second and display output in the float.

5. A cloth showroom has announced the following seasonal discount on the purchase of items.

Purchase Amount	Discount	
	Mill Cloth	Handloom Items
0 – 100	-	5.0%
101 – 200	5.0 %	7.5%
201 – 300	7.5 %	10.0%
Above 300	10.0 %	15.0%

Write a program to compute the net amount to be paid by a customer.

6. The commission a life insurance sales woman earns on insurance policy sold is as follows:

Policy Amount (Rs.)	Commission
Less or Equal to 10000	0.5 % of Policy Amount
Between 10000 and 25000	Rs 50 + 0.6 % of the amount in excess of Rs 10000
Greater or Equal to 25000	Rs 140 + 0.75 % of the amount in excess of Rs 25000

Write a program that reads the amount of insurance sold and output the commission due to the sales woman.